USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 300.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.448E-06	3.349E-06	3.312E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06		
0.003	0.019	0.037	0.131	0.225	0.648	0.789	0.930	1.118	2.198		
0.00017	0.00094	0.00185	0.00652	0.01120	0.03224	0.03926	0.04627	0.05562	0.10940		

2.192E-06	1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.323E-06	1.273E-06	1.190E-06		
2.527	2.809	3.607	4.923	5.016	5.439	5.721	6.426	8.399	8.540		
0.12576	0.13979	0.17954	0.24500	0.24968	0.27072	0.28475	0.31982	0.41802	0.42503		

1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07		
13.143	13.660	14.365	17.324	17.371	23.384	24.135	24.934	31.604	31.745		
0.65416	0.67988	0.71495	0.86224	0.86458	1.16385	1.20126	1.24101	1.57301	1.58002		

6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.719E-07		
39.449	43.207	44.476	53.448	57.722	65.473	70.124	70.829	75.479	75.573		
1.96346	2.15050	2.21363	2.66019	2.87295	3.25873	3.49019	3.52526	3.75673	3.76140		

2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	1.076E-07	9.605E-08	8.032E-08		
80.505	87.974	91.075	92.343	93.799	94.034	95.115	95.162	95.209	95.302		
4.00690	4.37865	4.53296	4.59608	4.66856	4.68025	4.73403	4.73636	4.73870	4.74338		

```
   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.537      95.819      96.853      98.544      99.295      99.765
100.000
     4.75507     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.109
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.270
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.653
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.163
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.961
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.658

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.07050 -16.77079  -1.22823
 11  2     -13.00780 -14.66803  -0.54189
 11  3     -13.03054 -16.60416  -1.18261
 11  4     -13.31455 -16.73869  -1.23098
 11  5     -13.68351 -16.99876  -1.33576
 11  6     -13.96752 -17.05432  -1.36024
 11  7     -14.24977 -18.82078  -2.21700
 11  8     -14.53378     NUMXQ(K)=  8
    2.969E-06              0.050              1.000
    2.061E-06              0.149              3.000
    1.704E-06              0.249              5.000
    1.284E-06              0.498             10.000
    1.071E-06              0.747             15.000
    9.297E-07              0.995             20.000
    8.295E-07              1.244             25.000
    7.529E-07              1.493             30.000
    6.923E-07              1.742             35.000
    6.396E-07              1.991             40.000
    5.737E-07              2.240             45.000
    5.196E-07              2.489             50.000
```

1.282E-06 0.5 10.05

ANNUAL AVERAGE = 2.59E-10

K= 11 FIVEXQ(K)= 1.282E-06 FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY: 1.22E-04

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.423	3.382	4.463	22.519	51.600	95.256
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	5.4	0.14	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.28	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	3.3	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.24	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.61	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.66	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.71	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07

AT 131.4 METERS
CA=1292.SQ.METERS

C	26.5	0.09	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.28	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.13	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.77	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	4.19	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	4.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	6.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.94	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.56	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.69	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.22	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	5.46	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	8.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.71	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.85	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	3.62	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	4.00	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.68	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.77	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.47	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.89	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.18	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	1.88	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.66	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

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1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06	2.242E-06	2.192E-06
0.002	0.019	0.038	0.320	0.367	0.508	0.603	1.026	1.309	1.450
0.00012	0.00097	0.00188	0.01591	0.01825	0.02526	0.02994	0.05098	0.06501	0.07202

1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.356E-06	1.323E-06	1.273E-06	1.190E-06
1.685	2.579	3.709	3.756	3.944	4.274	4.368	5.027	6.674	7.286
0.08371	0.12813	0.18425	0.18658	0.19594	0.21230	0.21698	0.24971	0.33154	0.36194

1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07
11.521	12.227	12.933	14.627	14.722	18.487	19.616	20.463	24.652	24.793
0.57236	0.60743	0.64250	0.72667	0.73135	0.91839	0.97450	1.01659	1.22467	1.23169

6.477E-07	5.752E-07	5.516E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.897E-07	3.528E-07	3.479E-07
30.017	34.865	34.912	36.606	42.065	48.607	55.619	55.667	58.679	59.620
1.49121	1.73202	1.73436	1.81853	2.08974	2.41473	2.76310	2.76543	2.91507	2.96183

3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	1.076E-07
67.009	67.103	70.727	79.057	83.057	84.846	87.528	88.093	91.858	92.846
3.32890	3.33358	3.51361	3.92744	4.12617	4.21501	4.34828	4.37634	4.56338	4.61248

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   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      93.317      93.411      93.788      94.164      94.211      95.105
96.282      98.165      99.247      99.906
     4.63586     4.64054     4.65924     4.67795     4.68028     4.72471
4.78316     4.87668     4.93045     4.96319

   1.009E-08
     100.000
     4.96786
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
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PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.001
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.072
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.572
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   0.607
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   1.490
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.760
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
12	1	-11.07050	-16.99141	-1.25333
12	2	-11.63677	-17.12169	-1.28383
12	3	-13.03054	-15.90430	-0.90180
12	4	-13.18433	-15.96680	-0.92252
12	5	-13.28753	-16.35327	-1.05559
12	6	-13.68351	-17.55751	-1.53174
12	7	-13.71559	-17.71093	-1.59290
12	8	-14.24977	-18.54189	-1.97533
12	9	-14.75472	NUMXQ(K)= 9	

2.512E-06	0.050	1.000
1.802E-06	0.149	3.000
1.534E-06	0.248	5.000
1.202E-06	0.497	10.000
9.837E-07	0.745	15.000
8.309E-07	0.994	20.000
7.259E-07	1.242	25.000
6.480E-07	1.490	30.000

5.737E-07	1.739	35.000
5.151E-07	1.987	40.000
4.675E-07	2.236	45.000
4.281E-07	2.484	50.000
3.947E-07	2.732	55.000
1.199E-06	0.5	10.06

ANNUAL AVERAGE = 2.45E-10

K= 12 FIVEXQ(K)= 1.199E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 1.22E-04

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.612	3.671	5.130	26.515	53.437	92.988
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.03	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.06	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.39	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.42	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.30	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.18	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	2.2	0.03	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.39	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.63	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.21	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.48	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.69	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.33	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06

C	8.7	1.44	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
C	10.8	0.87	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
C	26.5	0.48	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.719E-07						
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	0.24	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	0.54	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	0.90	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	2.66	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	3.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	4.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	4.25	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	9.30	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	6.31	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	3.71	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.90	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	0.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	1.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	3.05	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	3.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.77	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	6.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	12.47	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.42	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.48	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.66	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.29	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.63	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.83	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.84	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.81	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 300.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.670E-06	3.349E-06	3.312E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06		
0.002	0.019	0.030	0.060	0.090	0.329	0.419	0.479	0.569	1.107		
0.00015	0.00150	0.00235	0.00469	0.00703	0.02573	0.03275	0.03742	0.04444	0.08652		

2.242E-06	2.192E-06	1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.356E-06	1.323E-06		
1.496	1.556	1.945	2.842	3.739	4.158	4.637	4.936	5.235	5.923		
0.11691	0.12159	0.15198	0.22213	0.29227	0.32500	0.36241	0.38579	0.40917	0.46294		

1.273E-06	1.190E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07		
6.641	7.269	9.931	10.260	10.679	11.936	12.265	15.525	16.961	17.440		
0.51906	0.56815	0.77624	0.80196	0.83469	0.93289	0.95861	1.21345	1.32568	1.36309		

6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.516E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.897E-07		
21.448	22.315	25.367	29.614	29.794	30.452	34.041	43.344	49.118	49.327		
1.67638	1.74419	1.98266	2.31467	2.32869	2.38013	2.66069	3.38782	3.83906	3.85543		

3.528E-07	3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07		
50.613	56.925	63.297	63.775	66.407	78.881	81.424	84.056	86.599	90.308		
3.95596	4.44929	4.94729	4.98470	5.19044	6.16540	6.36414	6.56988	6.76862	7.05853		

```
   1.336E-07   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08
4.375E-08   3.310E-08   2.491E-08   1.998E-08
      94.137      94.825      95.064      95.363      95.513      95.722
95.752      96.500      97.338      98.145
     7.35780     7.41158     7.43028     7.45366     7.46535     7.48172
7.48406     7.54251     7.60797     7.67110

   1.668E-08   1.253E-08   1.009E-08
      99.252      99.970     100.000
     7.75760     7.81372     7.81606

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.117
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.775
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.324
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.981
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.944

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1     -11.07050 -16.44367  -1.15172
 13  2     -11.63677 -16.70211  -1.21364
 13  3     -13.00800 -15.61279  -0.85576
 13  4     -13.31455 -17.04980  -1.39084
 13  5     -13.68351 -17.50850  -1.58036
 13  6     -14.00160 -17.41645  -1.53888
 13  7     -14.24977 -17.70966  -1.68136
 13  8     -14.93482     NUMXQ(K)=  8
    2.591E-06              0.078              1.000
    1.864E-06              0.234              3.000
    1.593E-06              0.391              5.000
    1.137E-06              0.782             10.000
    8.948E-07              1.172             15.000
    7.513E-07              1.563             20.000
    6.537E-07              1.954             25.000
    5.757E-07              2.345             30.000
    5.152E-07              2.736             35.000
```

4.668E-07	3.126	40.000
4.271E-07	3.517	45.000
3.938E-07	3.908	50.000
3.655E-07	4.299	55.000
3.409E-07	4.690	60.000
1.417E-06	0.5	6.40

ANNUAL AVERAGE = 7.36E-10

K= 13 FIVEXQ(K)= 1.417E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 1.22E-04

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.376	5.713	7.777	22.895	58.074	95.154	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	AT 131.4 METERS
A	4.4	0.08	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.08	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.19	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.13	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.13	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	3.3	0.03	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.21	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.40	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.32	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.27	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.21	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.72	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.89	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	1.58	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	4.29	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.26	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	14.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	6.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.46	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.62	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.20	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.11	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	4.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.23	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	11.84	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	3.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.35	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.40	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.05	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	2.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.62	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.59	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.70	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.54	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 300.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.349E-06 3.312E-06 3.143E-06 2.685E-06 2.366E-06 2.243E-06 2.242E-06
0.004 0.013 0.022 0.103 0.613 0.639 0.720 0.854 1.364 1.552
0.00037 0.00113 0.00192 0.00893 0.05336 0.05569 0.06271 0.07440 0.11882 0.13519

2.192E-06 1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.356E-06 1.323E-06 1.273E-06
1.606 1.659 2.116 2.625 2.760 2.921 3.135 3.189 3.538 4.048
0.13986 0.14454 0.18429 0.22871 0.24040 0.25443 0.27313 0.27781 0.30820 0.35262

1.190E-06 1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07
4.451 6.034 6.598 6.947 7.564 7.886 10.973 12.180 12.583 16.877
0.38769 0.52564 0.57474 0.60513 0.65891 0.68696 0.95584 1.06105 1.09612 1.47020

6.684E-07 6.477E-07 5.752E-07 5.516E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07
17.602 19.803 25.063 25.198 25.681 28.794 43.368 47.689 47.958 49.005
1.53333 1.72505 2.18330 2.19499 2.23708 2.50829 3.77784 4.15427 4.17765 4.26883

3.479E-07 3.265E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07
59.526 65.753 66.638 67.953 79.790 81.776 85.104 86.580 92.673 95.464
5.18534 5.72776 5.80492 5.91948 6.95055 7.12357 7.41348 7.54207 8.07281 8.31596

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   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.081      96.296      96.618      96.779      96.994      97.584
98.282      98.819      99.087      99.946
     8.36974     8.38844     8.41650     8.43053     8.44923     8.50067
8.56146     8.60822     8.63160     8.70641

   1.009E-08
     100.000
     8.71109

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.053
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.135
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.254
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.574
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.060
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.775
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.724

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1     -11.07050 -16.79710  -1.27704
 14  2     -12.61806 -17.29950  -1.43056
 14  3     -13.00800 -17.64932  -1.54717
 14  4     -13.31455 -17.41477  -1.46346
 14  5     -13.71559 -16.95421  -1.28125
 14  6     -14.00160 -16.85692  -1.23903
 14  7     -14.65458 -17.15661  -1.40764
 14  8     -14.93482     NUMXQ(K)=  8
    2.706E-06              0.087              1.000
    1.630E-06              0.261              3.000
    1.272E-06              0.436              5.000
    9.123E-07              0.871             10.000
    7.520E-07              1.307             15.000
    6.529E-07              1.742             20.000
    5.827E-07              2.178             25.000
```

5.294E-07	2.613	30.000
4.871E-07	3.049	35.000
4.523E-07	3.484	40.000
4.219E-07	3.920	45.000
3.936E-07	4.356	50.000
3.693E-07	4.791	55.000
3.480E-07	5.227	60.000
3.292E-07	5.662	65.000
1.186E-06	0.5	5.74

ANNUAL AVERAGE = 4.51E-10

K= 14 FIVEXQ(K)= 1.186E-06 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 1.22E-04

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.671	4.616	6.039	16.516	63.462	96.403	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	6.5	0.06	500.	0.	131.	100.2	123.6	0.0	0.000E+00
0.000E+00	2.242E-06								
A	8.7	0.04	500.	0.	131.	100.2	123.6	0.0	0.000E+00
0.000E+00	1.685E-06								
A	26.5	0.02	500.	0.	131.	100.2	123.6	0.0	0.000E+00
0.000E+00	5.516E-07								
B	2.2	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	4.670E-06								
B	3.3	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	3.143E-06								
B	4.4	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	2.366E-06								
B	5.4	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	1.897E-06								
B	6.5	0.06	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	1.584E-06								
B	8.7	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	1.190E-06								
B	10.8	0.11	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	9.582E-07								
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.192E-06								
C	4.4	0.17	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.650E-06								
C	5.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.323E-06								
C	6.5	0.38	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.105E-06								
C	8.7	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	8.302E-07								
C	10.8	0.47	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	6.684E-07								
C	26.5	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.719E-07								
D	0.2	0.00	4000.	0.	131.	263.4			

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.17	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	5.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	7.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	17.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.45	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	5.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F         9.3       1.30    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G         1.2       0.15    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.24    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.94    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       1.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.88    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.36    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.11    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 300.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.670E-06 3.312E-06 3.143E-06 2.366E-06 2.243E-06 2.242E-06 2.192E-06
0.001 0.011 0.018 0.039 0.210 0.253 0.274 0.873 0.937 1.001
0.00015 0.00118 0.00198 0.00431 0.02302 0.02769 0.03003 0.09550 0.10251 0.10953

1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.323E-06 1.273E-06 1.190E-06 1.141E-06
1.022 1.514 2.369 2.411 2.582 2.646 2.839 3.181 3.309 5.830
0.11186 0.16564 0.25916 0.26384 0.28254 0.28955 0.31060 0.34801 0.36203 0.63792

1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07 6.477E-07
6.215 6.493 7.134 7.241 11.215 11.771 12.048 17.070 17.540 19.933
0.68001 0.71040 0.78054 0.79223 1.22711 1.28789 1.31829 1.86773 1.91916 2.18102

5.752E-07 5.516E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.719E-07
27.028 27.049 27.434 30.724 48.268 53.716 54.999 65.448 71.367 71.623
2.95725 2.95959 3.00167 3.36173 5.28125 5.87745 6.01774 7.16103 7.80867 7.83672

2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07 9.605E-08 8.032E-08 6.505E-08
73.097 83.632 85.491 87.649 89.081 94.551 95.855 96.004 96.218 96.346
7.99805 9.15070 9.35411 9.59025 9.74690 10.34543 10.48805 10.50442 10.52780 10.54183

4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08	1.253E-08
96.581	97.521	98.654	99.530	99.893	100.000
10.56755	10.67042	10.79434	10.89020	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.109
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.637
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.226
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.954
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.278
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.07050	-16.77874	-1.22354
15	2	-13.03054	-15.97232	-0.96030
15	3	-13.28753	-15.98209	-0.96379
15	4	-13.31455	-17.00262	-1.33251
15	5	-13.68351	-16.60815	-1.17415
15	6	-13.96752	-16.46289	-1.10956
15	7	-14.36856	-16.37541	-1.06321
15	8	-14.65458		

NUMXQ(K)= 8

2.193E-06	0.109	1.000
1.546E-06	0.328	3.000
1.226E-06	0.547	5.000
9.044E-07	1.094	10.000
7.567E-07	1.641	15.000
6.639E-07	2.188	20.000
5.974E-07	2.735	25.000
5.476E-07	3.282	30.000
5.083E-07	3.830	35.000
4.757E-07	4.377	40.000
4.481E-07	4.924	45.000
1.279E-06	0.5	4.57

ANNUAL AVERAGE = 1.01E-10

K= 15 FIVEXQ(K)= 1.279E-06 FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY: 1.22E-04

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.128	2.222	2.628	10.926	64.626	96.068
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.02	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	5.4	0.11	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.30	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.02	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.02	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	3.3	0.06	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.15	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.32	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.43	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	2.2	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.76	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.97	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.30	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.09	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.22	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.86	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.99	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.43	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	8.78	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	15.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	4.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	2.03	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.24	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.50	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.78	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	4.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	4.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.04	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.30	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.00	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.43	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.41	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.22	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.73	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.63	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 300.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.448E-06 3.312E-06 3.257E-06 3.143E-06 2.685E-06 2.366E-06 2.243E-06
0.002 0.006 0.010 0.032 0.248 0.270 0.334 0.443 0.594 1.458
0.00019 0.00069 0.00111 0.00345 0.02683 0.02917 0.03618 0.04787 0.06424 0.15776

2.242E-06 2.192E-06 1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.356E-06 1.323E-06
1.545 1.891 2.150 2.388 3.469 3.771 4.528 4.852 4.874 5.846
0.16711 0.20452 0.23258 0.25830 0.37520 0.40793 0.48976 0.52483 0.52717 0.63238

1.273E-06 1.190E-06 1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07
6.343 6.776 11.769 12.698 12.849 13.628 13.757 22.187 23.786 24.111
0.68616 0.73292 1.27300 1.37354 1.38990 1.47407 1.48810 2.39993 2.57295 2.60802

6.887E-07 6.684E-07 6.477E-07 5.752E-07 5.516E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.528E-07
33.578 33.881 36.366 45.142 45.163 45.596 49.919 64.919 69.523 70.799
3.63208 3.66481 3.93368 4.88292 4.88526 4.93202 5.39963 7.02222 7.52022 7.65817

3.479E-07 3.265E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07
75.770 81.736 81.822 82.968 90.230 91.462 92.500 93.516 95.547 95.958
8.19592 8.84121 8.85056 8.97448 9.76006 9.89333 10.00555 10.11544 10.33522 10.37964

```
   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.066      96.282      96.585      96.779      97.039      97.774
99.114      99.741      99.914     100.000
    10.39133    10.41471    10.44744    10.46848    10.49654    10.57603
10.72099    10.78879    10.80750    10.81685
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.158
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.272
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.372
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.397
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.570
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   3.629
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(11)=   4.879
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
16	1	-11.07050	-16.43962	-1.16233
16	2	-13.00780	-13.04051	-0.01108
16	3	-13.00800	-14.05353	-0.35626
16	4	-13.03054	-15.86153	-0.98591
16	5	-13.31455	-16.04892	-1.05845
16	6	-13.68351	-16.10638	-1.08416
16	7	-13.71559	-16.15877	-1.10792
16	8	-13.96752	-16.23346	-1.14568
16	9	-14.00160	-16.38713	-1.22456
16	10	-14.18845	-16.51821	-1.29757
16	11	-14.36856	NUMXQ(K)= 11	

2.562E-06	0.108	1.000
1.893E-06	0.325	3.000
1.591E-06	0.541	5.000
1.219E-06	1.082	10.000
1.027E-06	1.623	15.000
9.016E-07	2.163	20.000
8.086E-07	2.704	25.000
7.330E-07	3.245	30.000

6.719E-07	3.786	35.000
6.199E-07	4.327	40.000
5.763E-07	4.868	45.000
1.638E-06	0.5	4.62

ANNUAL AVERAGE = 4.95E-10

K= 16 FIVEXQ(K)= 1.638E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 1.22E-04

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.562	5.577	6.938	13.038	68.870	96.369
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.7	0.01	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	8.743E-06
A	2.2	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	6.610E-06
A	3.3	0.31	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	0.33	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.22	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.18	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.20	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.04	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	1.1	0.00	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.121E-06
B	1.7	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.12	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.29	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.22	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.12	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.05	900.	0.	131.	128.1					

98.0	0.0	0.000E+00	0.000E+00	3.897E-07		
C	1.1	0.01	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.362E-06		
C	1.7	0.07	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	4.309E-06		
C	2.2	0.21	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	3.257E-06		
C	3.3	0.42	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.192E-06		
C	4.4	0.56	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.650E-06		
C	5.4	0.63	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.323E-06		
C	6.5	0.52	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.105E-06		
C	8.7	0.79	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
C	10.8	0.27	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.17	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.50	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.03	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	5.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	7.33	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.11	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	9.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	3.90	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	1.98	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.73	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.24	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.35	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		

E	7.0	5.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	6.91	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.44	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	1.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.18	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.25	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.69	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.01	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 300.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	9.121E-06	8.835E-06	8.743E-06	6.610E-06	6.362E-06	6.177E-06	4.813E-06	4.670E-06	4.448E-06	
0.005	0.009	0.023	0.030	0.124	0.136	0.178	0.189	0.306	0.620	
0.00468	0.00935	0.02338	0.03039	0.12392	0.13561	0.17769	0.18938	0.30628	0.61958	

4.309E-06	3.349E-06	3.312E-06	3.257E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06	2.242E-06	2.192E-06
0.685	1.012	1.581	1.791	2.083	2.301	2.565	4.068	4.246	4.664
0.68504	1.01237	1.58051	1.79093	2.08319	2.30062	2.56482	4.06818	4.24587	4.66437

1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.356E-06	1.323E-06	1.273E-06	1.190E-06
4.922	5.653	7.685	7.882	8.438	8.655	8.702	9.329	10.568	10.865
4.92156	5.65336	7.68511	7.88151	8.43796	8.65540	8.70216	9.32875	10.56791	10.86484

1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07
16.289	16.813	17.262	19.146	19.265	26.590	27.381	27.944	35.026	35.300
16.28907	16.81279	17.26170	19.14615	19.26539	26.59045	27.38070	27.94417	35.02607	35.29961

6.477E-07	5.752E-07	5.516E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.897E-07	3.528E-07	3.479E-07
40.551	46.658	46.695	47.532	54.051	63.134	69.482	69.531	71.319	75.219
40.55083	46.65778	46.69518	47.53220	54.05064	63.13390	69.48165	69.53075	71.31934	75.21918

3.265E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07
1.779E-07 1.415E-07 1.336E-07 1.076E-07
80.396 80.569 82.441 89.353 90.919 92.359
93.397 95.373 96.477 96.657
80.39558 80.56860 82.44136 89.35258 90.91907 92.35930
93.39738 95.37302 96.47659 96.65662

9.605E-08 8.032E-08 6.505E-08 4.918E-08 4.375E-08 3.310E-08
2.491E-08 1.998E-08 1.668E-08 1.253E-08
96.904 97.164 97.351 97.613 97.629 98.347
99.039 99.518 99.785 99.988
96.90445 97.16397 97.35101 97.61287 97.62923 98.34701
99.03906 99.51836 99.78489 99.98830

1.009E-08
100.000
99.99998

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE ORDERED X/Q-FREQUENCY VALUES, AND AS PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY
3.904E-06	1.000	1.000
2.689E-06	3.000	3.000
2.124E-06	5.000	5.000
1.510E-06	10.000	10.000
1.200E-06	15.000	15.000
1.020E-06	20.000	20.000
8.933E-07	25.000	25.000
8.042E-07	30.000	30.000
7.343E-07	35.000	35.000
6.737E-07	40.000	40.000
6.198E-07	45.000	45.000
5.711E-07	50.000	50.000
5.261E-07	55.000	55.000
4.841E-07	60.000	60.000
4.441E-07	65.000	65.000
4.055E-07	70.000	70.000
3.676E-07	75.000	75.000
3.296E-07	80.000	80.000

2.124E-06 5.0 5.00

K= 17 FIVEXQ(K)= 2.124E-06 FIVEPR(K)= 5.000

FUMIGATION X/Q AT THE BOUNDARY: 1.22E-04

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.417	5.067	6.727	16.153	61.158	96.932
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 9.121E-06 8.835E-06 8.743E-06 6.610E-06 6.362E-06 6.177E-06 4.813E-06 4.670E-06 4.448E-06
0.005 0.009 0.023 0.030 0.124 0.136 0.178 0.189 0.306 0.620
0.00468 0.00935 0.02338 0.03039 0.12392 0.13561 0.17769 0.18938 0.30628 0.61958

4.309E-06 3.349E-06 3.312E-06 3.257E-06 3.143E-06 2.685E-06 2.366E-06 2.243E-06 2.242E-06 2.192E-06
0.685 1.012 1.581 1.791 2.083 2.301 2.565 4.068 4.246 4.664
0.68504 1.01237 1.58051 1.79093 2.08319 2.30062 2.56482 4.06818 4.24587 4.66438

1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.356E-06 1.323E-06 1.273E-06 1.190E-06
4.922 5.653 7.685 7.882 8.438 8.655 8.702 9.329 10.568 10.865
4.92156 5.65336 7.68511 7.88151 8.43796 8.65540 8.70216 9.32875 10.56791 10.86484

1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07
16.289 16.813 17.262 19.146 19.265 26.590 27.381 27.944 35.026 35.300
16.28908 16.81280 17.26170 19.14615 19.26540 26.59045 27.38071 27.94417 35.02608 35.29963

6.477E-07 5.752E-07 5.516E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07 3.479E-07
40.551 46.658 46.695 47.532 54.051 63.134 69.482 69.531 71.319 75.219
40.55086 46.65780 46.69521 47.53222 54.05066 63.13391 69.48168 69.53077 71.31938 75.21923

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   3.265E-07   2.719E-07   2.656E-07   2.453E-07   2.130E-07   1.975E-07
1.779E-07   1.415E-07   1.336E-07   1.076E-07
      80.396      80.569      82.441      89.353      90.919      92.359
93.397      95.373      96.477      96.657
    80.39565    80.56865    82.44141    89.35265    90.91914    92.35938
93.39746    95.37309    96.47665    96.65665

   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.904      97.164      97.351      97.613      97.629      98.347
99.039      99.518      99.785      99.988
    96.90450    97.16402    97.35105    97.61292    97.62927    98.34705
99.03911    99.51839    99.78493    99.98833

   1.009E-08
     100.000
   100.00000

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY


                                                                ERROR IN
NORMAL TRANSFORMATION FOR A( 71)= 100.00000

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1     -11.07050 -14.55155  -0.89101
 18  2     -12.32295 -14.19583  -0.74879
 18  3     -12.67032 -14.70677  -0.99958
 18  4     -13.29402 -14.08011  -0.55619
 18  5     -13.31455 -14.60405  -0.93685
 18  6     -13.68351 -14.46370  -0.79401
 18  7     -13.96752 -14.37579  -0.65332
 18  8     -14.93482     NUMXQ(K)=  8
    3.904E-06              1.000              1.000
    2.689E-06              3.000              3.000
    2.124E-06              5.000              5.000
    1.510E-06             10.000             10.000
    1.200E-06             15.000             15.000
    1.020E-06             20.000             20.000
    8.933E-07             25.000             25.000
    8.042E-07             30.000             30.000
    7.343E-07             35.000             35.000
    6.737E-07             40.000             40.000
    6.198E-07             45.000             45.000
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5.711E-07	50.000	50.000
5.261E-07	55.000	55.000
4.841E-07	60.000	60.000
4.441E-07	65.000	65.000
4.055E-07	70.000	70.000
3.676E-07	75.000	75.000
3.296E-07	80.000	80.000
2.124E-06	5.0	5.00

K= 18 FIVEXQ(K)= 2.124E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-3.14098	0.08420	6.22377
2	-2.10573	1.76138	3.53187
3	-2.87508	0.20196	3.10925
4	-2.76480	0.28479	3.53945
5	-2.57624	0.49942	4.77421
6	-2.79974	0.25572	4.27580
7	-3.17201	0.07570	5.37250
8	-3.34230	0.04155	5.06821
9	-3.32105	0.04485	10.01358
10	-3.44214	0.02886	5.86067
11	-3.38024	0.03622	4.97718
12	-3.50718	0.02265	4.96786
13	-3.36428	0.03838	7.81606
14	-3.27173	0.05345	8.71109
15	-3.39969	0.03374	10.94163
16	-3.28696	0.05065	10.81685

K	HOURS(K)	TOTHRS
1	7.37570	7.37570
2	154.29710	161.67280
3	17.69208	179.36490
4	24.94769	204.31260
5	43.74879	248.06140
6	22.40123	270.46260
7	6.63166	277.09430
8	3.63981	280.73410
9	3.92856	284.66270
10	2.52819	287.19090
11	3.17250	290.36340
12	1.98412	292.34750
13	3.36204	295.70950
14	4.68252	300.39210
15	2.95529	303.34740
16	4.43660	307.78390

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.670E-06	3.057E-10	-1.0263	-12.5913			
					1	8.0	-14.72544
					2	16.0	-15.43682
					3	72.0	-16.98046
					4	624.0	-19.19676
2	1.707E-06	7.476E-10	-0.9223	-12.6415			
					1	8.0	-14.55931
					2	16.0	-15.19859
					3	72.0	-16.58577
					4	624.0	-18.57743
3	2.207E-06	1.849E-09	-0.8449	-12.4382			

					1	8.0	-14.19517
					2	16.0	-14.78082
					3	72.0	-16.05162
					4	624.0	-17.87619
4	2.543E-06	2.939E-09	-0.8066	-12.3230			
					1	8.0	-14.00019
					2	16.0	-14.55927
					3	72.0	-15.77242
					4	624.0	-17.51421
5	3.308E-06	5.685E-09	-0.7592	-12.0928			
					1	8.0	-13.67162
					2	16.0	-14.19789
					3	72.0	-15.33985
					4	624.0	-16.97943
6	2.487E-06	3.111E-09	-0.7971	-12.3520			
					1	8.0	-14.00955
					2	16.0	-14.56207
					3	72.0	-15.76101
					4	624.0	-17.48240
7	1.695E-06	9.258E-10	-0.8960	-12.6665			
					1	8.0	-14.52962
					2	16.0	-15.15066
					3	72.0	-16.49828
					4	624.0	-18.43312
8	1.365E-06	1.282E-10	-1.1059	-12.7375			
					1	8.0	-15.03718
					2	16.0	-15.80375
					3	72.0	-17.46715
					4	624.0	-19.85538
9	1.549E-06	4.172E-10	-0.9803	-12.6984			
					1	8.0	-14.73681
					2	16.0	-15.41629
					3	72.0	-16.89070
					4	624.0	-19.00759
10	1.297E-06	3.012E-10	-0.9979	-12.8637			
					1	8.0	-14.93884
					2	16.0	-15.63055
					3	72.0	-17.13152
					4	624.0	-19.28653
11	1.282E-06	2.594E-10	-1.0143	-12.8643			
					1	8.0	-14.97356
					2	16.0	-15.67664
					3	72.0	-17.20227
					4	624.0	-19.39270
12	1.199E-06	2.450E-10	-1.0132	-12.9315			
					1	8.0	-15.03846
					2	16.0	-15.74078
					3	72.0	-17.26477
					4	624.0	-19.45284
13	1.417E-06	7.355E-10	-0.9021	-12.8414			
					1	8.0	-14.71717
					2	16.0	-15.34243
					3	72.0	-16.69919
					4	624.0	-18.64716
14	1.186E-06	4.509E-10	-0.9392	-12.9935			
					1	8.0	-14.94657
					2	16.0	-15.59758
					3	72.0	-17.01021
					4	624.0	-19.03841
15	1.279E-06	1.005E-10	-1.1271	-12.7885			

					1	8.0	-15.13225
					2	16.0	-15.91350
					3	72.0	-17.60876
					4	624.0	-20.04273
16	1.638E-06	4.952E-10	-0.9665	-12.6522			
					1	8.0	-14.66194
					2	16.0	-15.33185
					3	72.0	-16.78552
					4	624.0	-18.87262
17	2.124E-06	5.685E-09	-0.7064	-12.5726			
					1	8.0	-14.04152
					2	16.0	-14.53115
					3	72.0	-15.59362
					4	624.0	-17.11907
18	2.124E-06	5.685E-09	-0.7064	-12.5726			
					1	8.0	-14.04152
					2	16.0	-14.53115
					3	72.0	-15.59362
					4	624.0	-17.11907

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

0-2 HR X/Q IS

SECTOR	DOWNWIND DISTANCE EXCEEDED (METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS	1-4 DAYS	4-30 DAYS
		ANNUAL AVERAGE	IN SECTOR	SECTOR		
S	300.	1.67E-06	4.03E-07	1.98E-07	4.22E-08	4.60E-09
		3.06E-10	7.4	S		
SSW	300.	1.71E-06	4.75E-07	2.51E-07	6.26E-08	8.55E-09
		7.48E-10	154.3	SSW		
SW	300.	2.21E-06	6.84E-07	3.81E-07	1.07E-07	1.72E-08
		1.85E-09	17.7	SW		
WSW	300.	2.54E-06	8.31E-07	4.75E-07	1.41E-07	2.48E-08
		2.94E-09	24.9	WSW		
W	300.	3.31E-06	1.15E-06	6.82E-07	2.18E-07	4.23E-08
		5.69E-09	43.7	W		
WNW	300.	2.49E-06	8.24E-07	4.74E-07	1.43E-07	2.56E-08
		3.11E-09	22.4	WNW		
NW	300.	1.70E-06	4.90E-07	2.63E-07	6.84E-08	9.88E-09
		9.26E-10	6.6	NW		
NNW	300.	1.37E-06	2.95E-07	1.37E-07	2.59E-08	2.38E-09
		1.28E-10	3.6	NNW		
N	300.	1.55E-06	3.98E-07	2.02E-07	4.62E-08	5.56E-09
		4.17E-10	3.9	N		
NNE	300.	1.30E-06	3.25E-07	1.63E-07	3.63E-08	4.21E-09
		3.01E-10	2.5	NNE		
NE	300.	1.28E-06	3.14E-07	1.55E-07	3.38E-08	3.78E-09
		2.59E-10	3.2	NE		
ENE	300.	1.20E-06	2.94E-07	1.46E-07	3.18E-08	3.56E-09
		2.45E-10	2.0	ENE		
E	300.	1.42E-06	4.06E-07	2.17E-07	5.59E-08	7.97E-09
		7.36E-10	3.4	E		
ESE	300.	1.19E-06	3.23E-07	1.68E-07	4.10E-08	5.39E-09
		4.51E-10	4.7	ESE		
SE	300.	1.28E-06	2.68E-07	1.23E-07	2.25E-08	1.97E-09
		1.01E-10	3.0	SE		
SSE	300.	1.64E-06	4.29E-07	2.20E-07	5.13E-08	6.36E-09
		4.95E-10	4.4	SSE		
MAX X/Q		3.31E-06				
TOTAL HOURS AROUND SITE:		307.8				
SRP 2.3.4	300.	2.12E-06	7.98E-07	4.89E-07		

1.69E-07	3.68E-08	5.69E-09			
SITE LIMIT		2.12E-06	7.98E-07	4.89E-07	
1.69E-07	3.68E-08	5.69E-09			

0.5 PERCENT X/Q TO AN INDIVIDUAL IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

SECTOR	DOWNWIND DISTANCE (METERS)	FUMIGATION X/Q
S	300.	1.22E-04
SSW	300.	1.22E-04
SW	300.	1.22E-04
WSW	300.	1.22E-04
W	300.	1.22E-04
WNW	300.	1.22E-04
NW	300.	1.22E-04
NNW	300.	1.22E-04
N	300.	1.22E-04
NNE	300.	1.22E-04
NE	300.	1.22E-04
ENE	300.	1.22E-04
E	300.	1.22E-04
ESE	300.	1.22E-04
SE	300.	1.22E-04
SSE	300.	1.22E-04

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY. CHECK THE REASONABLENESS OF THE ENVELOPES COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
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TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.19	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	0.04	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	8.7	0.08	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.04	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.04	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	2.2	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.45	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.11	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	2.2	0.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.68	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.98	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.79	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.30	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.53	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.15	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.04	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	7.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.11	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	8.90	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	8.75	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	10.44	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	2.59	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.94	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.15	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	3.83	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.13	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.90	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.30	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.99	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       2.33     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.09     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.45     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.08     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       28.5       0.04     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.31     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.64     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        9.3       0.04     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
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TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.670E-06	4.448E-06	3.349E-06	3.312E-06	3.257E-06	3.143E-06	2.366E-06	
0.006	0.021	0.036	0.074	0.262	0.299	0.975	1.126	1.577	1.614	
0.00035	0.00129	0.00226	0.00460	0.01629	0.01863	0.06071	0.07006	0.09812	0.10046	

2.243E-06	2.192E-06	1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.356E-06	1.323E-06	
3.154	3.831	3.906	4.695	7.211	7.287	8.263	8.376	8.414	9.202	
0.19632	0.23840	0.24308	0.29218	0.44883	0.45350	0.51429	0.52131	0.52364	0.57274	

1.273E-06	1.190E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	
10.668	10.968	18.819	19.120	19.721	21.599	21.637	29.751	30.277	30.653	
0.66393	0.68263	1.17128	1.18998	1.22739	1.34429	1.34663	1.85165	1.88438	1.90776	

6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.516E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.528E-07	
39.556	39.706	44.853	53.606	53.643	54.620	61.269	71.713	78.475	80.466	
2.46187	2.47122	2.79153	3.33630	3.33863	3.39942	3.81326	4.46323	4.88407	5.00799	

3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	
83.058	86.889	86.927	89.256	93.388	94.478	95.379	95.830	96.769	96.844	
5.16931	5.40779	5.41013	5.55509	5.81227	5.88008	5.93619	5.96425	6.02270	6.02737	

```
   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.253E-08
      97.107      97.408      97.558      97.708      97.746      99.061
99.700      99.962     100.000
     6.04374     6.06244     6.07180     6.08115     6.08349     6.16532
6.20506     6.22143     6.22377

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.098
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.514
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.170
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.850
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.333
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.460

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  1  1     -11.07050 -16.20927  -1.14301
  1  2     -12.67032 -16.43608  -1.21627
  1  3     -13.31455 -16.47506  -1.23146
  1  4     -13.68351 -17.24006  -1.56893
  1  5     -13.96752 -17.28809  -1.59196
  1  6     -14.36856 -18.27542  -2.13033
  1  7     -14.65458     NUMXQ(K)=  7
    3.657E-06              0.062              1.000
    2.476E-06              0.187              3.000
    2.029E-06              0.311              5.000
    1.520E-06              0.622             10.000
    1.268E-06              0.934             15.000
    1.100E-06              1.245             20.000
    9.589E-07              1.556             25.000
    8.543E-07              1.867             30.000
    7.719E-07              2.178             35.000
    7.055E-07              2.490             40.000
    6.506E-07              2.801             45.000
    6.044E-07              3.112             50.000
    5.612E-07              3.423             55.000
    5.158E-07              3.734             60.000
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4.768E-07	4.045	65.000
4.428E-07	4.357	70.000
1.670E-06	0.5	8.03

ANNUAL AVERAGE = 1.63E-09

K= 1 FIVEXQ(K)= 1.670E-06 FIVEPR(K)= 8.034

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.376	3.982	5.034	12.976	65.311	97.183	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.13	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	6.610E-06
A	3.3	0.40	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	0.20	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.40	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.07	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.26	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.13	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
B	1.1	0.07	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.121E-06
B	1.7	0.07	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.46	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.99	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.73	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	8.7	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.20	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	1.1	0.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.20	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	0.46	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06

C	3.3	0.93	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.192E-06						
C	4.4	0.79	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.650E-06						
C	5.4	0.40	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.323E-06						
C	6.5	0.53	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.105E-06						
C	8.7	0.13	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
C	10.8	0.07	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
C	26.5	0.20	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.719E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.19	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	2.65	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	3.51	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	7.88	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	11.58	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	10.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.55	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	7.48	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.85	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.66	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.92	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.85	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	8.67	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.66	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						

F	0.3	0.01	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.813E-06			
F	1.2	0.46	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.024E-06			
F	1.8	0.79	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	6.935E-07			
F	2.4	0.86	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	5.243E-07			
F	3.5	1.26	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	3.528E-07			
F	4.7	1.26	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	2.656E-07			
F	5.9	0.60	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	2.130E-07			
F	7.0	0.26	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.779E-07			
G	1.2	0.60	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	9.605E-08			
G	1.8	0.33	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	6.505E-08			
G	2.4	0.60	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	4.918E-08			
G	3.5	0.53	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	3.310E-08			
G	4.7	0.20	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	2.491E-08			
G	5.9	0.26	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	1.998E-08			

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	9.121E-06	8.835E-06	6.610E-06	6.362E-06	6.177E-06	4.813E-06	4.670E-06	4.448E-06	4.309E-06	
0.010	0.076	0.095	0.227	0.360	0.426	0.438	0.901	1.299	1.497	
0.00035	0.00268	0.00336	0.00803	0.01271	0.01505	0.01547	0.03184	0.04587	0.05288	
3.349E-06	3.312E-06	3.257E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06	2.242E-06	2.192E-06	1.897E-06	
1.696	2.887	3.351	4.344	4.741	5.469	8.117	8.183	9.110	9.441	
0.05990	0.10198	0.11835	0.15342	0.16745	0.19316	0.28668	0.28902	0.32176	0.33345	
1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.356E-06	1.323E-06	1.273E-06	1.190E-06	1.141E-06	1.105E-06	
10.434	13.943	14.207	15.002	15.134	15.531	17.451	17.583	25.461	25.991	
0.36852	0.49243	0.50178	0.52984	0.53452	0.54854	0.61635	0.62102	0.89925	0.91795	
1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07	6.477E-07	5.752E-07	
26.454	29.300	29.499	41.084	41.216	42.010	52.006	52.073	58.163	64.716	
0.93432	1.03486	1.04187	1.45103	1.45570	1.48376	1.83680	1.83914	2.05424	2.28570	
5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	
65.577	74.249	81.729	86.959	88.217	90.070	92.056	92.255	93.513	95.234	
2.31610	2.62238	2.88658	3.07128	3.11570	3.18117	3.25131	3.25832	3.30275	3.36354	

```
   2.130E-07   1.975E-07   1.779E-07   1.415E-07   9.605E-08   8.032E-08
6.505E-08   4.918E-08   3.310E-08   2.491E-08
      95.830      96.492      96.756      97.418      98.014      98.080
98.411      99.007      99.537      99.735
     3.38458     3.40796     3.41731     3.44069     3.46173     3.46407
3.47576     3.49680     3.51551     3.52252

   1.998E-08
     100.000
     3.53187

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.015
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.153
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.321
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.529
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.898
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.449
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.052

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1     -11.07050 -15.78542  -1.04874
  2  2     -11.99462 -15.73207  -1.03398
  2  3     -12.67032 -17.18987  -1.52629
  2  4     -13.03054 -17.61037  -1.68060
  2  5     -13.31455 -18.28435  -1.94427
  2  6     -13.68351 -17.36184  -1.55443
  2  7     -13.96752 -18.35311  -2.00837
  2  8     -14.24977      NUMXQ(K)=  8
    4.883E-06              0.035              1.000
    3.530E-06              0.106              3.000
    2.941E-06              0.177              5.000
    2.081E-06              0.353             10.000
    1.650E-06              0.530             15.000
    1.354E-06              0.706             20.000
    1.156E-06              0.883             25.000
```

1.037E-06	1.060	30.000
9.466E-07	1.236	35.000
8.731E-07	1.413	40.000
7.989E-07	1.589	45.000
7.337E-07	1.766	50.000
6.785E-07	1.943	55.000
1.707E-06	0.5	14.16

ANNUAL AVERAGE = 3.81E-09

K= 2 FIVEXQ(K)= 1.707E-06 FIVEPR(K)=14.157

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.589	5.428	8.407	13.914	67.279	97.484
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.75	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	6.610E-06
A	3.3	0.75	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	0.83	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.75	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.15	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.68	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
B	1.1	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.121E-06
B	1.7	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.38	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.68	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.83	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.23	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	26.5	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	1.1	0.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.75	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	0.83	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06

C	3.3	1.13	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.192E-06						
C	4.4	0.60	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.650E-06						
C	5.4	0.23	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.323E-06						
C	8.7	0.30	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
D	0.2	0.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	2.11	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	6.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	5.87	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	9.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	9.40	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	8.87	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	3.91	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	0.98	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.75	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.58	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.84	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.14	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.19	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.88	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.28	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.45	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.03	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.68	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       1.05    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.35    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       0.53    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F         5.9       0.45    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F         7.0       0.23    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07

   G         1.2       0.45    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.38    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.38    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       1.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.38    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.08    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 9.121E-06 8.835E-06 6.610E-06 6.362E-06 6.177E-06 4.813E-06 4.670E-06 4.448E-06 4.309E-06
0.017 0.093 0.114 0.866 1.017 1.092 1.117 1.493 2.245 2.997
0.00054 0.00288 0.00355 0.02693 0.03161 0.03394 0.03474 0.04643 0.06981 0.09319

3.349E-06 3.312E-06 3.257E-06 3.143E-06 2.685E-06 2.366E-06 2.243E-06 2.242E-06 2.192E-06 1.897E-06
3.824 5.930 6.757 7.434 8.186 9.013 15.028 15.179 16.307 16.608
0.11890 0.18437 0.21009 0.23113 0.25451 0.28023 0.46727 0.47195 0.50702 0.51637

1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.323E-06 1.273E-06 1.190E-06 1.141E-06 1.024E-06
17.735 23.601 24.278 24.879 25.105 25.330 26.909 26.985 36.008 36.986
0.55144 0.73381 0.75485 0.77355 0.78057 0.78758 0.83668 0.83902 1.11958 1.14998

9.624E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.477E-07 5.752E-07 5.243E-07 4.876E-07 4.321E-07
39.618 49.017 49.318 49.995 58.868 65.711 71.726 72.779 79.923 83.833
1.23181 1.52406 1.53341 1.55446 1.83034 2.04311 2.23015 2.26288 2.48499 2.60657

3.909E-07 3.897E-07 3.528E-07 3.479E-07 3.265E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07
89.021 89.097 90.450 91.428 93.308 93.834 95.112 95.563 95.789 96.015
2.76790 2.77023 2.81232 2.84271 2.90116 2.91753 2.95728 2.97130 2.97832 2.98533

1.415E-07 9.605E-08 8.032E-08 6.505E-08 4.918E-08 3.310E-08
2.491E-08 1.998E-08
96.767 97.218 97.669 98.045 98.421 99.549
99.925 100.000
3.00871 3.02274 3.03677 3.04846 3.06015 3.09522
3.10691 3.10925

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(3)= HANDCHECK 0.231
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= HANDCHECK 0.506
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= HANDCHECK 0.754
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= HANDCHECK 0.773
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= HANDCHECK 1.522
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= HANDCHECK 2.041

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
3	1	-11.07050	-15.07455	-0.90982
3	2	-11.96509	-16.08464	-1.20538
3	3	-12.67032	-16.57723	-1.37928
3	4	-13.03054	-17.83765	-1.86944
3	5	-13.29402	-18.91022	-2.31074
3	6	-13.31455	-19.45847	-2.53714
3	7	-13.96752	-19.10695	-2.37473
3	8	-14.24977		

NUMXQ(K)= 8

6.388E-06	0.031	1.000
4.397E-06	0.093	3.000
3.652E-06	0.155	5.000
2.753E-06	0.311	10.000
2.281E-06	0.466	15.000
1.918E-06	0.622	20.000
1.643E-06	0.777	25.000
1.386E-06	0.933	30.000
1.197E-06	1.088	35.000
1.051E-06	1.244	40.000
9.358E-07	1.399	45.000
8.430E-07	1.555	50.000
7.699E-07	1.710	55.000

7.079E-07	1.866	60.000
6.547E-07	2.021	65.000
2.207E-06	0.5	16.08

ANNUAL AVERAGE = 7.56E-09

K= 3 FIVEXQ(K)= 2.207E-06 FIVEPR(K)=16.081

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
3.910	7.896	10.603	15.892	68.847	97.218
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
										AT 131.4 METERS
CA=1292.SQ.METERS										
A	2.2	0.66	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	6.610E-06
A	3.3	1.52	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	1.19	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.73	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.86	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.73	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.07	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
B	1.7	0.59	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.53	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.73	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	1.19	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.07	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.07	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
C	1.1	0.07	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.92	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	1.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	1.12	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06

C	4.4	0.73	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.650E-06		
C	5.4	0.53	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.323E-06		
C	6.5	0.20	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.105E-06		
C	8.7	0.13	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	1.72	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	6.14	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	6.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	11.49	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	12.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	8.12	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.91	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.73	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.13	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.03	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	1.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	2.71	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.37	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	9.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	5.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	2.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	0.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	0.40	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.07	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	1.06	90000.	0.	131.	1000.0

```
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F        2.4       0.66     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       1.12     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.66     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07

   G        1.2       0.40     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.86     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.610E-06	6.362E-06	6.177E-06	4.813E-06	4.670E-06	4.448E-06	4.309E-06	3.349E-06		
0.014	0.039	0.700	0.766	1.361	1.378	1.906	3.426	4.350	5.539		
0.00050	0.00140	0.02478	0.02712	0.04816	0.04877	0.06747	0.12125	0.15398	0.19606		

3.312E-06	3.257E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06	2.242E-06	2.192E-06	1.897E-06	1.880E-06		
7.257	8.314	9.040	9.767	10.956	17.099	17.958	19.081	19.213	20.534		
0.25685	0.29426	0.31998	0.34570	0.38778	0.60522	0.63561	0.67536	0.68004	0.72680		

1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.356E-06	1.323E-06	1.273E-06	1.190E-06	1.141E-06	1.105E-06		
27.074	27.800	28.527	28.593	28.659	29.188	31.896	31.962	43.456	43.654		
0.95826	0.98398	1.00970	1.01204	1.01437	1.03308	1.12894	1.13128	1.53809	1.54511		

1.024E-06	9.624E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07		
44.314	47.683	60.036	60.168	61.225	69.350	78.466	82.033	82.693	88.440		
1.56849	1.68773	2.12494	2.12962	2.16702	2.45460	2.77725	2.90350	2.92688	3.13029		

4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	1.975E-07	1.415E-07	9.605E-08		
91.347	93.989	95.112	95.838	96.433	97.094	97.490	97.754	97.886	98.283		
3.23317	3.32669	3.36643	3.39215	3.41320	3.43658	3.45060	3.45996	3.46463	3.47866		

8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08
98.349	98.613	98.877	99.736	100.000
3.48100	3.49035	3.49970	3.53010	3.53945

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.154
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.320
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.675
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.983
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.009
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   1.536
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.123
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
4	1	-11.07050	-14.72917	-0.82832
4	2	-11.99462	-15.47889	-1.05542
4	3	-12.35483	-16.36183	-1.35371
4	4	-12.67032	-16.50110	-1.40478
4	5	-13.03054	-17.75801	-1.91355
4	6	-13.29402	-18.24297	-2.12143
4	7	-13.31455	-18.58681	-2.26944
4	8	-13.68351	-18.34835	-2.15907
4	9	-13.96752	NUMXQ(K)= 9	

6.630E-06	0.035	1.000
4.853E-06	0.106	3.000
4.064E-06	0.177	5.000
2.999E-06	0.354	10.000
2.470E-06	0.531	15.000
2.123E-06	0.708	20.000
1.817E-06	0.885	25.000
1.581E-06	1.062	30.000
1.383E-06	1.239	35.000
1.229E-06	1.416	40.000
1.107E-06	1.593	45.000
1.010E-06	1.770	50.000
9.290E-07	1.947	55.000

8.594E-07 2.124 60.000

2.543E-06 0.5 14.13

ANNUAL AVERAGE = 1.20E-08

K= 4 FIVEXQ(K)= 2.543E-06 FIVEPR(K)=14.126

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01 5.200E-01 4.072E-01 3.613E-01 2.419E-01 2.081E-01
1.693E-02
5.747 10.503 13.806 17.985 71.703 97.952
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.15	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	8.743E-06
A	2.2	0.73	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	6.610E-06
A	3.3	2.89	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	2.11	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.64	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.39	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.10	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
B	1.7	0.24	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	1.03	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	1.67	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.29	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.24	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.15	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
C	1.7	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	1.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.83	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.49	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.24	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06

C	6.5	0.10	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.10	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	1.37	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	4.26	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	6.37	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	11.12	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	10.53	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	6.56	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	5.04	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	4.26	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	1.18	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.88	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	1.18	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.76	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	3.18	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	8.23	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	6.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	3.33	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	1.81	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	1.91	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	0.54	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	1.03	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.54	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.98	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.64	90000.	0.	131.	1000.0					

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       0.73     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.69     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.24     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F       28.5       0.20     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.39     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.34     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	8.743E-06	6.610E-06	6.177E-06	4.813E-06	4.670E-06	4.448E-06	4.309E-06	3.349E-06	
0.011	0.034	0.181	0.915	1.160	1.174	2.203	5.092	5.141	7.247	
0.00054	0.00161	0.00863	0.04370	0.05539	0.05606	0.10516	0.24310	0.24544	0.34598	

3.312E-06	3.257E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06	2.242E-06	2.192E-06	1.897E-06	1.880E-06	
8.618	10.136	11.801	12.438	12.732	16.992	17.384	18.217	18.461	19.637	
0.41144	0.48392	0.56341	0.59381	0.60783	0.81124	0.82995	0.86969	0.88138	0.93750	

1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	
26.003	26.101	26.591	26.738	26.983	28.746	39.862	39.960	40.499	43.682	
1.24144	1.24612	1.26950	1.27651	1.28820	1.37237	1.90311	1.90778	1.93350	2.08547	

8.590E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	
54.211	54.309	55.288	61.851	61.900	70.127	75.171	75.808	81.831	86.092	
2.58815	2.59282	2.63959	2.95288	2.95522	3.34801	3.58883	3.61922	3.90680	4.11021	

3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.415E-07	9.605E-08	
89.422	90.157	91.332	93.144	93.830	95.739	95.984	96.523	97.405	97.796	
4.26919	4.30426	4.36038	4.44689	4.47962	4.57080	4.58249	4.60821	4.65029	4.66900	

8.032E-08	6.505E-08	4.918E-08	4.375E-08	3.310E-08	2.491E-08
98.825	99.070	99.314	99.510	99.853	100.000
4.71810	4.72979	4.74148	4.75083	4.76719	4.77421

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(3)=	HANDCHECK 0.563
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(4)=	HANDCHECK 1.240
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(5)=	HANDCHECK 1.901
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(6)=	HANDCHECK 2.586
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(7)=	HANDCHECK 3.345

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
5	1	-11.07050	-14.54913	-0.79043
5	2	-12.32295	-15.79575	-1.23306
5	3	-12.67032	-18.06147	-2.12695
5	4	-13.28753	-18.51958	-2.33106
5	5	-13.68351	-18.24760	-2.19996
5	6	-13.96752	-18.81947	-2.49390
5	7	-14.24977	NUMXQ(K)= 7	

6.539E-06	0.048	1.000
5.072E-06	0.143	3.000
4.469E-06	0.239	5.000
3.374E-06	0.477	10.000
2.622E-06	0.716	15.000
2.095E-06	0.955	20.000
1.751E-06	1.194	25.000
1.489E-06	1.432	30.000
1.291E-06	1.671	35.000
1.138E-06	1.910	40.000
1.022E-06	2.148	45.000
9.268E-07	2.387	50.000
8.458E-07	2.626	55.000
7.697E-07	2.865	60.000
7.049E-07	3.103	65.000
6.491E-07	3.342	70.000
3.308E-06	0.5	10.47

ANNUAL AVERAGE = 2.26E-08

K= 5 FIVEXQ(K)= 3.308E-06 FIVEPR(K)=10.473

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
7.003	10.382	14.006	18.036	69.615	98.629	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.16	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	6.610E-06
A	3.3	1.37	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	2.19	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.93	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.16	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.16	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	2.2	0.27	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	1.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	1.15	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.49	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	8.7	0.11	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	2.2	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	2.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	1.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06

C	6.5	0.16	2000.	0.	131.	200.0		
114.9	0.0	0.000E+00	0.000E+00	1.105E-06				
C	8.7	0.16	2000.	0.	131.	200.0		
114.9	0.0	0.000E+00	0.000E+00	8.302E-07				
C	10.8	0.11	2000.	0.	131.	200.0		
114.9	0.0	0.000E+00	0.000E+00	6.684E-07				
D	0.2	0.01	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.556E-05				
D	1.1	1.09	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.312E-06				
D	1.7	3.61	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	2.243E-06				
D	2.2	4.21	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.696E-06				
D	3.3	9.79	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.141E-06				
D	4.4	9.19	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	8.590E-07				
D	5.4	7.05	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	6.887E-07				
D	6.5	5.58	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	5.752E-07				
D	8.7	5.14	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	4.321E-07				
D	10.8	1.31	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.479E-07				
D	26.5	0.38	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.415E-07				
E	0.3	0.02	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.835E-06				
E	1.2	0.93	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.880E-06				
E	1.8	2.35	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.273E-06				
E	2.4	2.62	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	9.624E-07				
E	3.5	6.18	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	6.477E-07				
E	4.7	7.33	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	4.876E-07				
E	5.9	6.34	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.909E-07				
E	7.0	3.34	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.265E-07				
E	9.3	2.52	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	2.453E-07				
E	11.6	1.09	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.975E-07				
E	28.5	0.16	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.032E-08				
F	0.3	0.02	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	4.813E-06				
F	1.2	0.66	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	1.024E-06				
F	1.8	0.60	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	6.935E-07				
F	2.4	0.98	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       1.53     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.98     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.60     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.11     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G        1.2       0.11     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.16     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.27     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.610E-06	4.813E-06	4.670E-06	4.448E-06	3.349E-06	3.312E-06	3.257E-06	3.143E-06	
0.009	0.027	0.191	0.208	0.481	1.848	4.036	5.129	6.059	7.098	
0.00038	0.00115	0.00816	0.00889	0.02058	0.07903	0.17255	0.21931	0.25906	0.30348	
2.685E-06	2.366E-06	2.243E-06	2.242E-06	2.192E-06	1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	
8.027	9.176	12.784	12.949	15.136	15.628	16.557	20.768	20.932	22.080	
0.34323	0.39233	0.54664	0.55365	0.64717	0.66822	0.70796	0.88799	0.89501	0.94410	
1.356E-06	1.323E-06	1.273E-06	1.190E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	
22.135	22.736	25.088	25.197	34.985	35.149	35.805	38.430	38.484	47.671	
0.94644	0.97216	1.07270	1.07737	1.49588	1.50289	1.53095	1.64318	1.64551	2.03830	
8.302E-07	6.935E-07	6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.516E-07	5.243E-07	4.876E-07	4.321E-07	
47.835	48.436	55.490	55.599	61.778	67.356	67.410	68.395	75.722	80.862	
2.04532	2.07104	2.37264	2.37732	2.64152	2.88000	2.88233	2.92442	3.23771	3.45749	
3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	
87.205	88.736	90.048	93.384	94.368	96.883	97.485	98.578	98.688	99.070	
3.72870	3.79417	3.85028	3.99290	4.03498	4.14253	4.16825	4.21501	4.21969	4.23605	

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   1.336E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08
      99.125      99.234      99.399      99.563      99.617      99.891
99.945     100.000
     4.23839     4.24307     4.25008     4.25710     4.25943     4.27112
4.27346     4.27580

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.646
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.943
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.494
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.036
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.639

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  6  1    -11.07050 -15.20969  -0.92530
  6  2    -12.67032 -16.49267  -1.39280
  6  3    -13.03054 -18.16661  -2.06621
  6  4    -13.31455 -18.21896  -2.08851
  6  5    -13.68351 -18.60648  -2.26695
  6  6    -13.96752 -19.23712  -2.57513
  6  7    -14.24977     NUMXQ(K)=  7
    5.426E-06              0.043              1.000
    4.040E-06              0.128              3.000
    3.490E-06              0.214              5.000
    2.680E-06              0.428             10.000
    2.202E-06              0.641             15.000
    1.780E-06              0.855             20.000
    1.497E-06              1.069             25.000
    1.294E-06              1.283             30.000
    1.141E-06              1.497             35.000
    1.011E-06              1.710             40.000
    9.066E-07              1.924             45.000
    8.162E-07              2.138             50.000
    7.362E-07              2.352             55.000
    6.691E-07              2.565             60.000

    2.487E-06              0.5               11.69
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ANNUAL AVERAGE = 1.24E-08

K= 6 FIVEXQ(K)= 2.487E-06 FIVEPR(K)=11.694

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
5.085	10.389	13.506	19.046	66.408	99.289	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06	
A	4.4	0.44	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06	
A	5.4	0.39	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06	
A	6.5	0.39	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06	
A	8.7	0.30	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06	
B	1.7	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06	
B	2.2	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06	
B	3.3	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06	
B	4.4	0.48	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06	
B	5.4	0.57	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06	
B	6.5	0.39	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06	
B	8.7	0.22	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06	
B	10.8	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07	
C	2.2	0.09	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06	
C	3.3	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06	
C	4.4	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06	
C	5.4	1.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06	
C	6.5	0.65	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06	

AT 131.4 METERS
CA=1292.SQ.METERS

C	8.7	0.30	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.61	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	8.36	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	12.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.61	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.66	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.65	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	1.13	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.61	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	3.83	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	3.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.44	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.61	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.30	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.52	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.35	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NW SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.177E-06	4.813E-06	4.670E-06	4.448E-06	3.349E-06	3.312E-06	3.257E-06	3.143E-06
0.005	0.027	0.114	0.125	0.169	0.256	0.691	1.300	1.387	1.648
0.00027	0.00143	0.00611	0.00672	0.00906	0.01373	0.03711	0.06985	0.07452	0.08855

2.685E-06	2.366E-06	2.243E-06	2.242E-06	2.192E-06	1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06
2.040	2.519	3.868	4.259	4.520	5.086	6.218	8.568	8.872	10.004
0.10959	0.13531	0.20779	0.22883	0.24286	0.27326	0.33404	0.46030	0.47666	0.53745

1.584E-06	1.323E-06	1.273E-06	1.190E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07
10.395	11.745	13.268	13.485	21.841	22.494	22.929	26.845	26.889	39.161
0.55850	0.63097	0.71281	0.72450	1.17340	1.20847	1.23185	1.44227	1.44461	2.10393

8.302E-07	6.935E-07	6.887E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.528E-07
39.466	40.249	49.475	57.569	63.183	64.358	73.280	77.936	84.551	86.422
2.12030	2.16239	2.65805	3.09292	3.39453	3.45766	3.93695	4.18712	4.54250	4.64304

3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	9.605E-08
87.075	90.905	92.515	95.518	96.301	96.997	97.302	97.650	97.824	97.868
4.67811	4.88386	4.97036	5.13169	5.17377	5.21118	5.22755	5.24625	5.25560	5.25794

```
   8.032E-08   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08
1.668E-08
      98.259      98.390      98.869      99.391      99.739      99.913
100.000
     5.27898     5.28600     5.31172     5.33977     5.35848     5.36783
5.37250
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

```
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.088
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.229
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.537
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.172
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.102
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.090
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
7	1	-11.07050	-16.18645	-1.12464
7	2	-12.67032	-16.30230	-1.16170
7	3	-13.00800	-16.06239	-1.07709
7	4	-13.31455	-16.61738	-1.29464
7	5	-13.68351	-16.44590	-1.21897
7	6	-13.96752	-17.43600	-1.70594
7	7	-14.24977		

NUMXQ(K)= 7

3.696E-06	0.054	1.000
2.548E-06	0.161	3.000
2.121E-06	0.269	5.000
1.651E-06	0.537	10.000
1.369E-06	0.806	15.000
1.192E-06	1.075	20.000
1.071E-06	1.343	25.000
9.807E-07	1.612	30.000
9.089E-07	1.880	35.000
8.461E-07	2.149	40.000
7.774E-07	2.418	45.000
7.197E-07	2.686	50.000
6.704E-07	2.955	55.000

```
    1.695E-06              0.5                 9.31

ANNUAL AVERAGE =   4.19E-09

K=  7     FIVEXQ(K)= 1.695E-06     FIVEPR(K)= 9.307

FUMIGATION X/Q AT THE BOUNDARY:   7.68E-05

 EXPONENTIAL TERM AND FREQUENCIES

   5.684E-01   5.200E-01   4.072E-01   3.613E-01   2.419E-01   2.081E-01
1.693E-02
       1.610       5.396       7.485      14.634      60.072      98.216
100.000
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.18	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
B	3.3	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.18	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.23	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.28	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.14	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	3.3	0.18	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.46	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.55	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.23	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.60	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	6.18	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	10.79	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.41	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.78	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.46	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.05	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.74	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.55	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.92	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	2.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		

```
   G         2.4       0.18    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.23    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.349E-06	3.312E-06	3.143E-06	2.366E-06	2.243E-06	2.192E-06	1.897E-06		
0.005	0.019	0.034	0.218	0.818	0.864	1.048	2.063	2.248	2.478		
0.00025	0.00097	0.00170	0.01105	0.04144	0.04378	0.05313	0.10457	0.11392	0.12561		

1.880E-06	1.696E-06	1.650E-06	1.584E-06	1.323E-06	1.273E-06	1.190E-06	1.141E-06	1.105E-06	1.024E-06		
3.217	5.523	6.123	6.400	6.861	8.845	8.983	15.165	15.718	16.272		
0.16302	0.27992	0.31032	0.32435	0.34773	0.44826	0.45528	0.76857	0.79663	0.82469		

9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07		
19.455	19.501	30.296	30.526	31.449	40.860	40.906	49.025	55.806	57.375		
0.98601	0.98835	1.53545	1.54714	1.59390	2.07086	2.07319	2.48469	2.82838	2.90787		

4.876E-07	4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07		
68.169	70.845	79.841	81.870	82.332	88.882	90.359	95.110	97.232	97.740		
3.45497	3.59058	4.04649	4.14937	4.17275	4.50475	4.57957	4.82038	4.92793	4.95365		

1.779E-07	1.415E-07	1.336E-07	9.605E-08	8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08		
98.432	98.478	98.754	99.077	99.124	99.216	99.400	99.631	99.769	99.908		
4.98872	4.99106	5.00509	5.02145	5.02379	5.02847	5.03782	5.04951	5.05653	5.06354		

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  1.668E-08   1.253E-08
     99.954     100.000
    5.06588     5.06822

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.041
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.310
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.768
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.534
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.482
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.452

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1     -11.07050 -16.85419  -1.26709
  8  2     -12.61806 -16.45959  -1.14906
  8  3     -13.31455 -16.53978  -1.17836
  8  4     -13.68351 -16.30438  -1.08125
  8  5     -13.96752 -17.04465  -1.42376
  8  6     -14.24977 -18.09881  -1.96077
  8  7     -14.53378     NUMXQ(K)=  7
    3.104E-06             0.051             1.000
    2.142E-06             0.152             3.000
    1.780E-06             0.253             5.000
    1.358E-06             0.507            10.000
    1.146E-06             0.760            15.000
    1.022E-06             1.014            20.000
    9.319E-07             1.267            25.000
    8.626E-07             1.520            30.000
    7.909E-07             1.774            35.000
    7.317E-07             2.027            40.000
    6.822E-07             2.281            45.000
    6.371E-07             2.534            50.000
    5.877E-07             2.788            55.000
    5.453E-07             3.041            60.000
    5.085E-07             3.294            65.000

    1.365E-06             0.5               9.87
```

ANNUAL AVERAGE = 7.45E-10

K= 8 FIVEXQ(K)= 1.365E-06 FIVEPR(K)= 9.865

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.185	2.260	3.183	12.839	53.116	98.801	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.16	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.14	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
B	3.3	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.40	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.51	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.14	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	2.2	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.47	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.86	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.12	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.23	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07

AT 131.4 METERS
CA=1292.SQ.METERS

```
   C        26.5       0.02     2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   2.719E-07

   D         0.2       0.00     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.556E-05
   D         1.1       0.28     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   3.312E-06
   D         1.7       0.68     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   2.243E-06
   D         2.2       0.91     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.696E-06
   D         3.3       3.99     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.141E-06
   D         4.4       7.47     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   8.590E-07
   D         5.4       7.71     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   6.887E-07
   D         6.5       6.40     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   5.752E-07
   D         8.7       8.06     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   4.321E-07
   D        10.8       2.24     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   3.479E-07
   D        26.5       0.93     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.415E-07

   E         0.3       0.01     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   8.835E-06
   E         1.2       0.61     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.880E-06
   E         1.8       1.03     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.273E-06
   E         2.4       1.40     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   9.624E-07
   E         3.5       6.14     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   6.477E-07
   E         4.7      10.09     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   4.876E-07
   E         5.9       9.88     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   3.909E-07
   E         7.0       6.63     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   3.265E-07
   E         9.3       8.57     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   2.453E-07
   E        11.6       1.68     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.975E-07
   E        28.5       0.21     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   8.032E-08

   F         0.3       0.01    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.813E-06
   F         1.2       0.28    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.024E-06
   F         1.8       0.26    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.77    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.75    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       2.08    90000.        0.        131.      1000.0
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92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.07     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.93     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.56     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.02     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.19     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.21     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.19     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.51     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.14     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.19     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.02     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.02     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.349E-06	3.312E-06	3.257E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06		
0.002	0.014	0.021	0.068	0.348	0.371	0.395	0.558	0.652	1.329		
0.00023	0.00140	0.00213	0.00680	0.03486	0.03720	0.03954	0.05590	0.06525	0.13306		
2.242E-06	2.192E-06	1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.323E-06	1.273E-06		
1.422	1.679	2.076	2.683	3.594	3.734	4.201	4.528	5.461	6.489		
0.14241	0.16813	0.20787	0.26866	0.35985	0.37387	0.42063	0.45337	0.54689	0.64976		
1.190E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07		
7.002	10.995	11.859	12.139	13.540	13.680	21.152	22.272	22.529	30.234		
0.70120	1.10100	1.18751	1.21557	1.35585	1.36988	2.11805	2.23027	2.25599	3.02754		
6.684E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.897E-07	3.528E-07	3.479E-07		
30.468	36.609	43.006	43.777	53.863	61.918	71.795	71.818	73.569	75.811		
3.05092	3.66582	4.30644	4.38360	5.39363	6.20025	7.18924	7.19158	7.36693	7.59138		
3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	1.076E-07		
82.442	82.465	84.543	93.112	94.186	95.867	96.801	97.735	98.296	98.319		
8.25538	8.25772	8.46580	9.32386	9.43141	9.59975	9.69327	9.78679	9.84291	9.84524		

9.605E-08 8.032E-08 6.505E-08 4.918E-08 3.310E-08 2.491E-08
1.998E-08 1.668E-08 1.253E-08
98.506 98.716 98.926 99.113 99.626 99.766
99.953 99.977 100.000
9.86395 9.88499 9.90603 9.92474 9.97617 9.99020
10.00891 10.01124 10.01358

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.133
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 1.100
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 2.116
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= 3.663
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(9)= 7.185

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
9	1	-11.07050	-16.69997	-1.22879
9	2	-13.00780	-13.03643	-0.00953
9	3	-13.00800	-14.32231	-0.44046
9	4	-13.03054	-15.83146	-0.95503
9	5	-13.31455	-16.13323	-1.06953
9	6	-13.68351	-16.18483	-1.09206
9	7	-13.96752	-16.36398	-1.18029
9	8	-14.24977	-16.99784	-1.53416
9	9	-14.75472		

NUMXQ(K)= 9

2.491E-06	0.100	1.000
1.837E-06	0.300	3.000
1.548E-06	0.501	5.000
1.186E-06	1.001	10.000
1.000E-06	1.502	15.000
8.811E-07	2.003	20.000
7.903E-07	2.503	25.000
7.198E-07	3.004	30.000
6.636E-07	3.505	35.000
6.084E-07	4.005	40.000
5.589E-07	4.506	45.000
5.172E-07	5.007	50.000
4.814E-07	5.507	55.000
4.504E-07	6.008	60.000

4.231E-07	6.509	65.000
3.990E-07	7.010	70.000
1.549E-06	0.5	4.99

ANNUAL AVERAGE = 2.28E-09

K= 9 FIVEXQ(K)= 1.549E-06 FIVEPR(K)= 4.993

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.444	4.366	5.884	13.620	52.287	98.529
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.04	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	0.08	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.16	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.12	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.08	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
B	3.3	0.16	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.16	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.36	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.20	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.20	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.68	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.72	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.39	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.10	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.31	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.84	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.82	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	10.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	5.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.08	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.16	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.76	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.36	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.76	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.64	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNE SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.448E-06 3.349E-06 3.312E-06 3.143E-06 2.685E-06 2.366E-06 2.243E-06
0.002 0.014 0.027 0.067 0.146 0.386 0.545 0.705 0.864 1.543
0.00012 0.00083 0.00156 0.00390 0.00858 0.02261 0.03196 0.04131 0.05066 0.09041

2.242E-06 2.192E-06 1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.323E-06 1.273E-06
1.662 1.822 2.181 2.819 4.056 4.136 4.654 4.854 5.412 7.008
0.09742 0.10677 0.12782 0.16523 0.23770 0.24238 0.27277 0.28447 0.31720 0.41072

1.190E-06 1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07
7.208 11.596 12.274 12.753 15.346 15.386 23.484 24.202 25.000 32.700
0.42241 0.67959 0.71934 0.74740 0.89937 0.90171 1.37633 1.41841 1.46517 1.91641

6.477E-07 5.752E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07 3.479E-07 3.265E-07
40.519 45.785 46.942 57.832 62.141 72.394 72.434 75.984 76.822 84.082
2.37467 2.68329 2.75109 3.38937 3.64188 4.24275 4.24509 4.45318 4.50228 4.92780

2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07 1.076E-07 9.605E-08 8.032E-08
86.955 92.939 94.774 95.532 96.290 96.529 97.327 97.447 97.766 97.846
5.09614 5.44684 5.55439 5.59881 5.64324 5.65726 5.70403 5.71104 5.72974 5.73442

6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08
97.886	98.245	99.003	99.641	99.801	100.000
5.73676	5.75780	5.80222	5.83963	5.84898	5.86067

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.090
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.679
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.375
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.372
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.386
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
10	1	-11.07050	-16.77701	-1.20795
10	2	-13.00780	-13.03572	-0.00894
10	3	-13.00800	-15.56914	-0.82664
10	4	-13.03054	-16.01946	-0.97327
10	5	-13.31455	-16.61277	-1.18675
10	6	-13.68351	-16.34005	-1.07626
10	7	-13.96752	-16.76892	-1.27082
10	8	-14.24977	-17.87074	-1.82664
10	9	-14.53378	NUMXQ(K)= 9	

2.610E-06	0.059	1.000
1.891E-06	0.176	3.000
1.605E-06	0.293	5.000
1.215E-06	0.586	10.000
1.032E-06	0.879	15.000
9.184E-07	1.172	20.000
8.326E-07	1.465	25.000
7.589E-07	1.758	30.000
7.003E-07	2.051	35.000
6.523E-07	2.344	40.000
5.968E-07	2.637	45.000
5.488E-07	2.930	50.000
5.081E-07	3.223	55.000
1.297E-06	0.5	8.53

ANNUAL AVERAGE = 1.52E-09

K= 10 FIVEXQ(K)= 1.297E-06 FIVEPR(K)= 8.531

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.479	3.112	4.269	16.648	49.642	97.527	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.14	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	8.7	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
B	3.3	0.14	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.19	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.28	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.28	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.14	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	3.3	0.33	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.42	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.70	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.75	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
C	26.5	0.09	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.719E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.32	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	6.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	6.67	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.76	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.80	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.96	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	4.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.27	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.70	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.27	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	4.65	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	4.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	3.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.46	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.08     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.28     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.03     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.69     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.75     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.448E-06 3.349E-06 3.312E-06 3.143E-06 2.685E-06 2.366E-06 2.243E-06
0.003 0.019 0.037 0.131 0.225 0.648 0.789 0.930 1.118 2.198
0.00017 0.00094 0.00185 0.00652 0.01120 0.03224 0.03926 0.04627 0.05562 0.10940

2.192E-06 1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.323E-06 1.273E-06 1.190E-06
2.527 2.809 3.607 4.923 5.016 5.439 5.721 6.426 8.399 8.540
0.12576 0.13979 0.17954 0.24500 0.24968 0.27072 0.28475 0.31982 0.41802 0.42503

1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07
13.143 13.660 14.365 17.324 17.371 23.384 24.135 24.934 31.604 31.745
0.65416 0.67988 0.71495 0.86224 0.86458 1.16385 1.20126 1.24101 1.57301 1.58002

6.477E-07 5.752E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.719E-07
39.449 43.207 44.476 53.448 57.722 65.473 70.124 70.829 75.479 75.573
1.96346 2.15050 2.21363 2.66019 2.87295 3.25873 3.49019 3.52526 3.75673 3.76140

2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07 1.076E-07 9.605E-08 8.032E-08
80.505 87.974 91.075 92.343 93.799 94.034 95.115 95.162 95.209 95.302
4.00690 4.37865 4.53296 4.59608 4.66856 4.68025 4.73403 4.73636 4.73870 4.74338

```
   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.537      95.819      96.853      98.544      99.295      99.765
100.000
     4.75507     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.109
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.270
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.653
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.163
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.961
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.658

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.07050 -16.77079  -1.22823
 11  2     -13.00780 -14.66803  -0.54189
 11  3     -13.03054 -16.60416  -1.18261
 11  4     -13.31455 -16.73869  -1.23098
 11  5     -13.68351 -16.99876  -1.33576
 11  6     -13.96752 -17.05432  -1.36024
 11  7     -14.24977 -18.82078  -2.21700
 11  8     -14.53378     NUMXQ(K)=  8
    2.969E-06             0.050             1.000
    2.061E-06             0.149             3.000
    1.704E-06             0.249             5.000
    1.284E-06             0.498            10.000
    1.071E-06             0.747            15.000
    9.297E-07             0.995            20.000
    8.295E-07             1.244            25.000
    7.529E-07             1.493            30.000
    6.923E-07             1.742            35.000
    6.396E-07             1.991            40.000
    5.737E-07             2.240            45.000
    5.196E-07             2.489            50.000
```

```
    1.282E-06              0.5                10.05

ANNUAL AVERAGE =   1.29E-09

K= 11     FIVEXQ(K)= 1.282E-06     FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY:   7.68E-05

 EXPONENTIAL TERM AND FREQUENCIES

   5.684E-01   5.200E-01   4.072E-01   3.613E-01   2.419E-01   2.081E-01
1.693E-02
       0.423       3.382       4.463      22.519      51.600      95.256
100.000
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	5.4	0.14	500.	0.	131.	100.2	123.6	0.0	0.000E+00
0.000E+00	2.685E-06								
A	6.5	0.28	500.	0.	131.	100.2	123.6	0.0	0.000E+00
0.000E+00	2.242E-06								
A	8.7	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00
0.000E+00	1.685E-06								
A	10.8	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00
0.000E+00	1.356E-06								
A	26.5	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00
0.000E+00	5.516E-07								
B	3.3	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	3.143E-06								
B	4.4	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	2.366E-06								
B	5.4	0.24	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	1.897E-06								
B	6.5	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	1.584E-06								
B	8.7	0.61	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	1.190E-06								
B	10.8	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	9.582E-07								
B	26.5	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00
0.000E+00	3.897E-07								
C	3.3	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.192E-06								
C	4.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.650E-06								
C	5.4	0.66	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.323E-06								
C	6.5	0.71	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.105E-06								
C	8.7	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	8.302E-07								
C	10.8	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	6.684E-07								

```
   C        26.5       0.09     2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   2.719E-07

   D         0.2       0.00     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.556E-05
   D         1.1       0.28     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   3.312E-06
   D         1.7       0.42     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   2.243E-06
   D         2.2       1.13     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.696E-06
   D         3.3       4.24     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.141E-06
   D         4.4       3.77     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   8.590E-07
   D         5.4       4.19     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   6.887E-07
   D         6.5       4.85     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   5.752E-07
   D         8.7       6.54     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   4.321E-07
   D        10.8       0.94     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   3.479E-07
   D        26.5       0.56     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.415E-07

   E         0.3       0.02     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   8.835E-06
   E         1.2       0.89     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.880E-06
   E         1.8       1.65     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.273E-06
   E         2.4       1.69     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   9.624E-07
   E         3.5       5.22     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   6.477E-07
   E         4.7       5.46     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   4.876E-07
   E         5.9       7.01     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   3.909E-07
   E         7.0       7.39     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   3.265E-07
   E         9.3       8.33     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   2.453E-07
   E        11.6       1.79     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.975E-07
   E        28.5       0.09     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   8.032E-08

   F         0.3       0.02    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.813E-06
   F         1.2       0.71    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.024E-06
   F         1.8       0.85    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       1.69    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       3.01    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       3.62    90000.        0.        131.      1000.0
```

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	4.00	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.68	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.77	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.47	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.89	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.18	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	1.88	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.66	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

ENE SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 3.143E-06 2.685E-06 2.366E-06 2.243E-06 2.242E-06 2.192E-06
0.002 0.019 0.038 0.320 0.367 0.508 0.603 1.026 1.309 1.450
0.00012 0.00097 0.00188 0.01591 0.01825 0.02526 0.02994 0.05098 0.06501 0.07202

1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.356E-06 1.323E-06 1.273E-06 1.190E-06
1.685 2.579 3.709 3.756 3.944 4.274 4.368 5.027 6.674 7.286
0.08371 0.12813 0.18425 0.18658 0.19594 0.21230 0.21698 0.24971 0.33154 0.36194

1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07
11.521 12.227 12.933 14.627 14.722 18.487 19.616 20.463 24.652 24.793
0.57236 0.60743 0.64250 0.72667 0.73135 0.91839 0.97450 1.01659 1.22467 1.23169

6.477E-07 5.752E-07 5.516E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07 3.479E-07
30.017 34.865 34.912 36.606 42.065 48.607 55.619 55.667 58.679 59.620
1.49121 1.73202 1.73436 1.81853 2.08974 2.41473 2.76310 2.76543 2.91507 2.96183

3.265E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07 1.076E-07
67.009 67.103 70.727 79.057 83.057 84.846 87.528 88.093 91.858 92.846
3.32890 3.33358 3.51361 3.92744 4.12617 4.21501 4.34828 4.37634 4.56338 4.61248

```
   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      93.317      93.411      93.788      94.164      94.211      95.105
96.282      98.165      99.247      99.906
     4.63586     4.64054     4.65924     4.67795     4.68028     4.72471
4.78316     4.87668     4.93045     4.96319

   1.009E-08
     100.000
     4.96786

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.001
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.072
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.572
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   0.607
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   1.490
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.760

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 12  1     -11.07050 -16.99141  -1.25333
 12  2     -11.63677 -17.12169  -1.28383
 12  3     -13.03054 -15.90430  -0.90180
 12  4     -13.18433 -15.96680  -0.92252
 12  5     -13.28753 -16.35327  -1.05559
 12  6     -13.68351 -17.55751  -1.53174
 12  7     -13.71559 -17.71093  -1.59290
 12  8     -14.24977 -18.54189  -1.97533
 12  9     -14.75472     NUMXQ(K)=  9
    2.512E-06              0.050              1.000
    1.802E-06              0.149              3.000
    1.534E-06              0.248              5.000
    1.202E-06              0.497             10.000
    9.837E-07              0.745             15.000
    8.309E-07              0.994             20.000
    7.259E-07              1.242             25.000
    6.480E-07              1.490             30.000
```

5.737E-07	1.739	35.000
5.151E-07	1.987	40.000
4.675E-07	2.236	45.000
4.281E-07	2.484	50.000
3.947E-07	2.732	55.000
1.199E-06	0.5	10.06

ANNUAL AVERAGE = 1.25E-09

K= 12 FIVEXQ(K)= 1.199E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.612	3.671	5.130	26.515	53.437	92.988	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.03	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.06	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.39	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.42	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.30	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.18	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	2.2	0.03	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.39	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.63	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.21	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.48	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.69	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.33	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06

C	8.7	1.44	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
C	10.8	0.87	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
C	26.5	0.48	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.719E-07						
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	0.24	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	0.54	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	0.90	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	2.66	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	3.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	4.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	4.25	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	9.30	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	6.31	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	3.71	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.90	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	0.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	1.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	3.05	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	3.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.77	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	6.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	12.47	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.42	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.48	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.66	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.29	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.63	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.83	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.84	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.81	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.670E-06	3.349E-06	3.312E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06	
0.002	0.019	0.030	0.060	0.090	0.329	0.419	0.479	0.569	1.107	
0.00015	0.00150	0.00235	0.00469	0.00703	0.02573	0.03275	0.03742	0.04444	0.08652	
2.242E-06	2.192E-06	1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.356E-06	1.323E-06	
1.496	1.556	1.945	2.842	3.739	4.158	4.637	4.936	5.235	5.923	
0.11691	0.12159	0.15198	0.22213	0.29227	0.32500	0.36241	0.38579	0.40917	0.46294	
1.273E-06	1.190E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	
6.641	7.269	9.931	10.260	10.679	11.936	12.265	15.525	16.961	17.440	
0.51906	0.56815	0.77624	0.80196	0.83469	0.93289	0.95861	1.21345	1.32568	1.36309	
6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.516E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.897E-07	
21.448	22.315	25.367	29.614	29.794	30.452	34.041	43.344	49.118	49.327	
1.67638	1.74419	1.98266	2.31467	2.32869	2.38013	2.66069	3.38782	3.83906	3.85543	
3.528E-07	3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	
50.613	56.925	63.297	63.775	66.407	78.881	81.424	84.056	86.599	90.308	
3.95596	4.44929	4.94729	4.98470	5.19044	6.16540	6.36414	6.56988	6.76862	7.05853	

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   1.336E-07   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08
4.375E-08   3.310E-08   2.491E-08   1.998E-08
      94.137      94.825      95.064      95.363      95.513      95.722
95.752      96.500      97.338      98.145
     7.35780     7.41158     7.43028     7.45366     7.46535     7.48172
7.48406     7.54251     7.60797     7.67110

   1.668E-08   1.253E-08   1.009E-08
      99.252      99.970     100.000
     7.75760     7.81372     7.81606

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.117
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.775
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.324
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.981
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.944

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1     -11.07050 -16.44367  -1.15172
 13  2     -11.63677 -16.70211  -1.21364
 13  3     -13.00800 -15.61279  -0.85576
 13  4     -13.31455 -17.04980  -1.39084
 13  5     -13.68351 -17.50850  -1.58036
 13  6     -14.00160 -17.41645  -1.53888
 13  7     -14.24977 -17.70966  -1.68136
 13  8     -14.93482     NUMXQ(K)=  8
    2.591E-06              0.078              1.000
    1.864E-06              0.234              3.000
    1.593E-06              0.391              5.000
    1.137E-06              0.782             10.000
    8.948E-07              1.172             15.000
    7.513E-07              1.563             20.000
    6.537E-07              1.954             25.000
    5.757E-07              2.345             30.000
    5.152E-07              2.736             35.000
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4.668E-07	3.126	40.000
4.271E-07	3.517	45.000
3.938E-07	3.908	50.000
3.655E-07	4.299	55.000
3.409E-07	4.690	60.000
1.417E-06	0.5	6.40

ANNUAL AVERAGE = 3.44E-09

K= 13 FIVEXQ(K)= 1.417E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.376	5.713	7.777	22.895	58.074	95.154	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.08	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.08	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.19	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.13	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.13	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	3.3	0.03	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.21	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.40	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.32	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.27	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.21	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

AT 131.4 METERS
CA=1292.SQ.METERS

C	10.8	0.72	2000.	0.	131.	200.0		
114.9	0.0	0.000E+00	0.000E+00	6.684E-07				
C	26.5	0.89	2000.	0.	131.	200.0		
114.9	0.0	0.000E+00	0.000E+00	2.719E-07				
D	0.2	0.00	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.556E-05				
D	1.1	0.51	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.312E-06				
D	1.7	0.51	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	2.243E-06				
D	2.2	0.51	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.696E-06				
D	3.3	1.58	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.141E-06				
D	4.4	3.09	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	8.590E-07				
D	5.4	4.29	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	6.887E-07				
D	6.5	5.26	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	5.752E-07				
D	8.7	14.57	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	4.321E-07				
D	10.8	10.52	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.479E-07				
D	26.5	6.09	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.415E-07				
E	0.3	0.01	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.835E-06				
E	1.2	0.46	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.880E-06				
E	1.8	0.51	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.273E-06				
E	2.4	0.62	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	9.624E-07				
E	3.5	2.20	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	6.477E-07				
E	4.7	3.11	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	4.876E-07				
E	5.9	4.32	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.909E-07				
E	7.0	6.23	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.265E-07				
E	9.3	11.84	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	2.453E-07				
E	11.6	3.33	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.975E-07				
E	28.5	0.32	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.032E-08				
F	0.3	0.01	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	4.813E-06				
F	1.2	0.35	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	1.024E-06				
F	1.8	0.40	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	6.935E-07				
F	2.4	0.48	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	5.243E-07				
F	3.5	1.05	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	2.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.62	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.59	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.70	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.54	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.349E-06	3.312E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06	2.242E-06		
0.004	0.013	0.022	0.103	0.613	0.639	0.720	0.854	1.364	1.552		
0.00037	0.00113	0.00192	0.00893	0.05336	0.05569	0.06271	0.07440	0.11882	0.13519		
2.192E-06	1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.356E-06	1.323E-06	1.273E-06		
1.606	1.659	2.116	2.625	2.760	2.921	3.135	3.189	3.538	4.048		
0.13986	0.14454	0.18429	0.22871	0.24040	0.25443	0.27313	0.27781	0.30820	0.35262		
1.190E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07		
4.451	6.034	6.598	6.947	7.564	7.886	10.973	12.180	12.583	16.877		
0.38769	0.52564	0.57474	0.60513	0.65891	0.68696	0.95584	1.06105	1.09612	1.47020		
6.684E-07	6.477E-07	5.752E-07	5.516E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.897E-07	3.528E-07		
17.602	19.803	25.063	25.198	25.681	28.794	43.368	47.689	47.958	49.005		
1.53333	1.72505	2.18330	2.19499	2.23708	2.50829	3.77784	4.15427	4.17765	4.26883		
3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07		
59.526	65.753	66.638	67.953	79.790	81.776	85.104	86.580	92.673	95.464		
5.18534	5.72776	5.80492	5.91948	6.95055	7.12357	7.41348	7.54207	8.07281	8.31596		

```
   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.081      96.296      96.618      96.779      96.994      97.584
98.282      98.819      99.087      99.946
     8.36974     8.38844     8.41650     8.43053     8.44923     8.50067
8.56146     8.60822     8.63160     8.70641

   1.009E-08
     100.000
     8.71109
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

```
 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.053
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.135
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.254
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.574
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.060
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.775
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.724

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1     -11.07050 -16.79710  -1.27704
 14  2     -12.61806 -17.29950  -1.43056
 14  3     -13.00800 -17.64932  -1.54717
 14  4     -13.31455 -17.41477  -1.46346
 14  5     -13.71559 -16.95421  -1.28125
 14  6     -14.00160 -16.85692  -1.23903
 14  7     -14.65458 -17.15661  -1.40764
 14  8     -14.93482     NUMXQ(K)=  8
    2.706E-06              0.087              1.000
    1.630E-06              0.261              3.000
    1.272E-06              0.436              5.000
    9.123E-07              0.871             10.000
    7.520E-07              1.307             15.000
    6.529E-07              1.742             20.000
    5.827E-07              2.178             25.000
```

5.294E-07	2.613	30.000
4.871E-07	3.049	35.000
4.523E-07	3.484	40.000
4.219E-07	3.920	45.000
3.936E-07	4.356	50.000
3.693E-07	4.791	55.000
3.480E-07	5.227	60.000
3.292E-07	5.662	65.000
1.186E-06	0.5	5.74

ANNUAL AVERAGE = 2.14E-09

K= 14 FIVEXQ(K)= 1.186E-06 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.671	4.616	6.039	16.516	63.462	96.403	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	6.5	0.06	500.	0.	131.	100.2	123.6	0.0	0.000E+00
			0.000E+00	2.242E-06					
A	8.7	0.04	500.	0.	131.	100.2	123.6	0.0	0.000E+00
			0.000E+00	1.685E-06					
A	26.5	0.02	500.	0.	131.	100.2	123.6	0.0	0.000E+00
			0.000E+00	5.516E-07					
B	2.2	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00
			0.000E+00	4.670E-06					
B	3.3	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00
			0.000E+00	3.143E-06					
B	4.4	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00
			0.000E+00	2.366E-06					
B	5.4	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00
			0.000E+00	1.897E-06					
B	6.5	0.06	900.	0.	131.	128.1	98.0	0.0	0.000E+00
			0.000E+00	1.584E-06					
B	8.7	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00
			0.000E+00	1.190E-06					
B	10.8	0.11	900.	0.	131.	128.1	98.0	0.0	0.000E+00
			0.000E+00	9.582E-07					
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
			0.000E+00	2.192E-06					
C	4.4	0.17	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
			0.000E+00	1.650E-06					
C	5.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
			0.000E+00	1.323E-06					
C	6.5	0.38	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
			0.000E+00	1.105E-06					
C	8.7	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
			0.000E+00	8.302E-07					
C	10.8	0.47	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
			0.000E+00	6.684E-07					
C	26.5	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
			0.000E+00	2.719E-07					
D	0.2	0.00	4000.	0.	131.	263.4			

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.17	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	5.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	7.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	17.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.45	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	5.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F         9.3       1.30    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G         1.2       0.15    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.24    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.94    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       1.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.88    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.36    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.11    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
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LOW POPULATION ZONE CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.670E-06 3.312E-06 3.143E-06 2.366E-06 2.243E-06 2.242E-06 2.192E-06
0.001 0.011 0.018 0.039 0.210 0.253 0.274 0.873 0.937 1.001
0.00015 0.00118 0.00198 0.00431 0.02302 0.02769 0.03003 0.09550 0.10251 0.10953

1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.323E-06 1.273E-06 1.190E-06 1.141E-06
1.022 1.514 2.369 2.411 2.582 2.646 2.839 3.181 3.309 5.830
0.11186 0.16564 0.25916 0.26384 0.28254 0.28955 0.31060 0.34801 0.36203 0.63792

1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07 6.477E-07
6.215 6.493 7.134 7.241 11.215 11.771 12.048 17.070 17.540 19.933
0.68001 0.71040 0.78054 0.79223 1.22711 1.28789 1.31829 1.86773 1.91916 2.18102

5.752E-07 5.516E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.719E-07
27.028 27.049 27.434 30.724 48.268 53.716 54.999 65.448 71.367 71.623
2.95725 2.95959 3.00167 3.36173 5.28125 5.87745 6.01774 7.16103 7.80867 7.83672

2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07 9.605E-08 8.032E-08 6.505E-08
73.097 83.632 85.491 87.649 89.081 94.551 95.855 96.004 96.218 96.346
7.99805 9.15070 9.35411 9.59025 9.74690 10.34543 10.48805 10.50442 10.52780 10.54183

4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08	1.253E-08
96.581	97.521	98.654	99.530	99.893	100.000
10.56755	10.67042	10.79434	10.89020	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE ORDERED X/Q-FREQUENCY VALUES, AND AS PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

```
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.109
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.637
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.226
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.954
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.278
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.07050	-16.77874	-1.22354
15	2	-13.03054	-15.97232	-0.96030
15	3	-13.28753	-15.98209	-0.96379
15	4	-13.31455	-17.00262	-1.33251
15	5	-13.68351	-16.60815	-1.17415
15	6	-13.96752	-16.46289	-1.10956
15	7	-14.36856	-16.37541	-1.06321
15	8	-14.65458		

NUMXQ(K)= 8

2.193E-06	0.109	1.000
1.546E-06	0.328	3.000
1.226E-06	0.547	5.000
9.044E-07	1.094	10.000
7.567E-07	1.641	15.000
6.639E-07	2.188	20.000
5.974E-07	2.735	25.000
5.476E-07	3.282	30.000
5.083E-07	3.830	35.000
4.757E-07	4.377	40.000
4.481E-07	4.924	45.000
1.279E-06	0.5	4.57

ANNUAL AVERAGE = 6.20E-10

K= 15 FIVEXQ(K)= 1.279E-06 FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.128	2.222	2.628	10.926	64.626	96.068
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.02	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	5.4	0.11	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.30	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.02	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.02	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	3.3	0.06	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.15	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.32	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.43	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	2.2	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.76	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.97	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

AT 131.4 METERS
CA=1292.SQ.METERS

C	10.8	0.30	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
C	26.5	0.09	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.719E-07						
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	0.22	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	0.86	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	1.08	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	4.99	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	8.43	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	9.47	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	8.78	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	15.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	4.97	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	2.03	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.00	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.24	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	0.50	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	0.78	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	2.49	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	4.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	4.60	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	5.97	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	7.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	1.04	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.00	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.15	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.32	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.43	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	5.243E-07						
F	3.5	1.28	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.41	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.22	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.73	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.63	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.448E-06	3.312E-06	3.257E-06	3.143E-06	2.685E-06	2.366E-06	2.243E-06	
0.002	0.006	0.010	0.032	0.248	0.270	0.334	0.443	0.594	1.458	
0.00019	0.00069	0.00111	0.00345	0.02683	0.02917	0.03618	0.04787	0.06424	0.15776	

2.242E-06	2.192E-06	1.897E-06	1.880E-06	1.696E-06	1.685E-06	1.650E-06	1.584E-06	1.356E-06	1.323E-06	
1.545	1.891	2.150	2.388	3.469	3.771	4.528	4.852	4.874	5.846	
0.16711	0.20452	0.23258	0.25830	0.37520	0.40793	0.48976	0.52483	0.52717	0.63238	

1.273E-06	1.190E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.302E-07	6.935E-07	
6.343	6.776	11.769	12.698	12.849	13.628	13.757	22.187	23.786	24.111	
0.68616	0.73292	1.27300	1.37354	1.38990	1.47407	1.48810	2.39993	2.57295	2.60802	

6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.516E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.528E-07	
33.578	33.881	36.366	45.142	45.163	45.596	49.919	64.919	69.523	70.799	
3.63208	3.66481	3.93368	4.88292	4.88526	4.93202	5.39963	7.02222	7.52022	7.65817	

3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	
75.770	81.736	81.822	82.968	90.230	91.462	92.500	93.516	95.547	95.958	
8.19592	8.84121	8.85056	8.97448	9.76006	9.89333	10.00555	10.11544	10.33522	10.37964	

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   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.066      96.282      96.585      96.779      97.039      97.774
99.114      99.741      99.914     100.000
    10.39133    10.41471    10.44744    10.46848    10.49654    10.57603
10.72099    10.78879    10.80750    10.81685

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.158
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.272
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.372
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.397
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.570
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   3.629
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(11)=   4.879

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 16  1     -11.07050 -16.43962  -1.16233
 16  2     -13.00780 -13.04051  -0.01108
 16  3     -13.00800 -14.05353  -0.35626
 16  4     -13.03054 -15.86153  -0.98591
 16  5     -13.31455 -16.04892  -1.05845
 16  6     -13.68351 -16.10638  -1.08416
 16  7     -13.71559 -16.15877  -1.10792
 16  8     -13.96752 -16.23346  -1.14568
 16  9     -14.00160 -16.38713  -1.22456
 16 10     -14.18845 -16.51821  -1.29757
 16 11     -14.36856     NUMXQ(K)= 11
    2.562E-06             0.108             1.000
    1.893E-06             0.325             3.000
    1.591E-06             0.541             5.000
    1.219E-06             1.082            10.000
    1.027E-06             1.623            15.000
    9.016E-07             2.163            20.000
    8.086E-07             2.704            25.000
    7.330E-07             3.245            30.000
```

6.719E-07	3.786	35.000
6.199E-07	4.327	40.000
5.763E-07	4.868	45.000
1.638E-06	0.5	4.62

ANNUAL AVERAGE = 2.60E-09

K= 16 FIVEXQ(K)= 1.638E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.562	5.577	6.938	13.038	68.870	96.369
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.01	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	8.743E-06
A	2.2	0.09	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	6.610E-06
A	3.3	0.31	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	4.448E-06
A	4.4	0.33	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	3.349E-06
A	5.4	0.22	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.685E-06
A	6.5	0.18	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	2.242E-06
A	8.7	0.20	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.685E-06
A	10.8	0.05	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	1.356E-06
A	26.5	0.04	500.	0.	131.	100.2	123.6	0.0	0.000E+00	0.000E+00	5.516E-07
B	1.1	0.00	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.121E-06
B	1.7	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.12	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.29	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.22	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.12	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.05	900.	0.	131.	128.1					

98.0	0.0	0.000E+00	0.000E+00	3.897E-07		
C	1.1	0.01	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.362E-06		
C	1.7	0.07	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	4.309E-06		
C	2.2	0.21	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	3.257E-06		
C	3.3	0.42	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.192E-06		
C	4.4	0.56	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.650E-06		
C	5.4	0.63	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.323E-06		
C	6.5	0.52	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.105E-06		
C	8.7	0.79	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
C	10.8	0.27	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.17	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.50	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.03	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	5.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	7.33	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.11	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	9.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	3.90	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	1.98	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.73	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.24	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.35	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		

E	7.0	5.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	6.91	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.44	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	1.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.18	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.25	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.69	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.01	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 500.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 9.121E-06 8.835E-06 8.743E-06 6.610E-06 6.362E-06 6.177E-06 4.813E-06 4.670E-06 4.448E-06
0.005 0.009 0.023 0.030 0.124 0.136 0.178 0.189 0.306 0.620
0.00468 0.00935 0.02338 0.03039 0.12392 0.13561 0.17769 0.18938 0.30628 0.61958

4.309E-06 3.349E-06 3.312E-06 3.257E-06 3.143E-06 2.685E-06 2.366E-06 2.243E-06 2.242E-06 2.192E-06
0.685 1.012 1.581 1.791 2.083 2.301 2.565 4.068 4.246 4.664
0.68504 1.01237 1.58051 1.79093 2.08319 2.30062 2.56482 4.06818 4.24587 4.66437

1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.356E-06 1.323E-06 1.273E-06 1.190E-06
4.922 5.653 7.685 7.882 8.438 8.655 8.702 9.329 10.568 10.865
4.92156 5.65336 7.68511 7.88151 8.43796 8.65540 8.70216 9.32875 10.56791 10.86484

1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07
16.289 16.813 17.262 19.146 19.265 26.590 27.381 27.944 35.026 35.300
16.28907 16.81279 17.26170 19.14615 19.26539 26.59045 27.38070 27.94417 35.02607 35.29961

6.477E-07 5.752E-07 5.516E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07 3.479E-07
40.551 46.658 46.695 47.532 54.051 63.134 69.482 69.531 71.319 75.219
40.55083 46.65778 46.69518 47.53220 54.05064 63.13390 69.48165 69.53075 71.31934 75.21918

3.265E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07
1.779E-07 1.415E-07 1.336E-07 1.076E-07
80.396 80.569 82.441 89.353 90.919 92.359
93.397 95.373 96.477 96.657
80.39558 80.56860 82.44136 89.35258 90.91907 92.35930
93.39738 95.37302 96.47659 96.65662

9.605E-08 8.032E-08 6.505E-08 4.918E-08 4.375E-08 3.310E-08
2.491E-08 1.998E-08 1.668E-08 1.253E-08
96.904 97.164 97.351 97.613 97.629 98.347
99.039 99.518 99.785 99.988
96.90445 97.16397 97.35101 97.61287 97.62923 98.34701
99.03906 99.51836 99.78489 99.98830

1.009E-08
100.000
99.99998

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY
3.904E-06	1.000	1.000
2.689E-06	3.000	3.000
2.124E-06	5.000	5.000
1.510E-06	10.000	10.000
1.200E-06	15.000	15.000
1.020E-06	20.000	20.000
8.933E-07	25.000	25.000
8.042E-07	30.000	30.000
7.343E-07	35.000	35.000
6.737E-07	40.000	40.000
6.198E-07	45.000	45.000
5.711E-07	50.000	50.000
5.261E-07	55.000	55.000
4.841E-07	60.000	60.000
4.441E-07	65.000	65.000
4.055E-07	70.000	70.000
3.676E-07	75.000	75.000
3.296E-07	80.000	80.000

2.124E-06 5.0 5.00

K= 17 FIVEXQ(K)= 2.124E-06 FIVEPR(K)= 5.000

FUMIGATION X/Q AT THE BOUNDARY: 7.68E-05

EXPONENTIAL TERM AND FREQUENCIES

5.684E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.417	5.067	6.727	16.153	61.158	96.932	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 9.121E-06 8.835E-06 8.743E-06 6.610E-06 6.362E-06 6.177E-06 4.813E-06 4.670E-06 4.448E-06
0.005 0.009 0.023 0.030 0.124 0.136 0.178 0.189 0.306 0.620
0.00468 0.00935 0.02338 0.03039 0.12392 0.13561 0.17769 0.18938 0.30628 0.61958

4.309E-06 3.349E-06 3.312E-06 3.257E-06 3.143E-06 2.685E-06 2.366E-06 2.243E-06 2.242E-06 2.192E-06
0.685 1.012 1.581 1.791 2.083 2.301 2.565 4.068 4.246 4.664
0.68504 1.01237 1.58051 1.79093 2.08319 2.30062 2.56482 4.06818 4.24587 4.66438

1.897E-06 1.880E-06 1.696E-06 1.685E-06 1.650E-06 1.584E-06 1.356E-06 1.323E-06 1.273E-06 1.190E-06
4.922 5.653 7.685 7.882 8.438 8.655 8.702 9.329 10.568 10.865
4.92156 5.65336 7.68511 7.88151 8.43796 8.65540 8.70216 9.32875 10.56791 10.86484

1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07
16.289 16.813 17.262 19.146 19.265 26.590 27.381 27.944 35.026 35.300
16.28908 16.81280 17.26170 19.14615 19.26540 26.59045 27.38071 27.94417 35.02608 35.29963

6.477E-07 5.752E-07 5.516E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07 3.479E-07
40.551 46.658 46.695 47.532 54.051 63.134 69.482 69.531 71.319 75.219
40.55086 46.65780 46.69521 47.53222 54.05066 63.13391 69.48168 69.53077 71.31938 75.21923

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   3.265E-07   2.719E-07   2.656E-07   2.453E-07   2.130E-07   1.975E-07
1.779E-07   1.415E-07   1.336E-07   1.076E-07
      80.396      80.569      82.441      89.353      90.919      92.359
93.397      95.373      96.477      96.657
    80.39565    80.56865    82.44141    89.35265    90.91914    92.35938
93.39746    95.37309    96.47665    96.65665

   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.904      97.164      97.351      97.613      97.629      98.347
99.039      99.518      99.785      99.988
    96.90450    97.16402    97.35105    97.61292    97.62927    98.34705
99.03911    99.51839    99.78493    99.98833

   1.009E-08
    100.000
   100.00000

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY


                                                                ERROR IN
NORMAL TRANSFORMATION FOR A( 71)= 100.00000

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1     -11.07050 -14.55155  -0.89101
 18  2     -12.32295 -14.19583  -0.74879
 18  3     -12.67032 -14.70677  -0.99958
 18  4     -13.29402 -14.08011  -0.55619
 18  5     -13.31455 -14.60405  -0.93685
 18  6     -13.68351 -14.46370  -0.79401
 18  7     -13.96752 -14.37579  -0.65332
 18  8     -14.93482     NUMXQ(K)=  8
    3.904E-06              1.000              1.000
    2.689E-06              3.000              3.000
    2.124E-06              5.000              5.000
    1.510E-06             10.000             10.000
    1.200E-06             15.000             15.000
    1.020E-06             20.000             20.000
    8.933E-07             25.000             25.000
    8.042E-07             30.000             30.000
    7.343E-07             35.000             35.000
    6.737E-07             40.000             40.000
    6.198E-07             45.000             45.000
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5.711E-07	50.000	50.000
5.261E-07	55.000	55.000
4.841E-07	60.000	60.000
4.441E-07	65.000	65.000
4.055E-07	70.000	70.000
3.676E-07	75.000	75.000
3.296E-07	80.000	80.000
2.124E-06	5.0	5.00

K= 18 FIVEXQ(K)= 2.124E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-3.14098	0.08420	6.22377
2	-2.10573	1.76138	3.53187
3	-2.87508	0.20196	3.10925
4	-2.76480	0.28479	3.53945
5	-2.57624	0.49942	4.77421
6	-2.79974	0.25572	4.27580
7	-3.17201	0.07570	5.37250
8	-3.34230	0.04155	5.06821
9	-3.32105	0.04485	10.01358
10	-3.44214	0.02886	5.86067
11	-3.38024	0.03622	4.97718
12	-3.50718	0.02265	4.96786
13	-3.36428	0.03838	7.81606
14	-3.27173	0.05345	8.71109
15	-3.39969	0.03374	10.94163
16	-3.28696	0.05065	10.81685

K	HOURS(K)	TOTHRS
1	7.37570	7.37570
2	154.29710	161.67280
3	17.69208	179.36490
4	24.94769	204.31260
5	43.74879	248.06140
6	22.40123	270.46260
7	6.63166	277.09430
8	3.63981	280.73410
9	3.92856	284.66270
10	2.52819	287.19090
11	3.17250	290.36340
12	1.98412	292.34750
13	3.36204	295.70950
14	4.68252	300.39210
15	2.95529	303.34740
16	4.43660	307.78390

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.670E-06	1.626E-09	-0.8270	-12.7294			
					1	8.0	-14.44916
					2	16.0	-15.02241
					3	72.0	-16.26631
					4	624.0	-18.05224
2	1.707E-06	3.810E-09	-0.7281	-12.7761			
					1	8.0	-14.29005
					2	16.0	-14.79470
					3	72.0	-15.88975
					4	624.0	-17.46197
3	2.207E-06	7.556E-09	-0.6770	-12.5546			

					1	8.0	-13.96246
					2	16.0	-14.43174
					3	72.0	-15.45006
					4	624.0	-16.91212
4	2.543E-06	1.202E-08	-0.6386	-12.4394			
					1	8.0	-13.76732
					2	16.0	-14.20996
					3	72.0	-15.17046
					4	624.0	-16.54950
5	3.308E-06	2.261E-08	-0.5946	-12.2069			
					1	8.0	-13.44336
					2	16.0	-13.85550
					3	72.0	-14.74981
					4	624.0	-16.03383
6	2.487E-06	1.245E-08	-0.6318	-12.4666			
					1	8.0	-13.78031
					2	16.0	-14.21821
					3	72.0	-15.16843
					4	624.0	-16.53272
7	1.695E-06	4.189E-09	-0.7160	-12.7913			
					1	8.0	-14.28007
					2	16.0	-14.77634
					3	72.0	-15.85320
					4	624.0	-17.39931
8	1.365E-06	7.452E-10	-0.8960	-12.8830			
					1	8.0	-14.74623
					2	16.0	-15.36732
					3	72.0	-16.71504
					4	624.0	-18.65004
9	1.549E-06	2.284E-09	-0.7775	-12.8389			
					1	8.0	-14.45570
					2	16.0	-14.99461
					3	72.0	-16.16402
					4	624.0	-17.84300
10	1.297E-06	1.516E-09	-0.8052	-12.9973			
					1	8.0	-14.67171
					2	16.0	-15.22987
					3	72.0	-16.44102
					4	624.0	-18.17993
11	1.282E-06	1.286E-09	-0.8234	-12.9966			
					1	8.0	-14.70894
					2	16.0	-15.27971
					3	72.0	-16.51823
					4	624.0	-18.29645
12	1.199E-06	1.246E-09	-0.8193	-13.0659			
					1	8.0	-14.76961
					2	16.0	-15.33751
					3	72.0	-16.56981
					4	624.0	-18.33908
13	1.417E-06	3.439E-09	-0.7181	-12.9689			
					1	8.0	-14.46221
					2	16.0	-14.95998
					3	72.0	-16.04010
					4	624.0	-17.59089
14	1.186E-06	2.142E-09	-0.7533	-13.1224			
					1	8.0	-14.68891
					2	16.0	-15.21108
					3	72.0	-16.34417
					4	624.0	-17.97099
15	1.279E-06	6.200E-10	-0.9101	-12.9389			

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                                                  1     8.0   -14.83146
                                                  2    16.0   -15.46231
                                                  3    72.0   -16.83122
                                                  4   624.0   -18.79663
16 1.638E-06 2.599E-09   -0.7687  -12.7893
                                                  1     8.0   -14.38780
                                                  2    16.0   -14.92065
                                                  3    72.0   -16.07689
                                                  4   624.0   -17.73697
17 2.124E-06 2.261E-08   -0.5417  -12.6867
                                                  1     8.0   -13.81326
                                                  2    16.0   -14.18876
                                                  3    72.0   -15.00358
                                                  4   624.0   -16.17346
18 2.124E-06 2.261E-08   -0.5417  -12.6867
                                                  1     8.0   -13.81326
                                                  2    16.0   -14.18876
                                                  3    72.0   -15.00358
                                                  4   624.0   -16.17346
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

0-2 HR X/Q IS DOWNWIND DISTANCE EXCEEDED DOWNWIND

SECTOR	(METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS	1-4 DAYS	4-30 DAYS	ANNUAL AVERAGE	IN SECTOR	SECTOR
S	500.	1.67E-06	5.31E-07	2.99E-07	8.62E-08	1.45E-08	1.63E-09	7.4	S
SSW	500.	1.71E-06	6.22E-07	3.76E-07	1.26E-07	2.61E-08	3.81E-09	154.3	SSW
SW	500.	2.21E-06	8.63E-07	5.40E-07	1.95E-07	4.52E-08	7.56E-09	17.7	SW
WSW	500.	2.54E-06	1.05E-06	6.74E-07	2.58E-07	6.50E-08	1.20E-08	24.9	WSW
W	500.	3.31E-06	1.45E-06	9.61E-07	3.93E-07	1.09E-07	2.26E-08	43.7	W
WNW	500.	2.49E-06	1.04E-06	6.69E-07	2.58E-07	6.61E-08	1.24E-08	22.4	WNW
NW	500.	1.70E-06	6.28E-07	3.83E-07	1.30E-07	2.78E-08	4.19E-09	6.6	NW
NNW	500.	1.37E-06	3.94E-07	2.12E-07	5.50E-08	7.95E-09	7.45E-10	3.6	NNW
N	500.	1.55E-06	5.27E-07	3.08E-07	9.55E-08	1.78E-08	2.28E-09	3.9	N
NNE	500.	1.30E-06	4.25E-07	2.43E-07	7.24E-08	1.27E-08	1.52E-09	2.5	NNE
NE	500.	1.28E-06	4.09E-07	2.31E-07	6.70E-08	1.13E-08	1.29E-09	3.2	NE
ENE	500.	1.20E-06	3.85E-07	2.18E-07	6.37E-08	1.09E-08	1.25E-09	2.0	ENE
E	500.	1.42E-06	5.24E-07	3.18E-07	1.08E-07	2.29E-08	3.44E-09	3.4	E
ESE	500.	1.19E-06	4.18E-07	2.48E-07	7.98E-08	1.57E-08	2.14E-09	4.7	ESE
SE	500.	1.28E-06	3.62E-07	1.93E-07	4.90E-08	6.87E-09	6.20E-10	3.0	SE
SSE	500.	1.64E-06	5.64E-07	3.31E-07	1.04E-07	1.98E-08	2.60E-09	4.4	SSE
MAX X/Q		3.31E-06							
TOTAL HOURS AROUND SITE:		307.8							
SRP 2.3.4	500.	2.12E-06	1.00E-06	6.88E-07					

3.05E-07 9.46E-08 2.26E-08
SITE LIMIT 2.12E-06 1.00E-06 6.88E-07
3.05E-07 9.46E-08 2.26E-08

0.5 PERCENT X/Q TO AN INDIVIDUAL IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

DOWNWIND SECTOR	DISTANCE (METERS)	FUMIGATION X/Q
S	500.	7.68E-05
SSW	500.	7.68E-05
SW	500.	7.68E-05
WSW	500.	7.68E-05
W	500.	7.68E-05
WNW	500.	7.68E-05
NW	500.	7.68E-05
NNW	500.	7.68E-05
N	500.	7.68E-05
NNE	500.	7.68E-05
NE	500.	7.68E-05
ENE	500.	7.68E-05
E	500.	7.68E-05
ESE	500.	7.68E-05
SE	500.	7.68E-05
SSE	500.	7.68E-05

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY.
CHECK THE REASONABLENESS OF THE ENVELOPES
COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY
FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

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   1  1111
Peach Bottom                                    Stack Release
97.5 meters          10.1-96.3 meters

Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
   11     1
2584. 54.3131.4 97.5
    0    0    0    2    6    5    0
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   3.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   2.  10.  10.  15.   3.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   5.   6.  10.  23.  59.  25.   2.   0.   0.   1.   2.   0.   0.   0.
0.   1.
   1.   3.  11.  18.  43.  40.  10.   4.   2.   2.   2.   0.   1.   3.
0.   0.
   0.   6.  10.  11.  13.  17.   9.   0.   7.   4.   3.   3.   2.   3.
0.   5.
   0.   1.   2.  13.   8.   3.   9.   0.   4.   3.   0.   6.  13.   7.
3.   4.
   2.   4.   9.  11.   2.   3.   7.   0.   6.   2.   2.   1.  14.   5.
2.  14.
   1.   2.   0.   1.   0.   1.   0.   0.   0.   0.   0.   2.  10.   2.
0.   1.
   1.   0.   0.   0.   0.   1.   0.   0.   0.   0.   0.   1.   6.   5.
1.   1.
   0.   1.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   1.   1.   9.   5.   0.   2.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   1.   7.   5.   8.  21.   5.   1.   0.   0.   0.   0.   0.   1.   0.
1.   0.
  12.  15.   9.  11.  34.  19.   6.   1.   1.   4.   3.   1.   3.   1.
2.   3.
   1.  11.  11.  18.   6.  21.  11.   4.   4.   4.   4.   2.   3.   5.
1.   7.
   2.   5.   4.   2.   5.   9.  13.   5.  17.   9.   6.   5.  13.   2.
1.  12.
   3.   0.   3.   1.   3.   0.   9.   6.  14.   5.   6.   7.  10.   8.
3.  15.
   8.   2.   1.   1.   0.   2.   5.   3.  22.   5.   3.  13.  21.  15.
6.  20.
   1.   3.   0.   0.   0.   1.   1.   1.   6.   1.   1.   2.  11.  12.
5.   6.
   0.   0.   1.   0.   0.   0.   0.   0.   1.   1.   0.   1.   7.  10.
0.   0.
   0.   2.   2.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   3.  10.  14.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   4.   7.  11.  16.  31.  17.   2.   0.   1.   0.   0.   0.   0.   0.
0.   1.
  18.  14.  15.  17.  17.  40.   6.   4.  11.   4.   7.   3.   2.   2.
3.  16.
  26.  12.   8.  11.  10.  21.  26.  13.  20.  13.   9.   4.  16.   6.
8.  35.
  21.   6.   3.   8.   5.  11.  31.  10.  40.  14.  15.  14.  23.  13.
9.  45.
```

8.	8.	0.	3.	2.	3.	15.	12.	37.	17.	11.	15.	11.	21.	18.	43.
14.	2.	4.	2.	2.	3.	7.	5.	48.	18.	16.	24.	48.	45.	26.	74.
4.	1.	0.	0.	1.	2.	0.	1.	10.	0.	3.	3.	29.	27.	22.	14.
1.	3.	0.	0.	0.	0.	0.	0.	1.	0.	2.	2.	16.	33.	12.	4.
18.	18.	28.	26.	28.	20.	14.	13.	12.	6.	9.	6.	8.	19.	8.	10.
41.	40.	80.	93.	87.	66.	31.	22.	29.	17.	23.	9.	18.	19.	28.	40.
67.	53.	78.	99.	130.	77.	54.	50.	39.	31.	28.	24.	30.	19.	40.	50.
209.	119.	120.	174.	227.	179.	192.	134.	171.	110.	98.	90.	89.	59.	118.	231.
216.	175.	125.	187.	215.	168.	282.	234.	320.	203.	128.	80.	109.	115.	186.	390.
237.	151.	118.	123.	134.	129.	212.	204.	330.	193.	142.	89.	134.	160.	235.	438.
233.	99.	80.	54.	103.	102.	129.	147.	274.	132.	80.	103.	142.	196.	332.	406.
278.	113.	52.	44.	87.	94.	107.	58.	345.	108.	91.	139.	311.	543.	821.	694.
69.	28.	13.	11.	24.	24.	15.	10.	96.	21.	15.	20.	211.	392.	489.	230.
25.	10.	10.	2.	18.	7.	8.	1.	40.	6.	5.	12.	124.	227.	256.	94.
21.	15.	15.	20.	24.	17.	26.	16.	26.	16.	17.	19.	30.	17.	23.	11.
39.	29.	21.	41.	36.	43.	35.	43.	44.	40.	42.	35.	24.	19.	16.	23.
50.	43.	35.	51.	65.	48.	90.	69.	60.	65.	63.	36.	42.	23.	30.	36.
137.	92.	91.	138.	168.	113.	186.	176.	263.	196.	164.	111.	102.	82.	112.	115.
177.	131.	95.	87.	123.	134.	205.	234.	432.	273.	191.	116.	120.	116.	154.	200.
180.	79.	69.	40.	68.	116.	152.	195.	423.	257.	165.	149.	193.	161.	255.	213.
102.	30.	25.	9.	37.	61.	88.	142.	284.	182.	99.	157.	213.	232.	277.	276.
110.	26.	17.	6.	39.	46.	69.	103.	367.	150.	159.	177.	417.	441.	493.	336.
24.	10.	3.	4.	11.	20.	16.	11.	72.	19.	27.	38.	88.	124.	101.	48.
8.	1.	6.	1.	21.	3.	9.	1.	9.	2.	2.	2.	10.	12.	10.	14.
16.	7.	13.	10.	11.	12.	10.	12.	12.	12.	15.	15.	14.	13.	13.	7.
10.	12.	9.	16.	20.	11.	18.	20.	11.	20.	17.	18.	16.	15.	13.	15.
26.	13.	14.	10.	13.	18.	27.	34.	33.	29.	27.	36.	22.	18.	18.	20.
53.	19.	18.	17.	15.	28.	43.	44.	75.	89.	99.	64.	43.	39.	60.	59.
62.	19.	7.	10.	14.	18.	37.	32.	89.	72.	105.	77.	88.	49.	69.	53.
29.	9.	6.	0.	5.	11.	18.	46.	46.	46.	66.	85.	85.	74.	87.	57.

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  12.   4.   3.   0.   0.   2.   7.  15.  40.  19.  31.  57.  85.  55.
67.  47.
   2.   0.   0.   0.   0.   1.   4.   6.  24.  20.  23.  80. 128. 104.
61.  19.
   0.   0.   0.   0.   0.   0.   0.   0.   1.   3.   1.  21.  23.  23.
0.   5.
   1.   0.   0.   0.   4.   0.   0.   0.   0.   0.   0.   1.   1.   0.
0.   0.
   7.   9.   6.   6.   8.   2.   1.   7.   8.   8.   1.  10.   8.   8.
7.  10.
   4.   5.   5.   4.   5.   3.   3.   2.   9.   1.   5.   8.   5.   6.
6.   9.
   4.   9.   5.   4.   5.   1.  11.   4.   8.   9.   6.   8.   7.   8.
11.  12.
  35.   8.  15.  13.   7.   5.  12.   5.  22.  19.  22.  19.  25.  22.
44.  34.
  17.   3.   5.   4.   3.   1.   8.   3.   6.  16.  36.  25.  28.  26.
53.  62.
   7.   4.   1.   0.   0.   1.   4.   3.   8.   4.  16.  40.  27.  20.
41.  29.
   0.   0.   0.   0.   0.   0.   2.   1.   1.   5.  10.  23.  37.  10.
17.   8.
   1.   0.   0.   0.   0.   0.   0.   1.   1.   0.   5.  14.  24.  32.
5.   4.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   2.   1.   2.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
 101. 0.50 2.35 3.47 4.59 6.82 9.06 11.313.5318.0122.37 55.0
0750.0750.0750.0750.0750.0750.0750.0750.0750.0750.0750.0750.0750.0750.07
50.0750.
1000.1000.1000.1000.1000.1000.1000.1000.1000.1000.1000.1000.1000.1000.10
00.1000.
   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.
1.   1.
   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.   1.
1.   1.
0500.0500.0500.0500.0500.0500.0500.0500.0500.0500.0500.0500.0500.0500.05
00.0500.
0000.0000.0000.0000.0000.0000.0000.0000.0000.0000.0000.0000.0000.0000.00
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PRINTOUT OF INPUT CARDS

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   1     00010 01111 00000 00000 00000 00000 00000 00000 00000 00000
00000 00000 00000 00000 00000 00000   2     Peach Bottom
Stack Release
   3     97.5 meters         10.1-96.3 meters
   4
   5     Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316
ft Delta T           6          11 42771     1
   7          0.500  2584.000    54.300   131.400    97.500
   8       0.000  0.000  0.000  2.000  6.000  5.000  0.000
   9       0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       0.000  0.000  0.000  0.000  3.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       0.000  2.000 10.000 10.000 15.000  3.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       5.000  6.000 10.000 23.000 59.000 25.000  2.000  0.000  0.000
1.000  2.000  0.000  0.000  0.000  0.000  1.000
   9       1.000  3.000 11.000 18.000 43.000 40.000 10.000  4.000  2.000
2.000  2.000  0.000  1.000  3.000  0.000  0.000
   9       0.000  6.000 10.000 11.000 13.000 17.000  9.000  0.000  7.000
4.000  3.000  3.000  2.000  3.000  0.000  5.000
   9       0.000  1.000  2.000 13.000  8.000  3.000  9.000  0.000  4.000
3.000  0.000  6.000 13.000  7.000  3.000  4.000
   9       2.000  4.000  9.000 11.000  2.000  3.000  7.000  0.000  6.000
2.000  2.000  1.000 14.000  5.000  2.000 14.000
   9       1.000  2.000  0.000  1.000  0.000  1.000  0.000  0.000  0.000
0.000  0.000  2.000 10.000  2.000  0.000  1.000
   9       1.000  0.000  0.000  0.000  0.000  1.000  0.000  0.000  0.000
0.000  0.000  1.000  6.000  5.000  1.000  1.000
   9       0.000  1.000  1.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       0.000  1.000  1.000  9.000  5.000  0.000  2.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       1.000  7.000  5.000  8.000 21.000  5.000  1.000  0.000  0.000
0.000  0.000  0.000  1.000  0.000  1.000  0.000
   9      12.000 15.000  9.000 11.000 34.000 19.000  6.000  1.000  1.000
4.000  3.000  1.000  3.000  1.000  2.000  3.000
   9       1.000 11.000 11.000 18.000  6.000 21.000 11.000  4.000  4.000
4.000  4.000  2.000  3.000  5.000  1.000  7.000
   9       2.000  5.000  4.000  2.000  5.000  9.000 13.000  5.000 17.000
9.000  6.000  5.000 13.000  2.000  1.000 12.000
   9       3.000  0.000  3.000  1.000  3.000  0.000  9.000  6.000 14.000
5.000  6.000  7.000 10.000  8.000  3.000 15.000
   9       8.000  2.000  1.000  1.000  0.000  2.000  5.000  3.000 22.000
5.000  3.000 13.000 21.000 15.000  6.000 20.000
   9       1.000  3.000  0.000  0.000  0.000  1.000  1.000  1.000  6.000
1.000  1.000  2.000 11.000 12.000  5.000  6.000
   9       0.000  0.000  1.000  0.000  0.000  0.000  0.000  0.000  1.000
1.000  0.000  1.000  7.000 10.000  0.000  0.000
   9       0.000  2.000  2.000  1.000  0.000  0.000  0.000  0.000  0.000
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   9       0.000  3.000 10.000 14.000  1.000  0.000  0.000  0.000  0.000
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   9       4.000  7.000 11.000 16.000 31.000 17.000  2.000  0.000  1.000
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9 18.000 18.000 28.000 26.000 28.000 20.000 14.000 13.000 12.000
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58.000345.000108.000 91.000139.000311.000543.000821.000694.000
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21.000 15.000 20.000211.000392.000489.000230.000
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9 21.000 15.000 15.000 20.000 24.000 17.000 26.000 16.000 26.000
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68.000116.000152.000195.000423.000257.000165.000149.000193.000161.000255
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9 102.000 30.000 25.000 9.000 37.000 61.000
88.000142.000284.000182.000 99.000157.000213.000232.000277.000276.000
9 110.000 26.000 17.000 6.000 39.000 46.000
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19.000 27.000 38.000 88.000124.000101.000 48.000
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9 53.000 19.000 18.000 17.000 15.000 28.000 43.000 44.000 75.000
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72.000105.000 77.000 88.000 49.000 69.000 53.000
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS A
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22 0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05 1.13	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.55 1.67	0.000	0.000	0.000	0.000	0.007	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.007
2.05 2.21	0.000	0.005	0.023	0.023	0.035	0.007	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.094
3.05 3.28	0.012	0.014	0.023	0.054	0.138	0.058	0.005	0.000	0.000	0.002	0.005	0.000	0.000	0.000	0.000	0.002	0.313
4.05 4.36	0.002	0.007	0.026	0.042	0.101	0.094	0.023	0.009	0.005	0.005	0.005	0.000	0.002	0.007	0.000	0.000	0.327
5.05 5.44	0.000	0.014	0.023	0.026	0.030	0.040	0.021	0.000	0.016	0.009	0.007	0.007	0.005	0.007	0.000	0.012	0.217
6.05 6.52	0.000	0.002	0.005	0.030	0.019	0.007	0.021	0.000	0.009	0.007	0.000	0.014	0.030	0.016	0.007	0.009	0.178
8.05 8.67	0.005	0.009	0.021	0.026	0.005	0.007	0.016	0.000	0.014	0.005	0.005	0.002	0.033	0.012	0.005	0.033	0.196
10.00 10.77	0.002	0.005	0.000	0.002	0.000	0.002	0.000	0.000	0.000	0.000	0.000	0.005	0.023	0.005	0.000	0.002	0.047
24.59 26.49	0.002	0.000	0.000	0.000	0.000	0.002	0.000	0.000	0.000	0.000	0.000	0.002	0.014	0.012	0.002	0.002	0.037
TOTAL	0.02	0.06	0.12	0.20	0.33	0.22	0.09	0.01	0.04	0.03	0.02	0.03	0.11	0.06	0.01	0.06	1.42

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS B
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22 0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05 1.13	0.000	0.002	0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005
1.55 1.67	0.000	0.002	0.002	0.021	0.012	0.000	0.005	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.042
2.05 2.21	0.002	0.016	0.012	0.019	0.049	0.012	0.002	0.000	0.000	0.000	0.000	0.000	0.002	0.000	0.002	0.000	0.117
3.05 3.28	0.028	0.035	0.021	0.026	0.079	0.044	0.014	0.002	0.002	0.009	0.007	0.002	0.007	0.002	0.005	0.007	0.292

4.05	4.36	0.002	0.026	0.026	0.042	0.014	0.049	0.026	0.009
0.009	0.009	0.009	0.005	0.007	0.012	0.002	0.016	0.264	
5.05	5.44	0.005	0.012	0.009	0.005	0.012	0.021	0.030	0.012
0.040	0.021	0.014	0.012	0.030	0.005	0.002	0.028	0.257	
6.05	6.52	0.007	0.000	0.007	0.002	0.007	0.000	0.021	0.014
0.033	0.012	0.014	0.016	0.023	0.019	0.007	0.035	0.217	
8.05	8.67	0.019	0.005	0.002	0.002	0.000	0.005	0.012	0.007
0.051	0.012	0.007	0.030	0.049	0.035	0.014	0.047	0.297	
10.00	10.77	0.002	0.007	0.000	0.000	0.000	0.002	0.002	0.002
0.014	0.002	0.002	0.005	0.026	0.028	0.012	0.014	0.119	
24.59	26.49	0.000	0.000	0.002	0.000	0.000	0.000	0.000	0.000
0.002	0.002	0.000	0.002	0.016	0.023	0.000	0.000	0.049	
TOTAL		0.07	0.11	0.08	0.12	0.17	0.13	0.11	0.05
0.15	0.07	0.05	0.07	0.16	0.12	0.04	0.15	1.66	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS C
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
1.05	1.13	0.000	0.005	0.005	0.002	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.012	
1.55	1.67	0.000	0.007	0.023	0.033	0.002	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.065	
2.05	2.21	0.009	0.016	0.026	0.037	0.072	0.040	0.005	0.000
0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.002	0.210	
3.05	3.28	0.042	0.033	0.035	0.040	0.040	0.094	0.014	0.009
0.026	0.009	0.016	0.007	0.005	0.005	0.007	0.037	0.419	
4.05	4.36	0.061	0.028	0.019	0.026	0.023	0.049	0.061	0.030
0.047	0.030	0.021	0.009	0.037	0.014	0.019	0.082	0.556	
5.05	5.44	0.049	0.014	0.007	0.019	0.012	0.026	0.072	0.023
0.094	0.033	0.035	0.033	0.054	0.030	0.021	0.105	0.627	
6.05	6.52	0.019	0.019	0.000	0.007	0.005	0.007	0.035	0.028
0.087	0.040	0.026	0.035	0.026	0.049	0.042	0.101	0.524	
8.05	8.67	0.033	0.005	0.009	0.005	0.005	0.007	0.016	0.012
0.112	0.042	0.037	0.056	0.112	0.105	0.061	0.173	0.790	
10.00	10.77	0.009	0.002	0.000	0.000	0.002	0.005	0.000	0.002
0.023	0.000	0.007	0.007	0.068	0.063	0.051	0.033	0.274	
24.59	26.49	0.002	0.007	0.000	0.000	0.000	0.000	0.000	0.000
0.002	0.000	0.005	0.005	0.037	0.077	0.028	0.009	0.173	
TOTAL		0.22	0.14	0.12	0.17	0.16	0.23	0.20	0.11
0.39	0.15	0.15	0.15	0.34	0.34	0.23	0.54	3.65	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS D
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.24	0.000	0.000	0.001	0.001	0.001	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005	
1.05	1.13	0.042	0.042	0.065	0.061	0.065	0.047	0.033	0.030
0.028	0.014	0.021	0.014	0.019	0.044	0.019	0.023	0.568	
1.55	1.67	0.096	0.094	0.187	0.217	0.203	0.154	0.072	0.051
0.068	0.040	0.054	0.021	0.042	0.044	0.065	0.094	1.503	
2.05	2.21	0.157	0.124	0.182	0.231	0.304	0.180	0.126	0.117
0.091	0.072	0.065	0.056	0.070	0.044	0.094	0.117	2.032	

3.05	3.28	0.489	0.278	0.281	0.407	0.531	0.419	0.449	0.313	0.400	0.257	0.229	0.210	0.208	0.138	0.276	0.540	5.424	
4.05	4.36	0.505	0.409	0.292	0.437	0.503	0.393	0.659	0.547	0.748	0.475	0.299	0.187	0.255	0.269	0.435	0.912	7.325	
5.05	5.44	0.554	0.353	0.276	0.288	0.313	0.302	0.496	0.477	0.772	0.451	0.332	0.208	0.313	0.374	0.549	1.024	7.082	
6.05	6.52	0.545	0.231	0.187	0.126	0.241	0.238	0.302	0.344	0.641	0.309	0.187	0.241	0.332	0.458	0.776	0.949	6.107	
8.05	8.67	0.650	0.264	0.122	0.103	0.203	0.220	0.250	0.136	0.807	0.253	0.213	0.325	0.727	1.270	1.920	1.623	9.083	
10.00	10.77	0.161	0.065	0.030	0.026	0.056	0.056	0.035	0.023	0.224	0.049	0.035	0.047	0.493	0.917	1.143	0.538	3.900	
24.59	26.49	0.058	0.023	0.023	0.005	0.042	0.016	0.019	0.002	0.094	0.014	0.012	0.028	0.290	0.531	0.599	0.220	1.976	
TOTAL		3.26	1.88	1.65	1.90	2.46	2.03	2.44	2.04	3.87	1.93	1.45	1.34	2.75	4.09	5.88	6.04	45.00	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS E
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22	0.26	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.014
1.05	1.22	0.049	0.035	0.035	0.047	0.056	0.040	0.061	0.037	0.061	0.037	0.040	0.044	0.070	0.040	0.054	0.026	0.732
1.55	1.80	0.091	0.068	0.049	0.096	0.084	0.101	0.082	0.101	0.103	0.094	0.098	0.082	0.056	0.044	0.037	0.054	1.239
2.05	2.38	0.117	0.101	0.082	0.119	0.152	0.112	0.210	0.161	0.140	0.152	0.147	0.084	0.098	0.054	0.070	0.084	1.884
3.05	3.54	0.320	0.215	0.213	0.323	0.393	0.264	0.435	0.411	0.615	0.458	0.383	0.260	0.238	0.192	0.262	0.269	5.251
4.05	4.70	0.414	0.306	0.222	0.203	0.288	0.313	0.479	0.547	1.010	0.638	0.447	0.271	0.281	0.271	0.360	0.468	6.518
5.05	5.86	0.421	0.185	0.161	0.094	0.159	0.271	0.355	0.456	0.989	0.601	0.386	0.348	0.451	0.376	0.596	0.498	6.348
6.05	7.02	0.238	0.070	0.058	0.021	0.087	0.143	0.206	0.332	0.664	0.426	0.231	0.367	0.498	0.542	0.648	0.645	5.176
8.05	9.35	0.257	0.061	0.040	0.014	0.091	0.108	0.161	0.241	0.858	0.351	0.372	0.414	0.975	1.031	1.153	0.786	6.911
10.00	11.61	0.056	0.023	0.007	0.009	0.026	0.047	0.037	0.026	0.168	0.044	0.063	0.089	0.206	0.290	0.236	0.112	1.440
24.59	28.54	0.019	0.002	0.014	0.002	0.049	0.007	0.021	0.002	0.021	0.005	0.005	0.005	0.023	0.028	0.023	0.033	0.260
TOTAL		1.98	1.07	0.88	0.93	1.39	1.41	2.05	2.32	4.63	2.81	2.17	1.96	2.90	2.87	3.44	2.97	35.77

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS F
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22	0.26	0.001	0.000	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.000	0.012
1.05	1.22	0.037	0.016	0.030	0.023	0.026	0.028	0.023	0.028	0.028	0.028	0.035	0.035	0.033	0.030	0.030	0.016	0.449
1.55	1.80	0.023	0.028	0.021	0.037	0.047	0.026	0.042	0.047	0.026	0.047	0.040	0.042	0.037	0.035	0.030	0.035	0.563

2.05	2.38	0.061	0.030	0.033	0.023	0.030	0.042	0.063	0.079
0.077	0.068	0.063	0.084	0.051	0.042	0.042	0.047	0.837	
3.05	3.54	0.124	0.044	0.042	0.040	0.035	0.065	0.101	0.103
0.175	0.208	0.231	0.150	0.101	0.091	0.140	0.138	1.789	
4.05	4.70	0.145	0.044	0.016	0.023	0.033	0.042	0.087	0.075
0.208	0.168	0.245	0.180	0.206	0.115	0.161	0.124	1.873	
5.05	5.86	0.068	0.021	0.014	0.000	0.012	0.026	0.042	0.108
0.108	0.108	0.154	0.199	0.199	0.173	0.203	0.133	1.566	
6.05	7.02	0.028	0.009	0.007	0.000	0.000	0.005	0.016	0.035
0.094	0.044	0.072	0.133	0.199	0.129	0.157	0.110	1.038	
8.05	9.35	0.005	0.000	0.000	0.000	0.000	0.002	0.009	0.014
0.056	0.047	0.054	0.187	0.299	0.243	0.143	0.044	1.104	
10.00	11.61	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.002	0.007	0.002	0.049	0.054	0.054	0.000	0.012	0.180	
24.59	28.54	0.002	0.000	0.000	0.000	0.009	0.000	0.000	0.000
0.000	0.000	0.000	0.002	0.002	0.000	0.000	0.000	0.016	
TOTAL		0.49	0.19	0.16	0.15	0.19	0.24	0.38	0.49
0.77	0.73	0.90	1.06	1.18	0.91	0.91	0.66	9.43	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS G
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.26	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
1.05	1.22	0.016	0.021	0.014	0.014	0.019	0.005	0.002	0.016
0.019	0.019	0.002	0.023	0.019	0.019	0.016	0.023	0.248	
1.55	1.80	0.009	0.012	0.012	0.009	0.012	0.007	0.007	0.005
0.021	0.002	0.012	0.019	0.012	0.014	0.014	0.021	0.187	
2.05	2.38	0.009	0.021	0.012	0.009	0.012	0.002	0.026	0.009
0.019	0.021	0.014	0.019	0.016	0.019	0.026	0.028	0.262	
3.05	3.54	0.082	0.019	0.035	0.030	0.016	0.012	0.028	0.012
0.051	0.044	0.051	0.044	0.058	0.051	0.103	0.079	0.718	
4.05	4.70	0.040	0.007	0.012	0.009	0.007	0.002	0.019	0.007
0.014	0.037	0.084	0.058	0.065	0.061	0.124	0.145	0.692	
5.05	5.86	0.016	0.009	0.002	0.000	0.000	0.002	0.009	0.007
0.019	0.009	0.037	0.094	0.063	0.047	0.096	0.068	0.479	
6.05	7.02	0.000	0.000	0.000	0.000	0.000	0.000	0.005	0.002
0.002	0.012	0.023	0.054	0.087	0.023	0.040	0.019	0.267	
8.05	9.35	0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.002
0.002	0.000	0.012	0.033	0.056	0.075	0.012	0.009	0.203	
10.00	11.61	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.005	0.002	0.005	0.000	0.000	0.012	
24.59	28.54	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
TOTAL		0.18	0.09	0.09	0.07	0.07	0.03	0.10	0.06
0.15	0.14	0.24	0.35	0.38	0.31	0.43	0.39	3.07	

WIND MEASURED AT 97.5 METERS.
WIND SPEED CORRECTED TO THE RELEASE HEIGHT OF 131.4 METERS.

OVERALL WIND DIRECTION FREQUENCY

WIND DIRECTION:	N	NNE	NE	ENE	E	ESE	SE	SSE
S SSW SW WSW W WNW NW NNW								
FREQUENCY:	6.2	3.5	3.1	3.5	4.8	4.3	5.4	5.1
10.0 5.9 5.0 5.0 7.8 8.7 10.9 10.8								

OVERALL WIND SPEED FREQUENCY AS MEASURED ON THE TOWER:
MAX.WIND SPEED (M/S): 0.224 1.051 1.551 2.052 3.049 4.050
5.052 6.048 8.051 10.000 24.587
WIND SPEED FREQUENCY: 0.03 2.01 3.61 5.44 14.21 17.56 16.58
13.51 18.59 5.97 2.51

BUILDING AND RELEASE CHARACTERISTICS:
RELEASE HEIGHT: 131.40 METERS
MIXING VOLUME COEFFICIENT: 0.50
BUILDING CROSS-SECTIONAL AREA: 2584.00 SQUARE METERS

BOUNDARY DISTANCES (METERS) FROM THE SOURCE FOR EACH DOWNWIND SECTOR:

DOWNWIND SECTOR	S	SSW	SW	WSW	W	WNW	NW	NNW	N	NNE	NE	ENE	E	ESE	SE	SSE
BOUNDARY 1	750.	750.	750.	750.	750.	750.	750.	750.	750.	750.	750.	750.	750.	750.	750.	750.
BOUNDARY 2	1000.	1000.	1000.	1000.	1000.	1000.	1000.	1000.	1000.	1000.	1000.	1000.	1000.	1000.	1000.	1000.

DISTANCES AND TERRAIN HEIGHTS (IN METERS) AS A FUNCTION OF THE DOWNWIND SECTOR:

SECTOR	S	SSW	SW	WSW	W	WNW	NW	NNW	N	NNE	NE	ENE	E	ESE	SE	SSE
DISTANCE	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.
ELEVATION	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.

THE CONVERSION FACTOR APPLIED TO THE WIND SPEED CLASSES IS 0.447

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

WINDSPEEDS ADJUSTED TO 131.4 METERS.

PERCENT OF THE TIME A GIVEN WINDSPEED IS LOWER:

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.24	0.00
0.26	0.03
1.13	0.61
1.22	2.04
1.67	3.66
1.80	5.65
2.21	8.10
2.38	11.09
3.28	17.54
3.54	25.29
4.36	33.77
4.70	42.85
5.44	51.03
5.86	59.43
6.52	66.45
7.02	72.93
8.67	83.30
9.35	91.52
10.77	95.86
11.61	97.49
26.49	99.72
28.54	100.00

WINDSPEED (INTERPOLATED) (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.26	0.03
1.19	2.04
1.74	5.65
2.30	11.09
3.42	25.29
4.54	42.85
5.66	59.43
6.76	72.93
8.97	91.52
11.00	97.49
26.72	100.00

LOG-NORMAL INTERPOLATION PERCENTILES

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.87	1.00
1.37	3.00
1.66	5.00
2.20	10.00
2.63	15.00
3.02	20.00
3.40	25.00
3.72	30.00
4.03	35.00
4.35	40.00
4.67	45.00
4.99	50.00
5.33	55.00
5.70	60.00
6.07	65.00
6.49	70.00
6.92	75.00
7.36	80.00
8.05	85.00
8.67	90.00

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.19	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	0.04	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	8.7	0.08	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
A	10.8	0.04	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	6.913E-07
A	26.5	0.04	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.812E-07
B	2.2	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.45	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.11	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	2.2	0.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.68	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.98	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.79	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.30	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.53	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.15	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.04	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	7.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.11	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	8.90	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	8.75	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	10.44	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	2.59	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.94	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.15	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	3.83	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.13	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.90	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.30	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.99	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       2.33     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.09     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.45     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.08     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       28.5       0.04     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.31     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.64     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        9.3       0.04     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.670E-06	3.312E-06	3.257E-06	3.143E-06	2.366E-06	2.268E-06	2.243E-06		
0.006	0.021	0.036	0.074	0.750	0.900	1.351	1.389	1.577	3.117		
0.00035	0.00129	0.00226	0.00460	0.04668	0.05604	0.08409	0.08643	0.09812	0.19398		
2.192E-06	1.897E-06	1.880E-06	1.707E-06	1.696E-06	1.650E-06	1.584E-06	1.323E-06	1.273E-06	1.190E-06		
3.793	3.868	4.657	4.695	7.211	8.188	8.301	9.090	10.555	10.855		
0.23607	0.24074	0.28984	0.29218	0.44883	0.50961	0.51663	0.56573	0.65691	0.67562		
1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.587E-07	8.302E-07	6.935E-07	6.913E-07		
18.707	19.007	19.608	21.487	21.524	29.639	29.714	30.240	30.615	30.653		
1.16426	1.18297	1.22038	1.33728	1.33962	1.84463	1.84931	1.88204	1.90542	1.90776		
6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.528E-07	3.479E-07		
39.556	39.706	44.853	53.606	54.582	61.232	71.675	78.437	80.428	83.020		
2.46187	2.47122	2.79154	3.33630	3.39709	3.81092	4.46089	4.88174	5.00565	5.16698		
3.265E-07	2.812E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07		
86.852	86.889	86.927	89.256	93.388	94.478	95.379	95.830	96.769	96.844		
5.40546	5.40779	5.41013	5.55509	5.81227	5.88008	5.93619	5.96425	6.02270	6.02737		

9.605E-08 8.032E-08 6.505E-08 4.918E-08 4.375E-08 3.310E-08
2.491E-08 1.998E-08 1.253E-08
97.107 97.408 97.558 97.708 97.746 99.061
99.700 99.962 100.000
6.04374 6.06244 6.07180 6.08115 6.08349 6.16532
6.20506 6.22143 6.22377

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= HANDCHECK 0.084
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(3)= HANDCHECK 0.509
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= HANDCHECK 1.163
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= HANDCHECK 1.847
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= HANDCHECK 3.333
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= HANDCHECK 4.457

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
1	1	-11.07050	-16.38174	-1.18138
1	2	-12.67032	-16.20888	-1.12635
1	3	-13.31455	-16.46983	-1.22791
1	4	-13.68351	-17.21285	-1.55535
1	5	-13.96783	-17.27983	-1.58745
1	6	-14.36856	-18.28266	-2.13427
1	7	-14.65458		

NUMXQ(K)= 7

3.484E-06	0.062	1.000
2.395E-06	0.187	3.000
1.991E-06	0.311	5.000
1.514E-06	0.622	10.000
1.264E-06	0.934	15.000
1.096E-06	1.245	20.000
9.569E-07	1.556	25.000
8.534E-07	1.867	30.000
7.712E-07	2.178	35.000
7.051E-07	2.490	40.000
6.504E-07	2.801	45.000
6.043E-07	3.112	50.000
5.612E-07	3.423	55.000
5.157E-07	3.734	60.000

4.766E-07	4.045	65.000
4.426E-07	4.357	70.000
1.663E-06	0.5	8.03

ANNUAL AVERAGE = 2.66E-09

K= 1 FIVEXQ(K)= 1.663E-06 FIVEPR(K)= 8.034

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.376	3.982	5.034	12.976	65.311	97.183
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	2.2	0.13	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	3.369E-06
A	3.3	0.40	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	0.20	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.40	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.07	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.26	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
A	10.8	0.13	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	6.913E-07
B	1.1	0.07	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.121E-06
B	1.7	0.07	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.46	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.99	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.73	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	8.7	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.20	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	1.1	0.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.20	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	0.46	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06

AT 131.4 METERS
CA=1292.SQ.METERS

C	3.3	0.93	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.192E-06						
C	4.4	0.79	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.650E-06						
C	5.4	0.40	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.323E-06						
C	6.5	0.53	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.105E-06						
C	8.7	0.13	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
C	10.8	0.07	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
C	26.5	0.20	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.719E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.19	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	2.65	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	3.51	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	7.88	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	11.58	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	10.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.55	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	7.48	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.85	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.66	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.92	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.85	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	8.67	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.66	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						

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   F          0.3        0.01     90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   4.813E-06
   F          1.2        0.46     90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   1.024E-06
   F          1.8        0.79     90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   6.935E-07
   F          2.4        0.86     90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   5.243E-07
   F          3.5        1.26     90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   3.528E-07
   F          4.7        1.26     90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   2.656E-07
   F          5.9        0.60     90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   2.130E-07
   F          7.0        0.26     90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   1.779E-07

   G          1.2        0.60     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   9.605E-08
   G          1.8        0.33     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   6.505E-08
   G          2.4        0.60     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   4.918E-08
   G          3.5        0.53     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   3.310E-08
   G          4.7        0.20     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   2.491E-08
   G          5.9        0.26     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.998E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	9.121E-06	8.835E-06	6.362E-06	6.177E-06	4.813E-06	4.670E-06	4.309E-06	3.369E-06	3.312E-06	
0.010	0.076	0.095	0.227	0.294	0.306	0.769	0.968	1.100	2.292	
0.00035	0.00268	0.00336	0.00803	0.01037	0.01080	0.02716	0.03418	0.03885	0.08094	

3.257E-06	3.143E-06	2.366E-06	2.268E-06	2.243E-06	2.192E-06	1.897E-06	1.880E-06	1.707E-06	1.696E-06	
2.755	3.748	4.476	4.873	7.521	8.448	8.779	9.772	9.971	13.479	
0.09730	0.13237	0.15809	0.17212	0.26564	0.29838	0.31007	0.34514	0.35215	0.47607	

1.650E-06	1.369E-06	1.323E-06	1.273E-06	1.190E-06	1.143E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	
14.273	14.671	15.068	16.988	17.120	17.186	25.064	25.593	26.057	28.903	
0.50412	0.51815	0.53218	0.59998	0.60466	0.60700	0.88522	0.90393	0.92029	1.02083	

9.582E-07	8.590E-07	8.587E-07	8.302E-07	6.935E-07	6.913E-07	6.887E-07	6.684E-07	6.477E-07	5.752E-07	
29.102	40.687	40.951	41.084	41.878	42.010	52.006	52.073	58.163	64.716	
1.02784	1.43700	1.44635	1.45103	1.47908	1.48376	1.83680	1.83914	2.05424	2.28570	

5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	
65.577	74.249	81.729	86.959	88.217	90.070	92.056	92.255	93.513	95.234	
2.31610	2.62238	2.88658	3.07128	3.11570	3.18117	3.25131	3.25832	3.30275	3.36354	

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   2.130E-07   1.975E-07   1.779E-07   1.415E-07   9.605E-08   8.032E-08
6.505E-08   4.918E-08   3.310E-08   2.491E-08
      95.830      96.492      96.756      97.418      98.014      98.080
98.411      99.007      99.537      99.735
     3.38458     3.40796     3.41731     3.44069     3.46173     3.46407
3.47576     3.49680     3.51551     3.52252

   1.998E-08
     100.000
     3.53187

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME     INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.003
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.132
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.298
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.504
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.884
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.445
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.052

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1     -11.07050 -16.06673  -1.11131
  2  2     -11.63677 -15.84092  -1.05466
  2  3     -12.67032 -16.89496  -1.40528
  2  4     -13.03054 -17.45454  -1.60877
  2  5     -13.31455 -18.03320  -1.83363
  2  6     -13.68351 -17.28543  -1.51840
  2  7     -13.96783 -18.31174  -1.98813
  2  8     -14.24977     NUMXQ(K)=  8
    4.698E-06              0.035              1.000
    3.373E-06              0.106              3.000
    2.775E-06              0.177              5.000
    2.004E-06              0.353             10.000
    1.599E-06              0.530             15.000
    1.327E-06              0.706             20.000
    1.143E-06              0.883             25.000
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1.030E-06	1.060	30.000
9.424E-07	1.236	35.000
8.709E-07	1.413	40.000
7.972E-07	1.589	45.000
7.327E-07	1.766	50.000
6.782E-07	1.943	55.000
1.658E-06	0.5	14.16

ANNUAL AVERAGE = 5.09E-09

K= 2 FIVEXQ(K)= 1.658E-06 FIVEPR(K)=14.157

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.589	5.428	8.407	13.914	67.279	97.484
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.75	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	3.369E-06
A	3.3	0.75	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	0.83	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.75	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.15	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.68	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
B	1.1	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.121E-06
B	1.7	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.38	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.68	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.83	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.23	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	26.5	0.08	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	1.1	0.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.75	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	0.83	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06

C	3.3	1.13	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.192E-06						
C	4.4	0.60	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.650E-06						
C	5.4	0.23	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.323E-06						
C	8.7	0.30	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
D	0.2	0.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	2.11	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	6.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	5.87	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	9.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	9.40	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	8.87	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	3.91	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	0.98	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.75	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.58	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.84	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.14	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.19	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.88	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.28	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.45	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.03	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.68	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.35	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.53	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
G	1.2	0.45	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	9.121E-06	8.835E-06	6.362E-06	6.177E-06	4.813E-06	4.670E-06	4.309E-06	3.369E-06	3.312E-06	
0.017	0.093	0.114	0.265	0.340	0.365	0.741	1.493	2.245	4.351	
0.00054	0.00288	0.00355	0.00823	0.01056	0.01135	0.02304	0.04643	0.06981	0.13527	
3.257E-06	3.143E-06	2.366E-06	2.268E-06	2.243E-06	2.192E-06	1.897E-06	1.880E-06	1.707E-06	1.696E-06	
5.178	5.855	6.682	7.434	13.449	14.577	14.878	16.006	16.833	22.698	
0.16099	0.18203	0.20775	0.23113	0.41817	0.45324	0.46260	0.49767	0.52338	0.70575	
1.650E-06	1.584E-06	1.369E-06	1.323E-06	1.273E-06	1.190E-06	1.143E-06	1.141E-06	1.024E-06	9.624E-07	
23.300	23.526	24.278	24.503	26.082	26.157	26.308	35.331	36.309	38.941	
0.72445	0.73147	0.75485	0.76186	0.81096	0.81330	0.81798	1.09854	1.12893	1.21077	
8.590E-07	8.587E-07	8.302E-07	6.935E-07	6.887E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	
48.340	49.017	49.318	49.995	58.868	65.711	71.726	72.779	79.923	83.833	
1.50302	1.52406	1.53341	1.55446	1.83034	2.04311	2.23015	2.26288	2.48499	2.60657	
3.909E-07	3.897E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	
89.021	89.097	90.450	91.428	93.308	93.834	95.112	95.563	95.789	96.015	
2.76790	2.77023	2.81232	2.84271	2.90116	2.91753	2.95728	2.97130	2.97832	2.98533	

```
   1.415E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08
      96.767      97.218      97.669      98.045      98.421      99.549
99.925     100.000
     3.00871     3.02274     3.03677     3.04846     3.06015     3.09522
3.10691     3.10925
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.135
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.453
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.705
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.097
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   1.522
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.041
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
3	1	-11.07050	-15.93103	-1.10444
3	2	-12.61806	-13.54425	-0.30876
3	3	-12.63456	-15.39310	-0.93628
3	4	-12.67032	-16.18472	-1.20850
3	5	-13.03054	-17.35096	-1.65534
3	6	-13.28753	-19.23502	-2.42285
3	7	-13.68351	-18.80966	-2.23721
3	8	-13.96783	-19.10152	-2.37207
3	9	-14.24977		

NUMXQ(K)= 9

5.280E-06	0.031	1.000
3.745E-06	0.093	3.000
3.268E-06	0.155	5.000
2.554E-06	0.311	10.000
2.157E-06	0.466	15.000
1.827E-06	0.622	20.000
1.558E-06	0.777	25.000
1.324E-06	0.933	30.000
1.151E-06	1.088	35.000
1.026E-06	1.244	40.000
9.260E-07	1.399	45.000
8.428E-07	1.555	50.000

7.698E-07	1.710	55.000
7.079E-07	1.866	60.000
6.547E-07	2.021	65.000
2.073E-06	0.5	16.08

ANNUAL AVERAGE = 6.48E-09

K= 3 FIVEXQ(K)= 2.073E-06 FIVEPR(K)=16.081

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
3.910	7.896	10.603	15.892	68.847	97.218
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.66	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	3.369E-06
A	3.3	1.52	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	1.19	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.73	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.86	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.73	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
A	10.8	0.07	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	6.913E-07
B	1.7	0.59	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.53	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.73	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	1.19	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.07	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.07	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
C	1.1	0.07	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.92	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	1.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	1.12	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06

C	4.4	0.73	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.650E-06						
C	5.4	0.53	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.323E-06						
C	6.5	0.20	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.105E-06						
C	8.7	0.13	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.72	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	6.14	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	6.54	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	11.49	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	12.35	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	8.12	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	3.57	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	2.91	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	0.73	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.13	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.71	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	9.12	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	5.75	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	2.64	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	0.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	0.40	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	1.06	90000.	0.	131.	1000.0		

```
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.66    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.12    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       0.66    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07

   G         1.2       0.40    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.86    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 6.362E-06 6.177E-06 4.813E-06 4.670E-06 4.309E-06 3.369E-06 3.312E-06 3.257E-06
0.014 0.039 0.106 0.700 0.717 1.246 2.170 2.831 4.548 5.605
0.00050 0.00140 0.00373 0.02478 0.02539 0.04409 0.07682 0.10020 0.16099 0.19840

3.143E-06 2.366E-06 2.268E-06 2.243E-06 2.192E-06 1.897E-06 1.880E-06 1.707E-06 1.696E-06 1.650E-06
6.332 7.521 9.040 15.184 16.307 16.439 17.760 18.949 25.488 26.215
0.22412 0.26620 0.31998 0.53742 0.57716 0.58184 0.62860 0.67068 0.90215 0.92787

1.584E-06 1.369E-06 1.323E-06 1.273E-06 1.190E-06 1.143E-06 1.141E-06 1.105E-06 1.024E-06 9.624E-07
26.281 27.008 27.536 30.244 30.310 31.169 42.663 42.861 43.522 46.891
0.93020 0.95592 0.97463 1.07049 1.07282 1.10322 1.51004 1.51705 1.54043 1.65967

8.590E-07 8.587E-07 8.302E-07 6.935E-07 6.913E-07 6.887E-07 6.477E-07 5.752E-07 5.243E-07 4.876E-07
59.243 59.970 60.102 61.159 61.225 69.350 78.466 82.033 82.693 88.440
2.09688 2.12260 2.12728 2.16469 2.16702 2.45460 2.77725 2.90350 2.92688 3.13029

4.321E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.656E-07 2.453E-07 1.975E-07 1.415E-07 9.605E-08
91.347 93.989 95.112 95.838 96.433 97.094 97.490 97.754 97.886 98.283
3.23317 3.32669 3.36643 3.39215 3.41320 3.43658 3.45060 3.45996 3.46463 3.47866

8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08
98.349	98.613	98.877	99.736	100.000
3.48100	3.49035	3.49970	3.53010	3.53945

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.224
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.576
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.901
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.508
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.120
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.775
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
4	1	-11.07050	-15.44250	-0.98982
4	2	-11.99462	-15.66697	-1.05426
4	3	-12.67032	-15.90855	-1.13926
4	4	-13.03054	-17.06163	-1.59570
4	5	-13.28753	-18.03492	-2.00721
4	6	-13.68351	-18.13742	-2.05449
4	7	-13.96783	-18.96577	-2.46265
4	8	-14.24977		

NUMXQ(K)= 8

5.579E-06	0.035	1.000
4.007E-06	0.106	3.000
3.400E-06	0.177	5.000
2.653E-06	0.354	10.000
2.267E-06	0.531	15.000
1.953E-06	0.708	20.000
1.715E-06	0.885	25.000
1.500E-06	1.062	30.000
1.333E-06	1.239	35.000
1.201E-06	1.416	40.000
1.092E-06	1.593	45.000
1.001E-06	1.770	50.000
9.243E-07	1.947	55.000
8.583E-07	2.124	60.000
7.901E-07	2.301	65.000
7.312E-07	2.478	70.000

6.798E-07	2.655	75.000
2.321E-06	0.5	14.13

ANNUAL AVERAGE = 1.01E-08

K= 4 FIVEXQ(K)= 2.321E-06 FIVEPR(K)=14.126

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
5.747	10.503	13.806	17.985	71.703	97.952
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.15	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	4.457E-06
A	2.2	0.73	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	3.369E-06
A	3.3	2.89	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	2.11	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.64	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.39	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.10	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
B	1.7	0.24	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	1.03	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	1.67	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.29	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.24	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.15	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
C	1.7	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	1.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.83	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.49	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.24	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06

C	6.5	0.10	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.105E-06						
C	8.7	0.10	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
C	10.8	0.05	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.37	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	4.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	6.37	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	11.12	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	10.53	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	6.56	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	5.04	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	4.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.18	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.88	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.76	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	8.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	6.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	3.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.81	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.91	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.54	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	1.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.54	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.64	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       0.73     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.69     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.24     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F       28.5       0.20     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.39     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.34     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.177E-06	4.813E-06	4.670E-06	4.457E-06	4.309E-06	3.369E-06	3.312E-06	3.257E-06		
0.011	0.034	0.279	0.293	1.321	1.468	1.517	2.252	3.623	5.141		
0.00054	0.00161	0.01330	0.01397	0.06307	0.07009	0.07243	0.10750	0.17296	0.24544		

3.143E-06	2.366E-06	2.268E-06	2.243E-06	2.192E-06	1.897E-06	1.880E-06	1.707E-06	1.696E-06	1.650E-06		
6.806	7.100	9.989	14.250	15.082	15.327	16.502	18.608	24.975	25.464		
0.32493	0.33896	0.47690	0.68031	0.72006	0.73175	0.78786	0.88840	1.19234	1.21572		

1.584E-06	1.369E-06	1.323E-06	1.273E-06	1.143E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	8.590E-07		
25.611	26.248	26.493	28.256	28.648	39.764	39.862	40.401	43.584	54.113		
1.22274	1.25313	1.26482	1.34899	1.36770	1.89843	1.90311	1.92882	2.08080	2.58347		

8.587E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07		
54.211	54.309	55.288	61.851	61.900	70.127	75.171	75.808	81.831	86.092		
2.58815	2.59282	2.63959	2.95288	2.95522	3.34801	3.58883	3.61922	3.90680	4.11021		

3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.415E-07	9.605E-08		
89.422	90.157	91.332	93.144	93.830	95.739	95.984	96.523	97.405	97.796		
4.26919	4.30426	4.36038	4.44689	4.47962	4.57080	4.58249	4.60821	4.65029	4.66900		

8.032E-08	6.505E-08	4.918E-08	4.375E-08	3.310E-08	2.491E-08
98.825	99.070	99.314	99.510	99.853	100.000
4.71810	4.72979	4.74148	4.75083	4.76719	4.77421

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(4)=	HANDCHECK 0.719
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(5)=	HANDCHECK 1.191
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(6)=	HANDCHECK 1.896
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(7)=	HANDCHECK 2.586
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(8)=	HANDCHECK 3.345

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
5	1	-11.07050	-15.40618	-0.98518
5	2	-12.63456	-13.73489	-0.39112
5	3	-12.67032	-16.24401	-1.31295
5	4	-13.03054	-16.38530	-1.37068
5	5	-13.28753	-18.14087	-2.14747
5	6	-13.68351	-18.21946	-2.18533
5	7	-13.96783	-18.81436	-2.49111
5	8	-14.24977	NUMXQ(K)=	8

5.281E-06	0.048	1.000
3.847E-06	0.143	3.000
3.286E-06	0.239	5.000
2.651E-06	0.477	10.000
2.198E-06	0.716	15.000
1.903E-06	0.955	20.000
1.694E-06	1.194	25.000
1.455E-06	1.432	30.000
1.275E-06	1.671	35.000
1.135E-06	1.910	40.000
1.020E-06	2.148	45.000
9.261E-07	2.387	50.000
8.455E-07	2.626	55.000
7.695E-07	2.865	60.000
7.048E-07	3.103	65.000
6.491E-07	3.342	70.000
2.596E-06	0.5	10.47

ANNUAL AVERAGE = 1.69E-08

K= 5 FIVEXQ(K)= 2.596E-06 FIVEPR(K)=10.473

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
7.003	10.382	14.006	18.036	69.615	98.629
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.16	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	3.369E-06
A	3.3	1.37	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	2.19	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.93	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.16	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.16	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
A	10.8	0.05	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	6.913E-07
A	26.5	0.05	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.812E-07
B	2.2	0.27	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	1.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	1.15	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.49	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	8.7	0.11	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	2.2	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	2.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	1.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06

C	6.5	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.11	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	1.09	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	3.61	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	4.21	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	9.79	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	9.19	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	7.05	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	5.58	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	5.14	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	1.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.38	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.93	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	2.35	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	2.62	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	6.18	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	7.33	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	6.34	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	3.34	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	2.52	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.16	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.60	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.98	90000.	0.	131.	1000.0					

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.53    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       0.98    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F         5.9       0.60    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F         7.0       0.11    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F         9.3       0.05    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G         1.2       0.11    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.16    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.27    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.670E-06	3.369E-06	3.312E-06
3.257E-06	3.143E-06	2.366E-06	2.268E-06		
0.009	0.027	0.044	0.317	0.481	1.575
2.505	3.543	4.692	6.059		
0.00038	0.00115	0.00188	0.01357	0.02058	0.06734
0.10709	0.15151	0.20061	0.25906		

2.243E-06	2.192E-06	1.897E-06	1.880E-06	1.707E-06	1.696E-06
1.650E-06	1.369E-06	1.323E-06	1.273E-06		
9.668	11.855	12.347	13.277	15.464	19.674
20.823	21.752	22.354	24.705		
0.41337	0.50689	0.52793	0.56768	0.66120	0.84123
0.89033	0.93008	0.95579	1.05633		

1.190E-06	1.143E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07
9.582E-07	8.590E-07	8.587E-07	8.302E-07		
24.814	24.978	34.766	34.930	35.586	38.211
38.266	47.452	47.616	47.780		
1.06101	1.06802	1.48653	1.49354	1.52160	1.63382
1.63616	2.02895	2.03597	2.04298		

6.935E-07	6.913E-07	6.887E-07	6.684E-07	6.477E-07	5.752E-07
5.243E-07	4.876E-07	4.321E-07	3.909E-07		
48.382	48.436	55.490	55.599	61.778	67.356
68.340	75.667	80.807	87.150		
2.06870	2.07104	2.37264	2.37732	2.64152	2.88000
2.92208	3.23538	3.45515	3.72636		

3.528E-07	3.479E-07	3.265E-07	2.812E-07	2.656E-07	2.453E-07
2.130E-07	1.975E-07	1.779E-07	1.415E-07		
88.681	89.993	93.329	93.384	94.368	96.883
97.485	98.578	98.688	99.070		
3.79183	3.84794	3.99056	3.99290	4.03498	4.14253
4.16825	4.21501	4.21969	4.23605		

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   1.336E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08
      99.125      99.234      99.399      99.563      99.617      99.891
99.945     100.000
     4.23839     4.24307     4.25008     4.25710     4.25943     4.27112
4.27346     4.27580

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.151
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.889
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.485
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.034
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.639
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.877

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  6  1     -11.07050 -15.81508  -1.06064
  6  2     -12.67032 -15.38465  -0.91546
  6  3     -13.03054 -16.65591  -1.40983
  6  4     -13.31455 -17.77735  -1.88300
  6  5     -13.68351 -18.53980  -2.23370
  6  6     -13.96783 -19.21002  -2.56114
  6  7     -14.24977 -20.37158  -3.16089
  6  8     -14.36856     NUMXQ(K)=  8
    4.651E-06              0.043              1.000
    3.317E-06              0.128              3.000
    2.848E-06              0.214              5.000
    2.313E-06              0.428             10.000
    1.951E-06              0.641             15.000
    1.685E-06              0.855             20.000
    1.451E-06              1.069             25.000
    1.272E-06              1.283             30.000
    1.134E-06              1.497             35.000
    1.007E-06              1.710             40.000
    9.046E-07              1.924             45.000
    8.152E-07              2.138             50.000
    7.357E-07              2.352             55.000
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6.689E-07	2.565	60.000
6.042E-07	2.779	65.000
2.202E-06	0.5	11.69

ANNUAL AVERAGE = 9.90E-09

K= 6 FIVEXQ(K)= 2.202E-06 FIVEPR(K)=11.694

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
5.085	10.389	13.506	19.046	66.408	99.289	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.09	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	0.44	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.39	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.39	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.30	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
B	1.7	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.48	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.57	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.39	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.22	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	2.2	0.09	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	1.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.65	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06

AT 131.4 METERS
CA=1292.SQ.METERS

C	8.7	0.30	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.61	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	8.36	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	12.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.61	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.66	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.65	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	1.13	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.61	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	3.83	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	3.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.44	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.61	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.30	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.52	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.35	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NW SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.177E-06	4.813E-06	4.670E-06	3.312E-06	3.257E-06	3.143E-06	2.366E-06	2.268E-06
0.005	0.027	0.114	0.125	0.169	0.778	0.865	1.126	1.605	1.692
0.00027	0.00143	0.00611	0.00672	0.00906	0.04179	0.04647	0.06049	0.08621	0.09089

2.243E-06	2.192E-06	1.897E-06	1.880E-06	1.707E-06	1.696E-06	1.650E-06	1.584E-06	1.369E-06	1.323E-06
3.041	3.302	3.868	4.999	5.434	7.784	8.916	9.307	9.699	11.048
0.16337	0.17740	0.20779	0.26858	0.29196	0.41821	0.47900	0.50004	0.52109	0.59357

1.273E-06	1.190E-06	1.143E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.587E-07
12.571	12.789	13.181	21.536	22.189	22.624	26.541	26.584	38.857	39.161
0.67540	0.68709	0.70813	1.15703	1.19210	1.21548	1.42591	1.42824	2.08757	2.10393

8.302E-07	6.935E-07	6.887E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.528E-07
39.466	40.249	49.475	57.569	63.183	64.358	73.280	77.936	84.551	86.422
2.12030	2.16239	2.65805	3.09292	3.39453	3.45766	3.93695	4.18712	4.54250	4.64304

3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	9.605E-08
87.075	90.905	92.515	95.518	96.301	96.997	97.302	97.650	97.824	97.868
4.67811	4.88386	4.97036	5.13169	5.17377	5.21118	5.22755	5.24625	5.25560	5.25794

```
   8.032E-08   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08
1.668E-08
      98.259      98.390      98.869      99.391      99.739      99.913
100.000
     5.27898     5.28600     5.31172     5.33977     5.35848     5.36783
5.37250
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

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 CHI/Q =  1.556E-05      DISTANCE =   4000.000
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X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

```
 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.060
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.156
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.102
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.090

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  7  1     -11.07050 -16.61665  -1.21921
  7  2     -12.67032 -15.89945  -0.99763
  7  3     -13.31455 -16.30682  -1.15486
  7  4     -13.68351 -16.39302  -1.19281
  7  5     -13.96783 -17.43244  -1.70403
  7  6     -14.24977     NUMXQ(K)=  6
    3.275E-06              0.054              1.000
    2.351E-06              0.161              3.000
    2.001E-06              0.269              5.000
    1.576E-06              0.537             10.000
    1.334E-06              0.806             15.000
    1.179E-06              1.075             20.000
    1.065E-06              1.343             25.000
    9.776E-07              1.612             30.000
    9.075E-07              1.880             35.000
    8.459E-07              2.149             40.000
    7.773E-07              2.418             45.000
    7.196E-07              2.686             50.000
    6.704E-07              2.955             55.000

    1.622E-06              0.5                9.31

ANNUAL AVERAGE =   4.62E-09

K=  7     FIVEXQ(K)= 1.622E-06     FIVEPR(K)= 9.307
```

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.610	5.396	7.485	14.634	60.072	98.216	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.18	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
B	3.3	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.18	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.23	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.28	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.14	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	3.3	0.18	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.46	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.55	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.23	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.60	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	6.18	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	10.79	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.41	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.78	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.46	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.05	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.74	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.55	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.92	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	2.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		

```
   G          2.4        0.18     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   4.918E-08
   G          3.5        0.23     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   3.310E-08
   G          4.7        0.14     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   2.491E-08
   G          5.9        0.14     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.998E-08
   G          7.0        0.05     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.668E-08
   G          9.3        0.05     90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 3.143E-06 2.366E-06 2.243E-06 2.192E-06 1.897E-06 1.880E-06
0.005 0.019 0.034 0.633 0.679 0.864 1.879 2.063 2.294 3.032
0.00025 0.00097 0.00170 0.03209 0.03443 0.04378 0.09522 0.10457 0.11626 0.15367

1.707E-06 1.696E-06 1.650E-06 1.584E-06 1.323E-06 1.273E-06 1.190E-06 1.141E-06 1.105E-06 1.024E-06
3.217 5.523 6.123 6.400 6.861 8.845 8.983 15.165 15.718 16.272
0.16302 0.27992 0.31032 0.32435 0.34773 0.44826 0.45528 0.76857 0.79663 0.82469

9.624E-07 9.582E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07 6.477E-07 5.752E-07 5.243E-07
19.455 19.501 30.296 30.526 31.449 40.860 40.906 49.025 55.806 57.375
0.98601 0.98835 1.53545 1.54714 1.59390 2.07086 2.07319 2.48469 2.82838 2.90787

4.876E-07 4.321E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07
68.169 70.845 79.841 81.870 82.332 88.882 90.359 95.110 97.232 97.740
3.45497 3.59058 4.04649 4.14937 4.17275 4.50475 4.57957 4.82038 4.92793 4.95365

1.779E-07 1.415E-07 1.336E-07 9.605E-08 8.032E-08 6.505E-08 4.918E-08 3.310E-08 2.491E-08 1.998E-08
98.432 98.478 98.754 99.077 99.124 99.216 99.400 99.631 99.769 99.908
4.98872 4.99106 5.00509 5.02145 5.02379 5.02847 5.03782 5.04951 5.05653 5.06354

```
   1.668E-08   1.253E-08
      99.954     100.000
     5.06588     5.06822

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.104
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.768
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.534
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.482
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.452

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1     -11.07050 -17.08584  -1.31784
  8  2     -13.03054 -15.59969  -0.83489
  8  3     -13.31455 -16.53978  -1.17836
  8  4     -13.68351 -16.30438  -1.08125
  8  5     -13.96752 -17.04465  -1.42376
  8  6     -14.24977 -18.09881  -1.96077
  8  7     -14.53378     NUMXQ(K)=  7
    2.890E-06             0.051              1.000
    1.994E-06             0.152              3.000
    1.744E-06             0.253              5.000
    1.358E-06             0.507             10.000
    1.146E-06             0.760             15.000
    1.022E-06             1.014             20.000
    9.319E-07             1.267             25.000
    8.626E-07             1.520             30.000
    7.909E-07             1.774             35.000
    7.317E-07             2.027             40.000
    6.822E-07             2.281             45.000
    6.371E-07             2.534             50.000
    5.877E-07             2.788             55.000
    5.453E-07             3.041             60.000
    5.085E-07             3.294             65.000

    1.365E-06             0.5                9.87

ANNUAL AVERAGE =   1.30E-09
```

K= 8 FIVEXQ(K)= 1.365E-06 FIVEPR(K)= 9.865

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.185	2.260	3.183	12.839	53.116	98.801	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					
			AT 131.4 METERS							
CA=1292.SQ.METERS										
A	4.4	0.05	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.16	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.09	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.14	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
B	3.3	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.40	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.51	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.14	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	2.2	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.47	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.86	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.12	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.23	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07

C	26.5	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.719E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.28	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	0.68	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	0.91	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	3.99	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	7.47	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	7.71	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	6.40	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	8.06	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	2.24	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.93	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.01	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.61	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.03	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	1.40	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	6.14	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	10.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	9.88	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	6.63	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	8.57	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.68	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.21	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.28	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.26	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.77	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.75	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	2.08	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.07	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.51	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.14	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.02	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.02	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 3.257E-06 3.143E-06 2.366E-06 2.243E-06 2.192E-06 1.897E-06
0.002 0.014 0.021 0.301 0.325 0.348 0.442 1.119 1.375 1.772
0.00023 0.00140 0.00213 0.03018 0.03252 0.03486 0.04421 0.11201 0.13773 0.17748

1.880E-06 1.707E-06 1.696E-06 1.650E-06 1.584E-06 1.369E-06 1.323E-06 1.273E-06 1.190E-06 1.143E-06
2.379 2.426 3.337 3.804 4.131 4.294 5.228 6.255 6.769 6.862
0.23827 0.24294 0.33413 0.38089 0.41362 0.42999 0.52351 0.62638 0.67782 0.68717

1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.587E-07 8.302E-07 6.935E-07 6.887E-07
10.855 11.719 11.999 13.400 13.540 21.012 21.152 22.272 22.529 30.234
1.08697 1.17348 1.20154 1.34182 1.35585 2.10402 2.11805 2.23027 2.25599 3.02754

6.684E-07 6.477E-07 5.752E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07 3.479E-07
30.468 36.609 43.006 43.777 53.863 61.918 71.795 71.818 73.569 75.811
3.05092 3.66582 4.30644 4.38360 5.39363 6.20025 7.18924 7.19158 7.36693 7.59138

3.265E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07 1.076E-07
82.442 82.465 84.543 93.112 94.186 95.867 96.801 97.735 98.296 98.319
8.25538 8.25772 8.46580 9.32386 9.43141 9.59975 9.69327 9.78679 9.84291 9.84524

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   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08   2.491E-08
1.998E-08   1.668E-08   1.253E-08
      98.506      98.716      98.926      99.113      99.626      99.766
99.953      99.977     100.000
     9.86395     9.88499     9.90603     9.92474     9.97617     9.99020
10.00891    10.01124    10.01358

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.138
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.116
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.663
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   7.185

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  9  1     -11.07050 -16.72827  -1.23497
  9  2     -13.03054 -15.64519  -0.87324
  9  3     -13.31455 -15.95024  -0.98754
  9  4     -13.68351 -16.14683  -1.07319
  9  5     -13.96783 -16.36162  -1.17897
  9  6     -14.24977 -16.99784  -1.53416
  9  7     -14.75472     NUMXQ(K)=  7
    2.468E-06             0.100             1.000
    1.768E-06             0.300             3.000
    1.505E-06             0.501             5.000
    1.177E-06             1.001            10.000
    9.975E-07             1.502            15.000
    8.804E-07             2.003            20.000
    7.901E-07             2.503            25.000
    7.197E-07             3.004            30.000
    6.635E-07             3.505            35.000
    6.084E-07             4.005            40.000
    5.589E-07             4.506            45.000
    5.172E-07             5.007            50.000
    4.814E-07             5.507            55.000
    4.504E-07             6.008            60.000
    4.231E-07             6.509            65.000
    3.990E-07             7.010            70.000

    1.506E-06             0.5               4.99
```

ANNUAL AVERAGE = 3.81E-09

K= 9 FIVEXQ(K)= 1.506E-06 FIVEPR(K)= 4.993

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.444	4.366	5.884	13.620	52.287	98.529	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.04	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	0.08	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.16	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.12	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.08	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
B	3.3	0.16	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.16	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.36	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.20	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.20	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.68	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.72	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.39	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.10	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.31	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.84	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.82	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	10.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	5.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.08	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.16	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.76	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.80     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.12     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.32     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.04     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.36     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.76     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.64     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.16     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.20     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NNE SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 3.143E-06 2.366E-06 2.268E-06 2.243E-06 2.192E-06 1.897E-06
0.002 0.014 0.027 0.266 0.426 0.585 0.625 1.303 1.463 1.822
0.00012 0.00083 0.00156 0.01559 0.02494 0.03430 0.03663 0.07638 0.08573 0.10677

1.880E-06 1.707E-06 1.696E-06 1.650E-06 1.584E-06 1.369E-06 1.323E-06 1.273E-06 1.190E-06 1.143E-06
2.460 2.540 3.777 4.295 4.495 4.654 5.213 6.809 7.008 7.128
0.14418 0.14886 0.22134 0.25173 0.26342 0.27277 0.30551 0.39903 0.41072 0.41773

1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.587E-07 8.302E-07 6.935E-07 6.887E-07
11.516 12.194 12.673 15.266 15.306 23.404 23.484 24.202 25.000 32.700
0.67492 0.71466 0.74272 0.89469 0.89703 1.37165 1.37633 1.41841 1.46517 1.91641

6.477E-07 5.752E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07 3.479E-07 3.265E-07
40.519 45.785 46.942 57.832 62.141 72.394 72.434 75.984 76.822 84.082
2.37467 2.68329 2.75109 3.38937 3.64188 4.24275 4.24509 4.45318 4.50228 4.92780

2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07 1.076E-07 9.605E-08 8.032E-08
86.955 92.939 94.774 95.532 96.290 96.529 97.327 97.447 97.766 97.846
5.09614 5.44684 5.55439 5.59881 5.64324 5.65726 5.70403 5.71104 5.72974 5.73442

6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08
97.886	98.245	99.003	99.641	99.801	100.000
5.73676	5.75780	5.80222	5.83963	5.84898	5.86067

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= HANDCHECK 0.086
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= HANDCHECK 0.674
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= HANDCHECK 1.375
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= HANDCHECK 2.372
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= HANDCHECK 3.386

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
10	1	-11.07050	-16.90070	-1.23413
10	2	-13.03054	-15.72313	-0.85862
10	3	-13.31455	-16.40962	-1.10335
10	4	-13.68351	-16.32097	-1.06747
10	5	-13.96783	-16.76611	-1.26940
10	6	-14.24977	-17.87074	-1.82664
10	7	-14.53378		

NUMXQ(K)= 7

2.511E-06	0.059	1.000
1.820E-06	0.176	3.000
1.563E-06	0.293	5.000
1.206E-06	0.586	10.000
1.030E-06	0.879	15.000
9.176E-07	1.172	20.000
8.323E-07	1.465	25.000
7.587E-07	1.758	30.000
7.003E-07	2.051	35.000
6.522E-07	2.344	40.000
5.968E-07	2.637	45.000
5.488E-07	2.930	50.000
5.081E-07	3.223	55.000
1.282E-06	0.5	8.53

ANNUAL AVERAGE = 2.11E-09

K= 10 FIVEXQ(K)= 1.282E-06 FIVEPR(K)= 8.531

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.479	3.112	4.269	16.648	49.642	97.527	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
											AT 131.4 METERS
CA=1292.SQ.METERS											
A	3.3	0.09	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	0.09	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.14	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	8.7	0.09	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
B	3.3	0.14	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.19	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.28	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.28	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.14	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
C	3.3	0.33	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.42	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.70	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.75	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
C	26.5	0.09	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.719E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.32	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	6.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	6.67	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.76	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.80	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.96	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	4.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.27	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.70	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.27	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	4.65	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	4.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	3.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.46	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.08     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.28     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.03     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.69     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.75     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.143E-06	2.366E-06	2.268E-06	2.243E-06	2.192E-06	1.897E-06	
0.003	0.019	0.037	0.460	0.601	0.789	0.883	1.963	2.292	2.574	
0.00017	0.00094	0.00185	0.02289	0.02990	0.03926	0.04393	0.09771	0.11407	0.12810	

1.880E-06	1.707E-06	1.696E-06	1.650E-06	1.584E-06	1.369E-06	1.323E-06	1.273E-06	1.190E-06	1.141E-06	
3.372	3.466	4.782	5.204	5.486	5.627	6.332	8.305	8.446	13.049	
0.16785	0.17252	0.23799	0.25903	0.27306	0.28007	0.31514	0.41334	0.42036	0.64948	

1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.587E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07	
13.566	14.271	17.230	17.277	23.290	23.384	24.135	24.934	31.604	31.745	
0.67520	0.71027	0.85757	0.85991	1.15917	1.16385	1.20126	1.24101	1.57301	1.58002	

6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.719E-07	
39.449	43.207	44.476	53.448	57.722	65.473	70.124	70.829	75.479	75.573	
1.96346	2.15050	2.21363	2.66019	2.87295	3.25873	3.49019	3.52526	3.75673	3.76140	

2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	1.076E-07	9.605E-08	8.032E-08	
80.505	87.974	91.075	92.343	93.799	94.034	95.115	95.162	95.209	95.302	
4.00690	4.37865	4.53296	4.59608	4.66856	4.68025	4.73403	4.73636	4.73870	4.74338	

```
   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.537      95.819      96.853      98.544      99.295      99.765
100.000
     4.75507     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

```
 CHI/Q =  1.556E-05      DISTANCE =   4000.000
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X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

```
 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.114
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.259
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.649
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.163
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.961
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.658

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.07050 -16.79218  -1.23284
 11  2     -13.03054 -16.42532  -1.11260
 11  3     -13.31455 -16.62656  -1.18458
 11  4     -13.68351 -16.96641  -1.32137
 11  5     -13.96783 -17.05118  -1.35872
 11  6     -14.24977 -18.82078  -2.21700
 11  7     -14.53378     NUMXQ(K)=  7
    2.950E-06              0.050              1.000
    2.002E-06              0.149              3.000
    1.674E-06              0.249              5.000
    1.275E-06              0.498             10.000
    1.068E-06              0.747             15.000
    9.286E-07              0.995             20.000
    8.293E-07              1.244             25.000
    7.527E-07              1.493             30.000
    6.922E-07              1.742             35.000
    6.396E-07              1.991             40.000
    5.737E-07              2.240             45.000
    5.196E-07              2.489             50.000

    1.272E-06              0.5               10.05
```

ANNUAL AVERAGE = 1.79E-09

K= 11 FIVEXQ(K)= 1.272E-06 FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.423	3.382	4.463	22.519	51.600	95.256
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED						
			AT 131.4 METERS								
CA=1292.SQ.METERS											
A	5.4	0.14	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.28	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.05	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
A	10.8	0.09	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	6.913E-07
A	26.5	0.05	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.812E-07
B	3.3	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.24	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.61	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.66	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.71	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07

C	26.5	0.09	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.28	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.13	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.77	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	4.19	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	4.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	6.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.94	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.56	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.69	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.22	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	5.46	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	8.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.71	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.85	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	3.62	90000.	0.	131.	1000.0

```
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       4.00     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       2.68     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       3.77     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.99     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07
   F       28.5       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.89     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.18     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       1.88     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       1.08     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.66     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
   G       11.6       0.09     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.009E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

ENE SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.143E-06	2.366E-06	2.243E-06	2.192E-06	1.897E-06	1.880E-06
0.002	0.019	0.038	0.320	0.367	0.461	0.885	1.026	1.261	2.156
0.00012	0.00097	0.00188	0.01591	0.01825	0.02292	0.04396	0.05098	0.06267	0.10709

1.696E-06	1.650E-06	1.584E-06	1.369E-06	1.323E-06	1.273E-06	1.190E-06	1.143E-06	1.141E-06	1.105E-06
3.285	3.473	3.803	3.944	4.603	6.250	6.862	7.144	11.380	12.086
0.16320	0.17256	0.18892	0.19594	0.22867	0.31050	0.34090	0.35492	0.56535	0.60042

1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.587E-07	8.302E-07	6.935E-07	6.913E-07	6.887E-07	6.684E-07
12.792	14.486	14.580	18.345	18.392	19.522	20.369	20.463	24.652	24.793
0.63549	0.71966	0.72433	0.91138	0.91371	0.96983	1.01191	1.01659	1.22467	1.23169

6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.897E-07	3.528E-07	3.479E-07	3.265E-07
30.017	34.865	36.559	42.018	48.560	55.572	55.619	58.631	59.573	66.962
1.49121	1.73202	1.81619	2.08741	2.41239	2.76076	2.76310	2.91273	2.95949	3.32656

2.812E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	1.076E-07
67.009	67.103	70.727	79.057	83.057	84.846	87.528	88.093	91.858	92.846
3.32890	3.33358	3.51361	3.92744	4.12617	4.21502	4.34828	4.37634	4.56338	4.61248

```
   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      93.317      93.411      93.788      94.164      94.211      95.105
96.282      98.165      99.247      99.906
     4.63586     4.64054     4.65924     4.67795     4.68028     4.72471
4.78316     4.87668     4.93045     4.96319

   1.009E-08
     100.000
     4.96786
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.001
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.163
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.600
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.969
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.490
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.758
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
12	1	-11.07050	-16.99141	-1.25333
12	2	-11.63677	-16.93831	-1.24090
12	3	-13.28753	-16.13902	-0.96922
12	4	-13.68351	-17.52317	-1.51557
12	5	-13.71559	-17.84390	-1.64323
12	6	-14.00160	-17.51004	-1.50045
12	7	-14.24977	-18.54808	-1.97818
12	8	-14.75472	NUMXQ(K)= 8	

2.619E-06	0.050	1.000
1.755E-06	0.149	3.000
1.491E-06	0.248	5.000
1.192E-06	0.497	10.000
9.735E-07	0.745	15.000
8.190E-07	0.994	20.000
7.211E-07	1.242	25.000
6.480E-07	1.490	30.000
5.736E-07	1.739	35.000

5.149E-07	1.987	40.000
4.673E-07	2.236	45.000
4.278E-07	2.484	50.000
3.944E-07	2.732	55.000
1.189E-06	0.5	10.06

ANNUAL AVERAGE = 1.77E-09

K= 12 FIVEXQ(K)= 1.189E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.612	3.671	5.130	26.515	53.437	92.988	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.03	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.06	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.39	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.42	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
A	10.8	0.30	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	6.913E-07
A	26.5	0.18	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.812E-07
B	2.2	0.03	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.09	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.39	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.63	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.33	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.21	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.48	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.69	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.33	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06

AT 131.4 METERS
CA=1292.SQ.METERS

C	8.7	1.44	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	8.302E-07			
C	10.8	0.87	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	6.684E-07			
C	26.5	0.48	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	2.719E-07			
D	0.2	0.00	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	0.24	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	0.54	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	0.90	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	2.66	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	3.26	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	4.01	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	4.25	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	9.30	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	6.31	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	3.71	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.02	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	0.90	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	0.72	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	1.26	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	3.05	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	3.59	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	5.77	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			
E	7.0	6.37	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	12.47	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	2.63	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	0.30	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			
F	0.3	0.01	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.813E-06			
F	1.2	0.42	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.024E-06			
F	1.8	0.48	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	6.935E-07			
F	2.4	0.66	90000.	0.	131.	1000.0	

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.29	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.63	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.83	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.84	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.81	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.670E-06	3.312E-06	3.143E-06	2.366E-06	2.243E-06	2.192E-06	1.897E-06	
0.002	0.019	0.030	0.060	0.299	0.389	0.479	1.017	1.077	1.466	
0.00015	0.00150	0.00235	0.00469	0.02339	0.03041	0.03742	0.07951	0.08418	0.11458	

1.880E-06	1.707E-06	1.696E-06	1.650E-06	1.584E-06	1.369E-06	1.323E-06	1.273E-06	1.190E-06	1.143E-06	
2.363	2.393	3.291	3.769	4.068	4.128	4.816	5.534	6.162	6.551	
0.18472	0.18706	0.25720	0.29460	0.31799	0.32266	0.37644	0.43255	0.48165	0.51204	

1.141E-06	1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.587E-07	8.302E-07	6.935E-07	6.913E-07	
9.213	9.542	9.961	11.218	11.547	14.807	15.226	16.662	17.140	17.440	
0.72013	0.74585	0.77858	0.87678	0.90249	1.15734	1.19007	1.30230	1.33971	1.36309	

6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.897E-07	3.528E-07	
21.448	22.315	25.367	29.614	30.272	33.862	43.165	48.938	49.148	50.434	
1.67638	1.74418	1.98266	2.31466	2.36610	2.64667	3.37379	3.82503	3.84140	3.94194	

3.479E-07	3.265E-07	2.812E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	
56.746	63.117	63.297	63.775	66.407	78.881	81.424	84.056	86.599	90.308	
4.43526	4.93326	4.94729	4.98470	5.19044	6.16540	6.36414	6.56988	6.76862	7.05853	

```
   1.336E-07   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08
4.375E-08   3.310E-08   2.491E-08   1.998E-08
      94.137      94.825      95.064      95.363      95.513      95.722
95.752      96.500      97.338      98.145
     7.35780     7.41158     7.43028     7.45366     7.46535     7.48172
7.48405     7.54251     7.60797     7.67110

   1.668E-08   1.253E-08   1.009E-08
      99.252      99.970     100.000
     7.75760     7.81372     7.81606
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.185
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.719
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.301
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.981
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.930
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
13	1	-11.07050	-16.44367	-1.15172
13	2	-11.63677	-16.72185	-1.21837
13	3	-13.18433	-15.71527	-0.87169
13	4	-13.31455	-16.62873	-1.20336
13	5	-13.68351	-17.19801	-1.43596
13	6	-14.00160	-17.28616	-1.47556
13	7	-14.24977	-17.72136	-1.68705
13	8	-14.93482	NUMXQ(K)= 8	

2.579E-06	0.078	1.000
1.760E-06	0.234	3.000
1.474E-06	0.391	5.000
1.094E-06	0.782	10.000
8.799E-07	1.172	15.000
7.467E-07	1.563	20.000
6.535E-07	1.954	25.000
5.755E-07	2.345	30.000
5.148E-07	2.736	35.000

4.663E-07	3.126	40.000
4.265E-07	3.517	45.000
3.932E-07	3.908	50.000
3.648E-07	4.299	55.000
3.402E-07	4.690	60.000
1.332E-06	0.5	6.40

ANNUAL AVERAGE = 4.14E-09

K= 13 FIVEXQ(K)= 1.332E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.376	5.713	7.777	22.895	58.074	95.154
100.000					

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SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.

STABILITY CLASS	WINDSPEED METER/SEC	FREQUENCY PERCENT	DISTANCE METERS	TERRAIN HT METERS	EFF PLUME HT METERS	SIGMA-Y METERS	SIGMA-Z METERS	MEANDER-SY METERS	** CHI/Q VALUES (SEC/CUBIC METER) MEANDER	BLDG WAKE	USED
					AT 131.4 METERS						
CA=1292.SQ.METERS											
A	4.4	0.08	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.08	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.19	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.13	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
A	10.8	0.05	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	6.913E-07
A	26.5	0.13	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.812E-07
B	3.3	0.03	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.05	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.21	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.40	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.32	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.27	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.897E-07
C	3.3	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.21	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.72	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.89	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	1.58	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	4.29	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.26	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	14.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	6.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.46	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.62	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.20	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.11	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	4.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.23	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	11.84	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	3.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.35	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.40	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.05	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	2.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.62	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.59	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.70	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.54	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.143E-06	2.366E-06	2.243E-06	2.192E-06	1.897E-06	1.880E-06	
0.004	0.013	0.022	0.532	0.559	0.693	1.203	1.257	1.310	1.767	
0.00037	0.00113	0.00192	0.04634	0.04868	0.06037	0.10479	0.10947	0.11414	0.15389	

1.707E-06	1.696E-06	1.650E-06	1.584E-06	1.369E-06	1.323E-06	1.273E-06	1.190E-06	1.143E-06	1.141E-06	
1.847	2.357	2.518	2.733	2.813	3.162	3.672	4.075	4.263	5.846	
0.16091	0.20533	0.21936	0.23806	0.24507	0.27547	0.31989	0.35496	0.37133	0.50927	

1.105E-06	1.024E-06	9.624E-07	9.582E-07	8.590E-07	8.587E-07	8.302E-07	6.935E-07	6.913E-07	6.887E-07	
6.410	6.759	7.376	7.698	10.785	10.919	12.127	12.529	12.583	16.877	
0.55837	0.58877	0.64254	0.67060	0.93947	0.95116	1.05637	1.09144	1.09612	1.47020	

6.684E-07	6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.897E-07	3.528E-07	3.479E-07	
17.602	19.803	25.063	25.547	28.660	43.234	47.555	47.824	48.870	59.392	
1.53333	1.72505	2.18330	2.22539	2.49660	3.76615	4.14258	4.16596	4.25714	5.17365	

3.265E-07	2.812E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	
65.618	65.753	66.638	67.953	79.790	81.776	85.104	86.580	92.673	95.464	
5.71607	5.72776	5.80492	5.91948	6.95055	7.12357	7.41348	7.54208	8.07281	8.31596	

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   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.081      96.296      96.618      96.779      96.994      97.584
98.282      98.819      99.087      99.946
     8.36974     8.38844     8.41650     8.43053     8.44923     8.50067
8.56146     8.60822     8.63160     8.70642

   1.009E-08
     100.000
     8.71109

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.046
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.219
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.558
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.055
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.763
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   5.712

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1     -11.07050 -16.99068  -1.32021
 14  2     -12.61806 -17.60224  -1.50485
 14  3     -13.31455 -16.98377  -1.28779
 14  4     -13.71559 -16.84849  -1.23448
 14  5     -14.00160 -16.85765  -1.23845
 14  6     -14.65458 -17.15354  -1.40479
 14  7     -14.93482     NUMXQ(K)=  7
    2.523E-06              0.087              1.000
    1.535E-06              0.261              3.000
    1.234E-06              0.436              5.000
    9.073E-07              0.871             10.000
    7.505E-07              1.307             15.000
    6.516E-07              1.742             20.000
    5.816E-07              2.178             25.000
    5.284E-07              2.613             30.000
    4.862E-07              3.049             35.000
    4.515E-07              3.484             40.000
```

4.211E-07	3.920	45.000
3.929E-07	4.356	50.000
3.687E-07	4.791	55.000
3.474E-07	5.227	60.000
3.287E-07	5.662	65.000
1.161E-06	0.5	5.74

ANNUAL AVERAGE = 2.78E-09

K= 14 FIVEXQ(K)= 1.161E-06 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.671	4.616	6.039	16.516	63.462	96.403
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	** CHI/Q VALUES (SEC/CUBIC METER)
A	6.5	0.06	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00 1.143E-06
A	8.7	0.04	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00 8.587E-07
A	26.5	0.02	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00 2.812E-07
B	2.2	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00 4.670E-06
B	3.3	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00 3.143E-06
B	4.4	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00 2.366E-06
B	5.4	0.02	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00 1.897E-06
B	6.5	0.06	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00 1.584E-06
B	8.7	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00 1.190E-06
B	10.8	0.11	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00 9.582E-07
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00 2.192E-06
C	4.4	0.17	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00 1.650E-06
C	5.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00 1.323E-06
C	6.5	0.38	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00 1.105E-06
C	8.7	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00 8.302E-07
C	10.8	0.47	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00 6.684E-07
C	26.5	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00 2.719E-07
D	0.2	0.00	4000.	0.	131.	263.4				

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.17	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	5.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	7.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	17.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.45	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	5.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.30     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G        1.2       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.94     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.88     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.36     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.11     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.670E-06 3.312E-06 3.143E-06 2.366E-06 2.243E-06 2.192E-06 1.897E-06
0.001 0.011 0.018 0.039 0.210 0.253 0.274 0.873 0.937 0.958
0.00015 0.00118 0.00198 0.00431 0.02302 0.02769 0.03003 0.09550 0.10251 0.10485

1.880E-06 1.696E-06 1.650E-06 1.584E-06 1.323E-06 1.273E-06 1.190E-06 1.143E-06 1.141E-06 1.105E-06
1.450 2.304 2.475 2.540 2.732 3.074 3.202 3.266 5.787 6.172
0.15862 0.25215 0.27085 0.27786 0.29891 0.33632 0.35034 0.35736 0.63325 0.67533

1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.587E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07 6.477E-07
6.450 7.091 7.198 11.172 11.215 11.771 12.048 17.070 17.540 19.933
0.70572 0.77587 0.78756 1.22243 1.22711 1.28789 1.31829 1.86773 1.91916 2.18102

5.752E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.812E-07 2.719E-07
27.028 27.412 30.703 48.246 53.695 54.977 65.426 71.345 71.367 71.623
2.95725 2.99933 3.35939 5.27892 5.87511 6.01540 7.15869 7.80633 7.80867 7.83672

2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07 9.605E-08 8.032E-08 6.505E-08
73.097 83.632 85.491 87.649 89.081 94.551 95.855 96.004 96.218 96.346
7.99805 9.15070 9.35411 9.59025 9.74690 10.34543 10.48805 10.50442 10.52780 10.54183

4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08	1.253E-08
96.581	97.521	98.654	99.530	99.893	100.000
10.56755	10.67042	10.79434	10.89019	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.102
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 0.271
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 0.633
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 1.226
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 5.275
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= 7.803

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.07050	-16.84998	-1.23881
15	2	-13.03054	-15.87551	-0.92275
15	3	-13.28753	-16.56140	-1.16730
15	4	-13.31455	-16.87771	-1.28103
15	5	-13.68351	-16.58315	-1.16289
15	6	-13.96783	-16.41845	-1.08966
15	7	-14.65458	-16.91984	-1.39940
15	8	-14.93482		

NUMXQ(K)= 8

2.153E-06	0.109	1.000
1.522E-06	0.328	3.000
1.219E-06	0.547	5.000
9.036E-07	1.094	10.000
7.581E-07	1.641	15.000
6.667E-07	2.188	20.000
6.011E-07	2.735	25.000
5.507E-07	3.282	30.000
5.102E-07	3.830	35.000
4.767E-07	4.377	40.000
4.484E-07	4.924	45.000
4.216E-07	5.471	50.000
3.945E-07	6.018	55.000
3.708E-07	6.565	60.000
3.498E-07	7.112	65.000
3.312E-07	7.659	70.000

1.269E-06 0.5 4.57

ANNUAL AVERAGE = 1.29E-09

K= 15 FIVEXQ(K)= 1.269E-06 FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.128	2.222	2.628	10.926	64.626	96.068	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.02	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06	
A	5.4	0.11	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06	
A	6.5	0.09	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06	
A	8.7	0.30	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07	
A	10.8	0.02	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	6.913E-07	
A	26.5	0.02	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.812E-07	
B	3.3	0.06	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06	
B	4.4	0.15	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06	
B	5.4	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06	
B	6.5	0.32	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06	
B	8.7	0.43	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06	
B	10.8	0.13	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07	
C	2.2	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06	
C	3.3	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06	
C	4.4	0.76	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06	
C	5.4	0.97	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06	
C	6.5	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06	
C	8.7	1.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07	

AT 131.4 METERS
CA=1292.SQ.METERS

C	10.8	0.30	2000.	0.	131.	200.0		
114.9	0.0	0.000E+00	0.000E+00	6.684E-07				
C	26.5	0.09	2000.	0.	131.	200.0		
114.9	0.0	0.000E+00	0.000E+00	2.719E-07				
D	0.2	0.00	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.556E-05				
D	1.1	0.22	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.312E-06				
D	1.7	0.86	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	2.243E-06				
D	2.2	1.08	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.696E-06				
D	3.3	4.99	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.141E-06				
D	4.4	8.43	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	8.590E-07				
D	5.4	9.47	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	6.887E-07				
D	6.5	8.78	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	5.752E-07				
D	8.7	15.00	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	4.321E-07				
D	10.8	4.97	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.479E-07				
D	26.5	2.03	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.415E-07				
E	0.3	0.00	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.835E-06				
E	1.2	0.24	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.880E-06				
E	1.8	0.50	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.273E-06				
E	2.4	0.78	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	9.624E-07				
E	3.5	2.49	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	6.477E-07				
E	4.7	4.32	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	4.876E-07				
E	5.9	4.60	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.909E-07				
E	7.0	5.97	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.265E-07				
E	9.3	7.26	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	2.453E-07				
E	11.6	1.04	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.975E-07				
E	28.5	0.30	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.032E-08				
F	0.3	0.00	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	4.813E-06				
F	1.2	0.15	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	1.024E-06				
F	1.8	0.32	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	6.935E-07				
F	2.4	0.43	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	5.243E-07				
F	3.5	1.28	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.41	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.22	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.73	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.63	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 750.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 3.257E-06 3.143E-06 2.366E-06 2.268E-06 2.243E-06 2.192E-06
0.002 0.006 0.010 0.226 0.248 0.313 0.464 0.486 1.350 1.696
0.00019 0.00069 0.00111 0.02449 0.02683 0.03384 0.05021 0.05255 0.14607 0.18348

1.897E-06 1.880E-06 1.696E-06 1.650E-06 1.584E-06 1.369E-06 1.323E-06 1.273E-06 1.190E-06 1.143E-06
1.956 2.193 3.274 4.031 4.355 4.463 5.436 5.933 6.365 6.451
0.21153 0.23725 0.35415 0.43599 0.47106 0.48275 0.58796 0.64173 0.68849 0.69785

1.141E-06 1.105E-06 1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.587E-07 8.302E-07 6.935E-07 6.913E-07
11.444 12.374 12.525 13.303 13.433 21.863 22.165 23.765 24.089 24.111
1.23793 1.33847 1.35483 1.43900 1.45303 2.36486 2.39760 2.57061 2.60568 2.60802

6.887E-07 6.684E-07 6.477E-07 5.752E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.528E-07 3.479E-07
33.578 33.881 36.366 45.142 45.574 49.897 64.898 69.502 70.777 75.748
3.63208 3.66481 3.93368 4.88292 4.92968 5.39729 7.01989 7.51789 7.65583 8.19358

3.265E-07 2.812E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07
81.714 81.736 81.822 82.968 90.230 91.462 92.500 93.516 95.547 95.958
8.83888 8.84121 8.85056 8.97448 9.76006 9.89333 10.00555 10.11544 10.33522 10.37964

```
   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.066      96.282      96.585      96.779      97.039      97.774
99.114      99.741      99.914     100.000
    10.39133    10.41471    10.44744    10.46848    10.49654    10.57603
10.72099    10.78879    10.80750    10.81685

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.183
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.435
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.337
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.395
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.568
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.629
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   4.879

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 16  1     -11.07050 -16.35385  -1.14376
 16  2     -13.03054 -15.95331  -1.00591
 16  3     -13.31455 -15.87739  -0.97697
 16  4     -13.68351 -16.06218  -1.05926
 16  5     -13.71559 -16.07262  -1.06398
 16  6     -13.96783 -16.21148  -1.13417
 16  7     -14.00160 -16.38152  -1.22144
 16  8     -14.18845 -16.51821  -1.29757
 16  9     -14.36856     NUMXQ(K)=  9
    2.637E-06              0.108              1.000
    1.823E-06              0.325              3.000
    1.535E-06              0.541              5.000
    1.200E-06              1.082             10.000
    1.019E-06              1.623             15.000
    8.992E-07              2.163             20.000
    8.083E-07              2.704             25.000
    7.329E-07              3.245             30.000
    6.719E-07              3.786             35.000
    6.199E-07              4.327             40.000
```

5.763E-07 4.868 45.000

1.576E-06 0.5 4.62

ANNUAL AVERAGE = 4.34E-09

K= 16 FIVEXQ(K)= 1.576E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01 5.200E-01 4.072E-01 3.613E-01 2.419E-01 2.081E-01
1.693E-02
0.562 5.577 6.938 13.038 68.870 96.369
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.01	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	4.457E-06
A	2.2	0.09	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	3.369E-06
A	3.3	0.31	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.268E-06
A	4.4	0.33	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.707E-06
A	5.4	0.22	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.369E-06
A	6.5	0.18	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	1.143E-06
A	8.7	0.20	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	8.587E-07
A	10.8	0.05	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	6.913E-07
A	26.5	0.04	750.	0.	131.	144.4	260.5	0.0	0.000E+00	0.000E+00	2.812E-07
B	1.1	0.00	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.121E-06
B	1.7	0.04	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	6.177E-06
B	2.2	0.12	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	4.670E-06
B	3.3	0.29	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	3.143E-06
B	4.4	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	2.366E-06
B	5.4	0.26	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.897E-06
B	6.5	0.22	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.584E-06
B	8.7	0.30	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	1.190E-06
B	10.8	0.12	900.	0.	131.	128.1	98.0	0.0	0.000E+00	0.000E+00	9.582E-07
B	26.5	0.05	900.	0.	131.	128.1					

98.0	0.0	0.000E+00	0.000E+00	3.897E-07			
C	1.1	0.01	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	6.362E-06			
C	1.7	0.07	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	4.309E-06			
C	2.2	0.21	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	3.257E-06			
C	3.3	0.42	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	2.192E-06			
C	4.4	0.56	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	1.650E-06			
C	5.4	0.63	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	1.323E-06			
C	6.5	0.52	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	1.105E-06			
C	8.7	0.79	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	8.302E-07			
C	10.8	0.27	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	6.684E-07			
C	26.5	0.17	2000.	0.	131.	200.0	
114.9	0.0	0.000E+00	0.000E+00	2.719E-07			
D	0.2	0.00	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	0.57	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	1.50	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	2.03	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	5.42	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	7.33	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	7.08	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	6.11	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	9.08	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	3.90	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	1.98	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.01	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	0.73	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	1.24	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	1.88	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	5.25	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	6.52	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	6.35	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			

E	7.0	5.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	6.91	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.44	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	1.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.18	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.25	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.69	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.01	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 750.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 9.121E-06 8.835E-06 6.362E-06 6.177E-06 4.813E-06 4.670E-06 4.457E-06 4.309E-06 3.369E-06
0.005 0.009 0.023 0.035 0.077 0.089 0.206 0.213 0.278 0.372
0.00468 0.00935 0.02338 0.03507 0.07716 0.08885 0.20575 0.21276 0.27823 0.37175

3.312E-06 3.257E-06 3.143E-06 2.366E-06 2.268E-06 2.243E-06 2.192E-06 1.897E-06 1.880E-06 1.707E-06
0.940 1.150 1.443 1.707 2.020 3.523 3.942 4.199 4.931 5.258
0.93989 1.15031 1.44257 1.70676 2.02006 3.52342 3.94192 4.19911 4.93091 5.25824

1.696E-06 1.650E-06 1.584E-06 1.369E-06 1.323E-06 1.273E-06 1.190E-06 1.143E-06 1.141E-06 1.105E-06
7.290 7.846 8.064 8.281 8.908 10.147 10.444 10.622 16.046 16.570
7.28999 7.84644 8.06388 8.28131 8.90790 10.14706 10.44399 10.62168 16.04592 16.56964

1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.587E-07 8.302E-07 6.935E-07 6.913E-07 6.887E-07 6.684E-07
17.019 18.903 19.022 26.347 26.544 27.334 27.897 27.944 35.026 35.300
17.01854 18.90300 19.02224 26.34729 26.54369 27.33394 27.89741 27.94417 35.02607 35.29961

6.477E-07 5.752E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07 3.479E-07 3.265E-07
40.551 46.658 47.495 54.013 63.096 69.444 69.493 71.282 75.182 80.358
40.55083 46.65778 47.49479 54.01323 63.09649 69.44424 69.49334 71.28194 75.18178 80.35818

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   2.812E-07   2.719E-07   2.656E-07   2.453E-07   2.130E-07   1.975E-07
1.779E-07   1.415E-07   1.336E-07   1.076E-07
      80.396      80.569      82.441      89.353      90.919      92.359
93.397      95.373      96.477      96.657
    80.39558    80.56860    82.44136    89.35258    90.91907    92.35930
93.39738    95.37302    96.47659    96.65662

   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.904      97.164      97.351      97.613      97.629      98.347
99.039      99.518      99.785      99.988
    96.90445    97.16397    97.35101    97.61287    97.62923    98.34701
99.03906    99.51836    99.78489    99.98830

   1.009E-08
     100.000
    99.99998

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                            HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.278
    3.390E-06              1.000              1.000
    2.436E-06              3.000              3.000
    2.000E-06              5.000              5.000
    1.468E-06             10.000             10.000
    1.186E-06             15.000             15.000
    1.015E-06             20.000             20.000
    8.912E-07             25.000             25.000
    7.971E-07             30.000             30.000
    7.204E-07             35.000             35.000
    6.545E-07             40.000             40.000
    6.033E-07             45.000             45.000
    5.577E-07             50.000             50.000
    5.156E-07             55.000             55.000
    4.760E-07             60.000             60.000
    4.382E-07             65.000             65.000
    4.016E-07             70.000             70.000
    3.655E-07             75.000             75.000
    3.291E-07             80.000             80.000

    2.000E-06              5.0                5.00

K= 17     FIVEXQ(K)= 2.000E-06     FIVEPR(K)= 5.000
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FUMIGATION X/Q AT THE BOUNDARY: 5.32E-05

EXPONENTIAL TERM AND FREQUENCIES

8.805E-01	5.200E-01	4.072E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.417	5.067	6.727	16.153	61.158	96.932
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 9.121E-06 8.835E-06 6.362E-06 6.177E-06 4.813E-06 4.670E-06 4.457E-06 4.309E-06 3.369E-06
0.005 0.009 0.023 0.035 0.077 0.089 0.206 0.213 0.278 0.372
0.00468 0.00935 0.02338 0.03507 0.07716 0.08885 0.20575 0.21276 0.27823 0.37175

3.312E-06 3.257E-06 3.143E-06 2.366E-06 2.268E-06 2.243E-06 2.192E-06 1.897E-06 1.880E-06 1.707E-06
0.940 1.150 1.443 1.707 2.020 3.523 3.942 4.199 4.931 5.258
0.93989 1.15031 1.44257 1.70676 2.02006 3.52342 3.94192 4.19911 4.93091 5.25823

1.696E-06 1.650E-06 1.584E-06 1.369E-06 1.323E-06 1.273E-06 1.190E-06 1.143E-06 1.141E-06 1.105E-06
7.290 7.846 8.064 8.281 8.908 10.147 10.444 10.622 16.046 16.570
7.28998 7.84644 8.06387 8.28131 8.90790 10.14706 10.44399 10.62168 16.04592 16.56964

1.024E-06 9.624E-07 9.582E-07 8.590E-07 8.587E-07 8.302E-07 6.935E-07 6.913E-07 6.887E-07 6.684E-07
17.019 18.903 19.022 26.347 26.544 27.334 27.897 27.944 35.026 35.300
17.01854 18.90300 19.02224 26.34729 26.54369 27.33395 27.89741 27.94418 35.02608 35.29964

6.477E-07 5.752E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.897E-07 3.528E-07 3.479E-07 3.265E-07
40.551 46.658 47.495 54.013 63.096 69.444 69.493 71.282 75.182 80.358
40.55086 46.65780 47.49482 54.01326 63.09651 69.44427 69.49335 71.28197 75.18182 80.35823

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   2.812E-07   2.719E-07   2.656E-07   2.453E-07   2.130E-07   1.975E-07
1.779E-07   1.415E-07   1.336E-07   1.076E-07
      80.396      80.569      82.441      89.353      90.919      92.359
93.397      95.373      96.477      96.657
    80.39562    80.56863    82.44139    89.35263    90.91911    92.35935
93.39744    95.37307    96.47662    96.65663

   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.904      97.164      97.351      97.613      97.629      98.347
99.039      99.518      99.785      99.988
    96.90448    97.16399    97.35103    97.61289    97.62925    98.34703
99.03909    99.51837    99.78491    99.98830

   1.009E-08
     100.000
    99.99999

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.278

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1     -11.07050 -15.49489  -1.13246
 18  2     -12.35483 -13.84557  -0.53764
 18  3     -12.67032 -14.49869  -0.83641
 18  4     -13.31455 -14.54885  -0.87184
 18  5     -13.68351 -14.45414  -0.77642
 18  6     -13.96783 -14.42340  -0.72734
 18  7     -14.24977 -14.39938  -0.62674
 18  8     -14.93482     NUMXQ(K)=  8
    3.390E-06              1.000              1.000
    2.436E-06              3.000              3.000
    2.000E-06              5.000              5.000
    1.468E-06             10.000             10.000
    1.186E-06             15.000             15.000
    1.015E-06             20.000             20.000
    8.912E-07             25.000             25.000
    7.971E-07             30.000             30.000
    7.204E-07             35.000             35.000
    6.545E-07             40.000             40.000
    6.033E-07             45.000             45.000
    5.577E-07             50.000             50.000
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5.156E-07	55.000	55.000
4.760E-07	60.000	60.000
4.382E-07	65.000	65.000
4.016E-07	70.000	70.000
3.655E-07	75.000	75.000
3.291E-07	80.000	80.000
2.000E-06	5.0	5.00

K= 18 FIVEXQ(K)= 2.000E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-2.97183	0.14802	6.22377
2	-1.95734	2.51539	3.53187
3	-2.74984	0.29813	3.10925
4	-2.67456	0.37414	3.53945
5	-2.57624	0.49942	4.77421
6	-2.75610	0.29248	4.27580
7	-3.04511	0.11630	5.37250
8	-3.20546	0.06743	5.06821
9	-3.13102	0.08711	10.01358
10	-3.27288	0.05323	5.86067
11	-3.18829	0.07157	4.97718
12	-3.28532	0.05094	4.96786
13	-3.16842	0.07664	7.81606
14	-3.15028	0.08156	8.71109
15	-3.21957	0.06420	10.94163
16	-3.05334	0.11316	10.81685

K	HOURS(K)	TOTHRS
1	12.96674	12.96674
2	220.34790	233.31470
3	26.11623	259.43090
4	32.77452	292.20540
5	43.74879	335.95420
6	25.62125	361.57550
7	10.18793	371.76340
8	5.90693	377.67030
9	7.63051	385.30080
10	4.66320	389.96400
11	6.26930	396.23330
12	4.46218	400.69550
13	6.71363	407.40910
14	7.14492	414.55400
15	5.62393	420.17800
16	9.91276	430.09070

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.663E-06	2.655E-09	-0.7680	-12.7748			
					1	8.0	-14.37177
					2	16.0	-14.90410
					3	72.0	-16.05921
					4	624.0	-17.71766
2	1.658E-06	5.089E-09	-0.6901	-12.8317			
					1	8.0	-14.26660
					2	16.0	-14.74491
					3	72.0	-15.78281
					4	624.0	-17.27298
3	2.073E-06	6.478E-09	-0.6879	-12.6096			
					1	8.0	-14.04011

					2	16.0	-14.51695
					3	72.0	-15.55166
					4	624.0	-17.03724
4	2.321E-06	1.014E-08	-0.6480	-12.5244			
					1	8.0	-13.87183
					2	16.0	-14.32097
					3	72.0	-15.29557
					4	624.0	-16.69484
5	2.596E-06	1.692E-08	-0.6003	-12.4455			
					1	8.0	-13.69370
					2	16.0	-14.10977
					3	72.0	-15.01263
					4	624.0	-16.30892
6	2.202E-06	9.900E-09	-0.6445	-12.5794			
					1	8.0	-13.91972
					2	16.0	-14.36648
					3	72.0	-15.33592
					4	624.0	-16.72780
7	1.622E-06	4.621E-09	-0.6990	-12.8471			
					1	8.0	-14.30062
					2	16.0	-14.78511
					3	72.0	-15.83642
					4	624.0	-17.34583
8	1.365E-06	1.297E-09	-0.8300	-12.9288			
					1	8.0	-14.65462
					2	16.0	-15.22991
					3	72.0	-16.47824
					4	624.0	-18.27055
9	1.506E-06	3.808E-09	-0.7132	-12.9118			
					1	8.0	-14.39478
					2	16.0	-14.88912
					3	72.0	-15.96181
					4	624.0	-17.50192
10	1.282E-06	2.113E-09	-0.7642	-13.0374			
					1	8.0	-14.62654
					2	16.0	-15.15623
					3	72.0	-16.30564
					4	624.0	-17.95590
11	1.272E-06	1.792E-09	-0.7830	-13.0321			
					1	8.0	-14.66022
					2	16.0	-15.20293
					3	72.0	-16.38056
					4	624.0	-18.07134
12	1.189E-06	1.771E-09	-0.7764	-13.1039			
					1	8.0	-14.71834
					2	16.0	-15.25647
					3	72.0	-16.42418
					4	624.0	-18.10073
13	1.332E-06	4.143E-09	-0.6885	-13.0513			
					1	8.0	-14.48306
					2	16.0	-14.96031
					3	72.0	-15.99589
					4	624.0	-17.48273
14	1.161E-06	2.782E-09	-0.7196	-13.1673			
					1	8.0	-14.66369
					2	16.0	-15.16247
					3	72.0	-16.24479
					4	624.0	-17.79874
15	1.269E-06	1.290E-09	-0.8218	-13.0079			
					1	8.0	-14.71675

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                                                2   16.0   -15.28639
                                                3   72.0   -16.52245
                                                4  624.0   -18.29713
16 1.576E-06 4.336E-09   -0.7031  -12.8731
                                                1    8.0   -14.33524
                                                2   16.0   -14.82262
                                                3   72.0   -15.88020
                                                4  624.0   -17.39863
17 2.000E-06 1.692E-08   -0.5691  -12.7281
                                                1    8.0   -13.91160
                                                2   16.0   -14.30610
                                                3   72.0   -15.16213
                                                4  624.0   -16.39118
18 2.000E-06 1.692E-08   -0.5691  -12.7281
                                                1    8.0   -13.91160
                                                2   16.0   -14.30610
                                                3   72.0   -15.16213
                                                4  624.0   -16.39118
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

0-2 HR X/Q IS

SECTOR	DOWNWIND DISTANCE EXCEEDED (METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS	1-4 DAYS	4-30 DAYS
		ANNUAL AVERAGE	IN SECTOR	SECTOR		
S	750.	1.66E-06	5.73E-07	3.37E-07	1.06E-07	2.02E-08
		2.66E-09	13.0	S		
SSW	750.	1.66E-06	6.37E-07	3.95E-07	1.40E-07	3.15E-08
		5.09E-09	220.3	SSW		
SW	750.	2.07E-06	7.99E-07	4.96E-07	1.76E-07	3.99E-08
		6.48E-09	26.1	SW		
WSW	750.	2.32E-06	9.45E-07	6.03E-07	2.28E-07	5.62E-08
		1.01E-08	32.8	WSW		
W	750.	2.60E-06	1.13E-06	7.45E-07	3.02E-07	8.26E-08
		1.69E-08	43.7	W		
WNW	750.	2.20E-06	9.01E-07	5.76E-07	2.19E-07	5.44E-08
		9.90E-09	25.6	WNW		
NW	750.	1.62E-06	6.16E-07	3.79E-07	1.33E-07	2.93E-08
		4.62E-09	10.2	NW		
NNW	750.	1.37E-06	4.32E-07	2.43E-07	6.98E-08	1.16E-08
		1.30E-09	5.9	NNW		
N	750.	1.51E-06	5.60E-07	3.42E-07	1.17E-07	2.51E-08
		3.81E-09	7.6	N		
NNE	750.	1.28E-06	4.44E-07	2.62E-07	8.29E-08	1.59E-08
		2.11E-09	4.7	NNE		
NE	750.	1.27E-06	4.30E-07	2.50E-07	7.69E-08	1.42E-08
		1.79E-09	6.3	NE		
ENE	750.	1.19E-06	4.05E-07	2.37E-07	7.36E-08	1.38E-08
		1.77E-09	4.5	ENE		
E	750.	1.33E-06	5.13E-07	3.18E-07	1.13E-07	2.55E-08
		4.14E-09	6.7	E		
ESE	750.	1.16E-06	4.28E-07	2.60E-07	8.81E-08	1.86E-08
		2.78E-09	7.1	ESE		
SE	750.	1.27E-06	4.06E-07	2.30E-07	6.67E-08	1.13E-08
		1.29E-09	5.6	SE		
SSE	750.	1.58E-06	5.95E-07	3.65E-07	1.27E-07	2.78E-08
		4.34E-09	9.9	SSE		
MAX X/Q		2.60E-06				
TOTAL HOURS AROUND SITE:		430.1				
SRP 2.3.4	750.	2.00E-06	9.08E-07	6.12E-07		

2.60E-07	7.61E-08	1.69E-08		
SITE LIMIT		2.00E-06	9.08E-07	6.12E-07
2.60E-07	7.61E-08	1.69E-08		

0.5 PERCENT X/Q TO AN INDIVIDUAL IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

SECTOR	DOWNWIND DISTANCE (METERS)	FUMIGATION X/Q
S	750.	5.32E-05
SSW	750.	5.32E-05
SW	750.	5.32E-05
WSW	750.	5.32E-05
W	750.	5.32E-05
WNW	750.	5.32E-05
NW	750.	5.32E-05
NNW	750.	5.32E-05
N	750.	5.32E-05
NNE	750.	5.32E-05
NE	750.	5.32E-05
ENE	750.	5.32E-05
E	750.	5.32E-05
ESE	750.	5.32E-05
SE	750.	5.32E-05
SSE	750.	5.32E-05

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY.
CHECK THE REASONABLENESS OF THE ENVELOPES
COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY
FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.19	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	1.102E-06								
A	4.4	0.04	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	8.296E-07								
A	8.7	0.08	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	4.173E-07								
A	10.8	0.04	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	3.360E-07								
A	26.5	0.04	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	1.367E-07								
B	2.2	0.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	4.557E-06								
B	3.3	0.45	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	3.067E-06								
B	4.4	0.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	2.308E-06								
B	5.4	0.08	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.851E-06								
B	6.5	0.11	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.546E-06								
B	8.7	0.30	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.161E-06								
B	10.8	0.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	9.350E-07								
C	2.2	0.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	3.257E-06								
C	3.3	0.68	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.192E-06								
C	4.4	0.98	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.650E-06								
C	5.4	0.79	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.323E-06								
C	6.5	0.30	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.105E-06								
C	8.7	0.53	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	8.302E-07								

C	10.8	0.15	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.04	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	7.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.11	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	8.90	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	8.75	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	10.44	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	2.59	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.94	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.15	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	3.83	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.13	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.90	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.30	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.99	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.33	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.09	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.08	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	28.5	0.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.31	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.64	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	9.3	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.557E-06	3.312E-06	3.257E-06	3.067E-06	2.308E-06	2.243E-06	2.192E-06		
0.006	0.021	0.036	0.074	0.750	0.900	1.351	1.389	2.929	3.605		
0.00035	0.00129	0.00226	0.00460	0.04668	0.05604	0.08409	0.08643	0.18229	0.22437		
1.880E-06	1.851E-06	1.696E-06	1.650E-06	1.546E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06		
4.394	4.469	6.986	7.963	8.076	8.864	10.329	10.630	18.481	18.782		
0.27347	0.27815	0.43480	0.49559	0.50260	0.55170	0.64288	0.66159	1.15024	1.16894		
1.102E-06	1.024E-06	9.624E-07	9.350E-07	8.590E-07	8.302E-07	8.296E-07	6.935E-07	6.887E-07	6.684E-07		
18.970	19.571	21.449	21.487	29.601	30.127	30.164	30.540	39.443	39.594		
1.18063	1.21804	1.33494	1.33728	1.84229	1.87503	1.87736	1.90074	2.45486	2.46421		
6.477E-07	5.752E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07	3.909E-07	3.528E-07	3.479E-07	3.360E-07		
44.740	53.493	54.470	61.119	71.562	71.638	78.399	80.390	82.983	83.020		
2.78452	3.32928	3.39007	3.80390	4.45388	4.45855	4.87940	5.00331	5.16464	5.16698		
3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.367E-07	1.336E-07		
86.852	86.889	89.219	93.351	94.440	95.342	95.793	96.732	96.769	96.844		
5.40546	5.40779	5.55275	5.80994	5.87774	5.93385	5.96191	6.02036	6.02270	6.02737		

9.605E-08 8.032E-08 6.505E-08 4.918E-08 4.375E-08 3.310E-08
2.491E-08 1.998E-08 1.253E-08
97.107 97.408 97.558 97.708 97.746 99.061
99.700 99.962 100.000
6.04374 6.06244 6.07180 6.08115 6.08349 6.16532
6.20506 6.22143 6.22377

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.224
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(3)= 0.495
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 1.149
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 1.840
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 3.326
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 4.450

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
1	1	-11.07050	-16.39894	-1.18520
1	2	-13.03054	-16.10261	-1.08094
1	3	-13.31455	-16.42963	-1.20773
1	4	-13.68351	-17.15753	-1.52785
1	5	-13.96752	-17.27665	-1.58490
1	6	-14.36856	-18.27885	-2.13110
1	7	-14.65458	NUMXQ(K)= 7	

3.467E-06	0.062	1.000
2.349E-06	0.187	3.000
1.955E-06	0.311	5.000
1.499E-06	0.622	10.000
1.255E-06	0.934	15.000
1.089E-06	1.245	20.000
9.531E-07	1.556	25.000
8.516E-07	1.867	30.000
7.697E-07	2.178	35.000
7.038E-07	2.490	40.000
6.493E-07	2.801	45.000
6.033E-07	3.112	50.000
5.601E-07	3.423	55.000
5.148E-07	3.734	60.000

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    4.758E-07              4.045              65.000
    4.418E-07              4.357              70.000

    1.644E-06              0.5                 8.03

ANNUAL AVERAGE =   3.67E-09

K=  1     FIVEXQ(K)= 1.644E-06     FIVEPR(K)= 8.034

FUMIGATION X/Q AT THE BOUNDARY:   4.11E-05

 EXPONENTIAL TERM AND FREQUENCIES

   9.582E-01   5.200E-01   4.914E-01   3.613E-01   2.419E-01   2.081E-01
1.693E-02
       0.376       3.982       5.034      12.976      65.311      97.183
100.000
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.13	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.637E-06
A	3.3	0.40	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.102E-06
A	4.4	0.20	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.40	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.07	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.26	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
A	10.8	0.13	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	3.360E-07
B	1.1	0.07	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	8.900E-06
B	1.7	0.07	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	6.027E-06
B	2.2	0.46	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	4.557E-06
B	3.3	0.99	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.73	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.33	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	8.7	0.13	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.20	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
C	1.1	0.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.20	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	0.46	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06

C	3.3	0.93	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.192E-06						
C	4.4	0.79	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.650E-06						
C	5.4	0.40	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.323E-06						
C	6.5	0.53	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.105E-06						
C	8.7	0.13	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
C	10.8	0.07	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
C	26.5	0.20	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.719E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.19	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	2.65	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	3.51	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	7.88	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	11.58	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	10.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.55	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	7.48	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.85	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.66	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.92	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.85	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	8.67	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.66	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						

```
   F          0.3        0.01     90000.        0.        131.       1000.0
92.1      0.0       0.000E+00   0.000E+00   4.813E-06
   F          1.2        0.46     90000.        0.        131.       1000.0
92.1      0.0       0.000E+00   0.000E+00   1.024E-06
   F          1.8        0.79     90000.        0.        131.       1000.0
92.1      0.0       0.000E+00   0.000E+00   6.935E-07
   F          2.4        0.86     90000.        0.        131.       1000.0
92.1      0.0       0.000E+00   0.000E+00   5.243E-07
   F          3.5        1.26     90000.        0.        131.       1000.0
92.1      0.0       0.000E+00   0.000E+00   3.528E-07
   F          4.7        1.26     90000.        0.        131.       1000.0
92.1      0.0       0.000E+00   0.000E+00   2.656E-07
   F          5.9        0.60     90000.        0.        131.       1000.0
92.1      0.0       0.000E+00   0.000E+00   2.130E-07
   F          7.0        0.26     90000.        0.        131.       1000.0
92.1      0.0       0.000E+00   0.000E+00   1.779E-07

   G          1.2        0.60     90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   9.605E-08
   G          1.8        0.33     90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   6.505E-08
   G          2.4        0.60     90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   4.918E-08
   G          3.5        0.53     90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   3.310E-08
   G          4.7        0.20     90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   2.491E-08
   G          5.9        0.26     90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.900E-06	8.835E-06	6.362E-06	6.027E-06	4.813E-06	4.557E-06	4.309E-06	3.312E-06	3.257E-06		
0.010	0.076	0.095	0.227	0.294	0.306	0.769	0.968	2.159	2.623		
0.00035	0.00268	0.00336	0.00803	0.01037	0.01080	0.02716	0.03418	0.07626	0.09263		
3.067E-06	2.308E-06	2.243E-06	2.192E-06	1.880E-06	1.851E-06	1.696E-06	1.650E-06	1.637E-06	1.323E-06		
3.616	4.344	6.992	7.918	8.911	9.242	12.751	13.545	13.678	14.075		
0.12770	0.15342	0.24694	0.27967	0.31474	0.32643	0.45035	0.47840	0.48308	0.49711		
1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.102E-06	1.024E-06	9.624E-07	9.350E-07	8.590E-07	8.302E-07		
15.995	16.127	24.005	24.534	24.931	25.395	28.241	28.440	40.025	40.157		
0.56491	0.56959	0.84781	0.86652	0.88055	0.89691	0.99745	1.00446	1.41362	1.41829		
8.296E-07	6.935E-07	6.887E-07	6.684E-07	6.651E-07	6.477E-07	5.752E-07	5.555E-07	5.243E-07	4.876E-07		
40.356	41.150	51.146	51.212	51.609	57.699	64.253	64.319	65.180	73.852		
1.42531	1.45336	1.80641	1.80874	1.82277	2.03787	2.26934	2.27167	2.30207	2.60835		
4.321E-07	4.173E-07	3.909E-07	3.528E-07	3.479E-07	3.360E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07		
81.332	81.597	86.827	88.084	89.938	90.070	92.056	92.255	93.513	95.234		
2.87255	2.88190	3.06661	3.11103	3.17649	3.18117	3.25131	3.25832	3.30275	3.36354		

```
   2.130E-07   1.975E-07   1.779E-07   1.415E-07   9.605E-08   8.032E-08
6.505E-08   4.918E-08   3.310E-08   2.491E-08
      95.830      96.492      96.756      97.418      98.014      98.080
98.411      99.007      99.537      99.735
     3.38458     3.40796     3.41731     3.44069     3.46173     3.46407
3.47576     3.49680     3.51551     3.52252

   1.998E-08
     100.000
     3.53187

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.003
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.128
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.279
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.478
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.847
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.412
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.036
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.267

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1     -11.07050 -16.06673  -1.11131
  2  2     -11.63677 -15.98940  -1.09191
  2  3     -12.69491 -16.80969  -1.36378
  2  4     -13.03054 -17.41221  -1.58122
  2  5     -13.31455 -18.01593  -1.81418
  2  6     -13.68351 -17.17675  -1.46278
  2  7     -13.96752 -18.16575  -1.91357
  2  8     -14.24977 -19.65893  -2.64322
  2  9     -14.36856     NUMXQ(K)=  9
    4.594E-06              0.035              1.000
    3.261E-06              0.106              3.000
    2.677E-06              0.177              5.000
    1.941E-06              0.353             10.000
```

1.548E-06	0.530	15.000
1.287E-06	0.706	20.000
1.116E-06	0.883	25.000
1.011E-06	1.060	30.000
9.272E-07	1.236	35.000
8.593E-07	1.413	40.000
7.860E-07	1.589	45.000
7.247E-07	1.766	50.000
6.727E-07	1.943	55.000
6.205E-07	2.119	60.000
1.605E-06	0.5	14.16

ANNUAL AVERAGE = 5.54E-09

K= 2 FIVEXQ(K)= 1.605E-06 FIVEPR(K)=14.157

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.589	5.428	8.407	13.914	67.279	97.484
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	2.2	0.75	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.637E-06
A	3.3	0.75	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.102E-06
A	4.4	0.83	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.75	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.15	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.68	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
B	1.1	0.08	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	8.900E-06
B	1.7	0.08	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	6.027E-06
B	2.2	0.38	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	4.557E-06
B	3.3	0.68	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.83	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.30	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.23	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.08	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	26.5	0.08	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.803E-07
C	1.1	0.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.75	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	0.83	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06

AT 131.4 METERS
CA=1292.SQ.METERS

C	3.3	1.13	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.192E-06		
C	4.4	0.60	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.650E-06		
C	5.4	0.23	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.323E-06		
C	8.7	0.30	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
D	0.2	0.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	2.11	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	6.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	5.87	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	9.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	9.40	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	8.87	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	3.91	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.98	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.75	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	1.13	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.58	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.63	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	6.84	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	7.14	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.19	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	1.28	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.23	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.68	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       1.05    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.35    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       0.53    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F         5.9       0.45    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F         7.0       0.23    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07

   G         1.2       0.45    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.38    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.38    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       1.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.38    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.08    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.900E-06	8.835E-06	6.362E-06	6.027E-06	4.813E-06	4.557E-06	4.309E-06	3.312E-06	3.257E-06	
0.017	0.093	0.114	0.265	0.340	0.365	0.741	1.493	3.599	4.426	
0.00054	0.00288	0.00355	0.00823	0.01056	0.01135	0.02304	0.04643	0.11189	0.13761	
3.067E-06	2.308E-06	2.243E-06	2.192E-06	1.880E-06	1.851E-06	1.696E-06	1.650E-06	1.637E-06	1.546E-06	
5.103	5.930	11.945	13.073	14.201	14.502	20.367	20.969	21.721	21.946	
0.15865	0.18437	0.37141	0.40648	0.44155	0.45090	0.63327	0.65198	0.67536	0.68237	
1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.102E-06	1.024E-06	9.624E-07	8.590E-07	8.302E-07	8.296E-07	
22.172	23.751	23.826	32.850	33.602	34.579	37.211	46.611	46.912	47.739	
0.68938	0.73848	0.74082	1.02138	1.04477	1.07516	1.15699	1.44924	1.45860	1.48432	
6.935E-07	6.887E-07	6.651E-07	6.477E-07	5.752E-07	5.555E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07	
48.415	57.289	58.041	64.883	70.899	71.050	72.102	79.246	83.156	83.833	
1.50536	1.78125	1.80463	2.01739	2.20443	2.20911	2.24184	2.46395	2.58553	2.60657	
3.909E-07	3.803E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	
89.021	89.097	90.450	91.428	93.308	93.834	95.112	95.563	95.789	96.015	
2.76789	2.77023	2.81232	2.84271	2.90116	2.91753	2.95728	2.97130	2.97832	2.98533	

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   1.415E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08
      96.767      97.218      97.669      98.045      98.421      99.549
99.925     100.000
     3.00871     3.02274     3.03677     3.04846     3.06015     3.09522
3.10691     3.10925

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.137
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.406
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.675
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.448
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.015
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.202

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  3  1     -11.07050 -15.96459  -1.11206
  3  2     -12.63456 -16.04749  -1.13975
  3  3     -13.03054 -17.40694  -1.65332
  3  4     -13.32235 -18.88775  -2.25272
  3  5     -13.96752 -18.58450  -2.11387
  3  6     -14.24977 -20.84631  -3.21686
  3  7     -14.36856     NUMXQ(K)=  7
    5.241E-06              0.031              1.000
    3.709E-06              0.093              3.000
    3.122E-06              0.155              5.000
    2.427E-06              0.311             10.000
    2.029E-06              0.466             15.000
    1.719E-06              0.622             20.000
    1.461E-06              0.777             25.000
    1.256E-06              0.933             30.000
    1.102E-06              1.088             35.000
    9.825E-07              1.244             40.000
    8.862E-07              1.399             45.000
    8.099E-07              1.555             50.000
    7.471E-07              1.710             55.000
    6.933E-07              1.866             60.000
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6.462E-07	2.021	65.000
5.852E-07	2.176	70.000
1.950E-06	0.5	16.08

ANNUAL AVERAGE = 6.11E-09

K= 3 FIVEXQ(K)= 1.950E-06 FIVEPR(K)=16.081

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
3.910	7.896	10.603	15.892	68.847	97.218
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.66	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.637E-06
A	3.3	1.52	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.102E-06
A	4.4	1.19	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.73	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.86	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.73	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
A	10.8	0.07	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	3.360E-07
B	1.7	0.59	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	6.027E-06
B	2.2	0.53	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	4.557E-06
B	3.3	0.73	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	1.19	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.13	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.07	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.07	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
C	1.1	0.07	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.92	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	1.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	1.12	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06

C	4.4	0.73	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.650E-06						
C	5.4	0.53	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.323E-06						
C	6.5	0.20	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.105E-06						
C	8.7	0.13	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.72	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	6.14	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	6.54	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	11.49	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	12.35	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	8.12	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	3.57	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	2.91	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	0.73	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.13	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.71	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	9.12	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	5.75	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	2.64	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	0.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	0.40	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	1.06	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
G	1.2	0.40	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.362E-06	6.027E-06	4.813E-06	4.557E-06	4.309E-06	3.312E-06	3.257E-06	3.067E-06	
0.014	0.039	0.106	0.700	0.717	1.246	2.170	3.888	4.945	5.671	
0.00050	0.00140	0.00373	0.02478	0.02539	0.04409	0.07682	0.13761	0.17502	0.20074	

2.308E-06	2.243E-06	2.192E-06	1.880E-06	1.851E-06	1.696E-06	1.650E-06	1.637E-06	1.546E-06	1.323E-06	
6.860	13.004	14.127	15.448	15.580	22.120	22.846	23.507	23.573	24.101	
0.24282	0.46026	0.50001	0.54677	0.55144	0.78291	0.80863	0.83201	0.83435	0.85305	

1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.102E-06	1.024E-06	9.624E-07	8.590E-07	8.302E-07	8.296E-07	
26.810	26.876	38.369	38.568	40.087	40.747	44.116	56.469	56.601	57.790	
0.94891	0.95125	1.35806	1.36508	1.41885	1.44223	1.56147	1.99869	2.00336	2.04545	

6.935E-07	6.887E-07	6.651E-07	6.477E-07	5.752E-07	5.555E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07	
58.847	66.972	67.698	76.814	80.381	81.240	81.901	87.647	90.554	91.281	
2.08285	2.37043	2.39615	2.71880	2.84505	2.87545	2.89883	3.10224	3.20511	3.23083	

3.909E-07	3.528E-07	3.479E-07	3.360E-07	3.265E-07	2.656E-07	2.453E-07	1.975E-07	1.415E-07	9.605E-08	
93.923	95.046	95.772	95.838	96.433	97.094	97.490	97.754	97.886	98.283	
3.32435	3.36410	3.38982	3.39215	3.41320	3.43658	3.45060	3.45996	3.46463	3.47866	

8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08
98.349	98.613	98.877	99.736	100.000
3.48100	3.49035	3.49970	3.53010	3.53945

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.025
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.077
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.175
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.499
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.831
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.357
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   1.997
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.716
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
4	1	-11.07050	-15.55881	-1.01616
4	2	-12.01920	-15.72648	-1.06429
4	3	-12.35483	-15.93312	-1.12952
4	4	-12.63456	-15.99522	-1.15078
4	5	-13.03054	-17.17854	-1.61010
4	6	-13.32235	-17.98886	-1.94844
4	7	-13.68351	-17.72770	-1.83025
4	8	-13.96752	-18.42111	-2.16777
4	9	-14.24977		

NUMXQ(K)= 9

5.438E-06	0.035	1.000
3.869E-06	0.106	3.000
3.245E-06	0.177	5.000
2.509E-06	0.354	10.000
2.120E-06	0.531	15.000
1.800E-06	0.708	20.000
1.567E-06	0.885	25.000
1.372E-06	1.062	30.000
1.223E-06	1.239	35.000
1.108E-06	1.416	40.000
1.017E-06	1.593	45.000

9.409E-07	1.770	50.000
8.762E-07	1.947	55.000
8.134E-07	2.124	60.000
7.563E-07	2.301	65.000
7.064E-07	2.478	70.000
6.624E-07	2.655	75.000
2.192E-06	0.5	14.13

ANNUAL AVERAGE = 9.15E-09

K= 4 FIVEXQ(K)= 2.192E-06 FIVEPR(K)=14.126

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
5.747	10.503	13.806	17.985	71.703	97.952
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.15	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	2.166E-06
A	2.2	0.73	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.637E-06
A	3.3	2.89	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.102E-06
A	4.4	2.11	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.64	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.39	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.10	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
B	1.7	0.24	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	6.027E-06
B	2.2	1.03	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	4.557E-06
B	3.3	1.67	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.29	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.24	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.15	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
C	1.7	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	1.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.83	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.49	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.24	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06

C	6.5	0.10	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.105E-06						
C	8.7	0.10	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
C	10.8	0.05	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.37	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	4.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	6.37	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	11.12	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	10.53	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	6.56	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	5.04	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	4.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.18	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.88	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.76	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	8.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	6.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	3.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.81	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.91	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.54	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	1.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.54	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.64	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       0.73     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.69     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.24     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F       28.5       0.20     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.39     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.34     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.027E-06	4.813E-06	4.557E-06	4.309E-06	3.312E-06	3.257E-06	3.067E-06	2.308E-06
0.011	0.034	0.279	0.293	1.321	1.370	2.741	4.259	5.925	6.218
0.00054	0.00161	0.01330	0.01397	0.06307	0.06541	0.13088	0.20336	0.28285	0.29688

2.243E-06	2.192E-06	2.166E-06	1.880E-06	1.851E-06	1.696E-06	1.650E-06	1.637E-06	1.546E-06	1.323E-06
10.479	11.311	11.458	12.634	12.879	19.245	19.735	20.469	20.616	20.861
0.50029	0.54003	0.54705	0.60316	0.61485	0.91879	0.94217	0.97724	0.98426	0.99595

1.273E-06	1.141E-06	1.105E-06	1.102E-06	1.024E-06	9.624E-07	8.590E-07	8.302E-07	8.296E-07	6.935E-07
22.624	33.741	33.839	36.728	37.267	40.450	50.979	51.077	53.183	54.162
1.08012	1.61085	1.61553	1.75347	1.77919	1.93116	2.43384	2.43851	2.53905	2.58581

6.887E-07	6.684E-07	6.651E-07	6.477E-07	5.752E-07	5.555E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07
60.724	60.773	61.410	69.637	74.681	75.073	75.710	81.733	85.994	86.092
2.89911	2.90145	2.93184	3.32463	3.56545	3.58415	3.61455	3.90212	4.10553	4.11021

3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.415E-07	9.605E-08
89.422	90.157	91.332	93.144	93.830	95.739	95.984	96.523	97.405	97.796
4.26919	4.30426	4.36038	4.44689	4.47962	4.57080	4.58249	4.60821	4.65029	4.66900

8.032E-08	6.505E-08	4.918E-08	4.375E-08	3.310E-08	2.491E-08
98.825	99.070	99.314	99.510	99.853	100.000
4.71810	4.72979	4.74148	4.75083	4.76719	4.77421

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE ORDERED X/Q-FREQUENCY VALUES, AND AS PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.918
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.976
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.752
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.431
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.536
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.322
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
5	1	-11.07050	-15.44689	-0.99443
5	2	-12.69491	-16.70467	-1.44893
5	3	-13.28753	-16.86024	-1.51489
5	4	-13.32235	-17.38889	-1.74126
5	5	-13.71833	-17.57645	-1.83023
5	6	-13.96752	-17.76283	-1.92475
5	7	-14.00233	-18.09034	-2.09238
5	8	-14.24977	NUMXQ(K)= 8	

5.228E-06	0.048	1.000
3.797E-06	0.143	3.000
3.239E-06	0.239	5.000
2.379E-06	0.477	10.000
1.935E-06	0.716	15.000
1.659E-06	0.955	20.000
1.435E-06	1.194	25.000
1.269E-06	1.432	30.000
1.140E-06	1.671	35.000
1.034E-06	1.910	40.000
9.458E-07	2.148	45.000
8.720E-07	2.387	50.000
8.049E-07	2.626	55.000
7.437E-07	2.865	60.000
6.908E-07	3.103	65.000

2.325E-06 0.5 10.47

ANNUAL AVERAGE = 1.33E-08

K= 5 FIVEXQ(K)= 2.325E-06 FIVEPR(K)=10.473

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01 5.200E-01 4.914E-01 3.613E-01 2.419E-01 2.081E-01
1.693E-02
7.003 10.382 14.006 18.036 69.615 98.629
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	2.2	0.16	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	1.637E-06								
A	3.3	1.37	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	1.102E-06								
A	4.4	2.19	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	8.296E-07								
A	5.4	0.93	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	6.651E-07								
A	6.5	0.16	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	5.555E-07								
A	8.7	0.16	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	4.173E-07								
A	10.8	0.05	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	3.360E-07								
A	26.5	0.05	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	1.367E-07								
B	2.2	0.27	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	4.557E-06								
B	3.3	1.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	3.067E-06								
B	4.4	1.15	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	2.308E-06								
B	5.4	0.49	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.851E-06								
B	8.7	0.11	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.161E-06								
B	10.8	0.05	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	9.350E-07								
C	2.2	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	3.257E-06								
C	3.3	2.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.192E-06								
C	4.4	1.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.650E-06								
C	5.4	0.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.323E-06								

C	6.5	0.16	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.105E-06		
C	8.7	0.16	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
C	10.8	0.11	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	1.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	3.61	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	4.21	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	9.79	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	9.19	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.05	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.58	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	5.14	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	1.31	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.38	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.93	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	2.35	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.62	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	6.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	7.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	3.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	2.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.98	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.53	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.557E-06	3.312E-06	3.257E-06	3.067E-06	2.308E-06	2.243E-06	2.192E-06
0.009	0.027	0.044	0.317	1.411	2.340	3.379	4.528	8.137	10.324
0.00038	0.00115	0.00188	0.01357	0.06033	0.10007	0.14450	0.19360	0.34791	0.44143

1.880E-06	1.851E-06	1.696E-06	1.650E-06	1.637E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06
11.253	11.746	15.956	17.104	17.268	17.870	20.221	20.330	30.118	30.282
0.48117	0.50222	0.68224	0.73134	0.73836	0.76408	0.86461	0.86929	1.28780	1.29481

1.102E-06	1.024E-06	9.624E-07	9.350E-07	8.590E-07	8.302E-07	8.296E-07	6.935E-07	6.887E-07	6.684E-07
31.649	32.305	34.930	34.985	44.171	44.335	46.522	47.124	54.178	54.287
1.35326	1.38132	1.49354	1.49588	1.88867	1.89568	1.98921	2.01492	2.31653	2.32121

6.651E-07	6.477E-07	5.752E-07	5.555E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07	3.909E-07	3.528E-07
55.217	61.396	66.973	67.137	68.121	75.448	80.588	80.752	87.095	88.626
2.36095	2.62515	2.86363	2.87064	2.91273	3.22602	3.44580	3.45281	3.72403	3.78949

3.479E-07	3.360E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.367E-07
89.939	89.993	93.329	94.313	96.829	97.430	98.524	98.633	99.016	99.070
3.84560	3.84794	3.99056	4.03265	4.14019	4.16591	4.21267	4.21735	4.23372	4.23605

```
   1.336E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08
      99.125      99.234      99.399      99.563      99.617      99.891
99.945     100.000
     4.23839     4.24307     4.25008     4.25710     4.25943     4.27112
4.27346     4.27580

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.441
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.730
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.286
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.352
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.987
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.623
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.223

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  6  1     -11.07050 -15.79888  -1.05701
  6  2     -13.03054 -17.23039  -1.60360
  6  3     -13.31455 -17.57249  -1.74369
  6  4     -13.68351 -17.70768  -1.80431
  6  5     -13.71833 -17.78020  -1.83711
  6  6     -14.00233 -18.35106  -2.11470
  6  7     -14.24977 -20.34046  -3.14048
  6  8     -14.53378     NUMXQ(K)=  8
    4.670E-06              0.043              1.000
    3.335E-06              0.128              3.000
    2.821E-06              0.214              5.000
    2.218E-06              0.428             10.000
    1.780E-06              0.641             15.000
    1.494E-06              0.855             20.000
    1.292E-06              1.069             25.000
    1.144E-06              1.283             30.000
    1.025E-06              1.497             35.000
    9.291E-07              1.710             40.000
    8.507E-07              1.924             45.000
```

7.787E-07	2.138	50.000
7.155E-07	2.352	55.000
6.614E-07	2.565	60.000
5.994E-07	2.779	65.000
5.413E-07	2.993	70.000
4.917E-07	3.207	75.000
2.047E-06	0.5	11.69

ANNUAL AVERAGE = 8.78E-09

K= 6 FIVEXQ(K)= 2.047E-06 FIVEPR(K)=11.694

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01 5.200E-01 4.914E-01 3.613E-01 2.419E-01 2.081E-01
1.693E-02
5.085 10.389 13.506 19.046 66.408 99.289
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS

AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.102E-06
A	4.4	0.44	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.39	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.39	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.30	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
B	1.7	0.09	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	6.027E-06
B	2.2	0.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	4.557E-06
B	3.3	0.26	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.48	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.57	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.39	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.22	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
C	2.2	0.09	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	1.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.65	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06

C	8.7	0.30	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.61	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.35	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.35	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	8.36	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	12.27	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	9.23	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	5.61	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	4.66	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	0.65	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.35	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.52	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	3.92	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	8.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	8.92	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	6.61	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	3.83	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	3.00	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	0.70	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.39	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.44	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.78	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	1.17	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.87	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	1.61	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.30	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.52	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.35	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NW SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 6.027E-06 4.813E-06 4.557E-06 3.312E-06 3.257E-06 3.067E-06 2.308E-06 2.243E-06
0.005 0.027 0.114 0.125 0.169 0.778 0.865 1.126 1.605 2.954
0.00027 0.00143 0.00611 0.00672 0.00906 0.04179 0.04647 0.06049 0.08621 0.15869

2.192E-06 1.880E-06 1.851E-06 1.696E-06 1.650E-06 1.546E-06 1.323E-06 1.273E-06 1.161E-06 1.141E-06
3.215 4.346 4.912 7.262 8.394 8.785 10.134 11.657 11.875 20.231
0.17272 0.23351 0.26390 0.39016 0.45095 0.47199 0.54447 0.62630 0.63799 1.08689

1.105E-06 1.102E-06 1.024E-06 9.624E-07 9.350E-07 8.590E-07 8.302E-07 8.296E-07 6.935E-07 6.887E-07
20.883 20.970 21.406 25.322 25.366 37.638 37.943 38.378 39.161 48.387
1.12196 1.12664 1.15002 1.36044 1.36278 2.02210 2.03847 2.06185 2.10393 2.59960

6.651E-07 6.477E-07 5.752E-07 5.555E-07 5.243E-07 4.876E-07 4.321E-07 4.173E-07 3.909E-07 3.528E-07
48.779 56.873 62.487 62.879 64.054 72.975 77.632 77.936 84.551 86.422
2.62064 3.05551 3.35712 3.37816 3.44129 3.92059 4.17076 4.18712 4.54250 4.64304

3.479E-07 3.265E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.336E-07 9.605E-08
87.075 90.905 92.515 95.518 96.301 96.997 97.302 97.650 97.824 97.868
4.67811 4.88386 4.97036 5.13169 5.17377 5.21118 5.22755 5.24625 5.25560 5.25794

8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08
98.259	98.390	98.869	99.391	99.739	99.913	100.000
5.27898	5.28600	5.31172	5.33977	5.35848	5.36783	5.37250

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= HANDCHECK 0.159
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= HANDCHECK 1.086
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= HANDCHECK 2.020
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= HANDCHECK 3.053
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= HANDCHECK 3.917

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
7	1	-11.07050	-16.58446	-1.21213
7	2	-13.00780	-15.56200	-0.86562
7	3	-13.03054	-15.68659	-0.90822
7	4	-13.31455	-16.36037	-1.16621
7	5	-13.68351	-16.33661	-1.15586
7	6	-13.96752	-17.24470	-1.59890
7	7	-14.24977	-18.96825	-2.51906
7	8	-14.53378		

NUMXQ(K)= 8

3.305E-06	0.054	1.000
2.233E-06	0.161	3.000
1.930E-06	0.269	5.000
1.538E-06	0.537	10.000
1.299E-06	0.806	15.000
1.147E-06	1.075	20.000
1.039E-06	1.343	25.000
9.557E-07	1.612	30.000
8.892E-07	1.880	35.000
8.249E-07	2.149	40.000
7.620E-07	2.418	45.000
7.088E-07	2.686	50.000
6.632E-07	2.955	55.000
6.101E-07	3.224	60.000
5.572E-07	3.492	65.000

5.117E-07	3.761	70.000
1.583E-06	0.5	9.31

ANNUAL AVERAGE = 4.89E-09

K= 7 FIVEXQ(K)= 1.583E-06 FIVEPR(K)= 9.307

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.610	5.396	7.485	14.634	60.072	98.216	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.18	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
B	3.3	0.05	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.18	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.23	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.28	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.14	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.05	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
C	3.3	0.18	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.46	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.55	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.23	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.60	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	6.18	4000.	0.	131.	263.4					

AT 131.4 METERS
CA=1292.SQ.METERS

78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	10.79	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.41	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.78	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.46	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.05	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.74	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.55	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.92	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	2.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		

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   G         2.4       0.18    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.23    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.067E-06	2.308E-06	2.243E-06	2.192E-06	1.880E-06	1.851E-06		
0.005	0.019	0.034	0.633	0.679	0.864	1.879	2.063	2.801	3.032		
0.00025	0.00097	0.00170	0.03209	0.03443	0.04378	0.09522	0.10457	0.14198	0.15367		
1.696E-06	1.650E-06	1.546E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07		
5.339	5.938	6.215	6.676	8.660	8.798	14.980	15.534	16.087	19.270		
0.27057	0.30097	0.31499	0.33837	0.43891	0.44592	0.75922	0.78728	0.81533	0.97666		
9.350E-07	8.590E-07	8.302E-07	8.296E-07	6.935E-07	6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07		
19.316	30.111	30.342	30.526	31.449	40.860	40.906	49.025	55.806	57.375		
0.97900	1.52610	1.53779	1.54714	1.59390	2.07086	2.07319	2.48469	2.82838	2.90787		
4.876E-07	4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07		
68.169	70.845	79.841	81.870	82.332	88.882	90.359	95.110	97.232	97.740		
3.45497	3.59058	4.04649	4.14937	4.17275	4.50475	4.57957	4.82038	4.92793	4.95365		
1.779E-07	1.415E-07	1.336E-07	9.605E-08	8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08		
98.432	98.478	98.754	99.077	99.124	99.216	99.400	99.631	99.769	99.908		
4.98872	4.99106	5.00509	5.02145	5.02379	5.02847	5.03782	5.04951	5.05653	5.06354		

```
   1.668E-08   1.253E-08
      99.954     100.000
     5.06588     5.06822

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.104
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.758
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.524
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.482
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.452

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1     -11.07050 -17.08584  -1.31784
  8  2     -13.03054 -15.67791  -0.86031
  8  3     -13.31455 -16.49468  -1.15763
  8  4     -13.68351 -16.28918  -1.07301
  8  5     -13.96752 -17.01085  -1.40654
  8  6     -14.24977 -18.09881  -1.96077
  8  7     -14.53378     NUMXQ(K)=  7
    2.890E-06              0.051              1.000
    1.989E-06              0.152              3.000
    1.732E-06              0.253              5.000
    1.347E-06              0.507             10.000
    1.141E-06              0.760             15.000
    1.018E-06              1.014             20.000
    9.289E-07              1.267             25.000
    8.603E-07              1.520             30.000
    7.890E-07              1.774             35.000
    7.306E-07              2.027             40.000
    6.817E-07              2.281             45.000
    6.371E-07              2.534             50.000
    5.877E-07              2.788             55.000
    5.453E-07              3.041             60.000
    5.085E-07              3.294             65.000

    1.354E-06              0.5                9.87

ANNUAL AVERAGE =   1.74E-09
```

K= 8 FIVEXQ(K)= 1.354E-06 FIVEPR(K)= 9.865

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.185	2.260	3.183	12.839	53.116	98.801	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.05	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.16	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.09	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.14	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
B	3.3	0.02	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.09	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.40	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.33	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.51	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.14	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
B	26.5	0.02	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.803E-07
C	2.2	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.47	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.86	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.12	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.23	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07

```
   C        26.5       0.02     2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   2.719E-07

   D         0.2       0.00     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.556E-05
   D         1.1       0.28     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   3.312E-06
   D         1.7       0.68     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   2.243E-06
   D         2.2       0.91     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.696E-06
   D         3.3       3.99     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.141E-06
   D         4.4       7.47     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   8.590E-07
   D         5.4       7.71     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   6.887E-07
   D         6.5       6.40     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   5.752E-07
   D         8.7       8.06     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   4.321E-07
   D        10.8       2.24     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   3.479E-07
   D        26.5       0.93     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.415E-07

   E         0.3       0.01     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   8.835E-06
   E         1.2       0.61     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.880E-06
   E         1.8       1.03     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.273E-06
   E         2.4       1.40     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   9.624E-07
   E         3.5       6.14     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   6.477E-07
   E         4.7      10.09     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   4.876E-07
   E         5.9       9.88     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   3.909E-07
   E         7.0       6.63     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   3.265E-07
   E         9.3       8.57     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   2.453E-07
   E        11.6       1.68     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.975E-07
   E        28.5       0.21     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   8.032E-08

   F         0.3       0.01    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.813E-06
   F         1.2       0.28    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.024E-06
   F         1.8       0.26    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.77    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.75    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       2.08    90000.        0.        131.      1000.0
```

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.07	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.51	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.14	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.02	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.02	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.257E-06	3.067E-06	2.308E-06	2.243E-06	2.192E-06	1.880E-06	
0.002	0.014	0.021	0.301	0.325	0.348	0.442	1.119	1.375	1.983	
0.00023	0.00140	0.00213	0.03018	0.03252	0.03486	0.04421	0.11201	0.13773	0.19852	

1.851E-06	1.696E-06	1.650E-06	1.546E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.024E-06	
2.379	3.290	3.757	4.084	5.018	6.045	6.559	10.551	11.415	11.696	
0.23827	0.32945	0.37621	0.40894	0.50247	0.60534	0.65678	1.05658	1.14309	1.17114	

9.624E-07	9.350E-07	8.590E-07	8.302E-07	8.296E-07	6.935E-07	6.887E-07	6.684E-07	6.651E-07	6.477E-07	
13.096	13.237	20.708	21.829	21.876	22.132	29.837	30.071	30.234	36.375	
1.31142	1.32545	2.07362	2.18585	2.19053	2.21624	2.98779	3.01117	3.02754	3.64244	

5.752E-07	5.555E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07	3.909E-07	3.803E-07	3.528E-07	3.479E-07	
42.773	42.866	43.636	53.723	61.778	61.918	71.795	71.818	73.569	75.811	
4.28306	4.29242	4.36957	5.37960	6.18622	6.20025	7.18924	7.19158	7.36693	7.59138	

3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	1.076E-07	
82.442	82.465	84.543	93.112	94.186	95.867	96.801	97.735	98.296	98.319	
8.25538	8.25772	8.46580	9.32386	9.43141	9.59975	9.69327	9.78679	9.84291	9.84524	

9.605E-08 8.032E-08 6.505E-08 4.918E-08 3.310E-08 2.491E-08
1.998E-08 1.668E-08 1.253E-08
98.506 98.716 98.926 99.113 99.626 99.766
99.953 99.977 100.000
9.86395 9.88499 9.90603 9.92474 9.97617 9.99020
10.00891 10.01124 10.01358

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= HANDCHECK 0.138
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= HANDCHECK 1.055
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= HANDCHECK 2.071
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= HANDCHECK 3.639
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= HANDCHECK 7.185

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
9	1	-11.07050	-16.72827	-1.23497
9	2	-13.03054	-15.67895	-0.88452
9	3	-13.31455	-16.00172	-1.00527
9	4	-13.68351	-16.13786	-1.06430
9	5	-13.96752	-16.31647	-1.15189
9	6	-14.24977	-16.97810	-1.52066
9	7	-14.75472		

NUMXQ(K)= 7

2.468E-06	0.100	1.000
1.763E-06	0.300	3.000
1.496E-06	0.501	5.000
1.165E-06	1.001	10.000
9.873E-07	1.502	15.000
8.723E-07	2.003	20.000
7.839E-07	2.503	25.000
7.156E-07	3.004	30.000
6.609E-07	3.505	35.000
6.061E-07	4.005	40.000
5.572E-07	4.506	45.000
5.159E-07	5.007	50.000
4.806E-07	5.507	55.000
4.498E-07	6.008	60.000
4.228E-07	6.509	65.000
3.989E-07	7.010	70.000

1.497E-06 0.5 4.99

ANNUAL AVERAGE = 5.15E-09

K= 9 FIVEXQ(K)= 1.497E-06 FIVEPR(K)= 4.993

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.444	4.366	5.884	13.620	52.287	98.529	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.

STABILITY CLASS	WINDSPEED METER/SEC	FREQUENCY PERCENT	DISTANCE METERS	TERRAIN HT METERS	EFF PLUME HT METERS	SIGMA-Y METERS	SIGMA-Z METERS	MEANDER-SY METERS	** CHI/Q VALUES (SEC/CUBIC METER) MEANDER	BLDG WAKE	USED
									AT 131.4 METERS		
CA=1292.SQ.METERS											
A	3.3	0.04	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.102E-06
A	4.4	0.08	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.16	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.12	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.08	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
B	3.3	0.16	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.16	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.36	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.20	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.20	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
B	26.5	0.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.803E-07
C	3.3	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.68	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.72	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.39	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.10	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.31	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.84	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.82	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	10.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	5.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.08	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.16	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.76	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.80    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.12    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.32    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.04    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.36    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.76    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.64    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.16    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.20    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNE SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.067E-06	2.308E-06	2.243E-06	2.192E-06	1.880E-06	1.851E-06	
0.002	0.014	0.027	0.266	0.426	0.585	1.263	1.423	2.061	2.420	
0.00012	0.00083	0.00156	0.01559	0.02494	0.03430	0.07404	0.08339	0.12080	0.14185	
1.696E-06	1.650E-06	1.546E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.102E-06	1.024E-06	
3.657	4.176	4.375	4.934	6.529	6.729	11.117	11.795	11.835	12.314	
0.21432	0.24472	0.25641	0.28914	0.38266	0.39435	0.65154	0.69128	0.69362	0.72168	
9.624E-07	9.350E-07	8.590E-07	8.302E-07	8.296E-07	6.935E-07	6.887E-07	6.651E-07	6.477E-07	5.752E-07	
14.907	14.947	23.045	23.763	23.843	24.641	32.340	32.500	40.319	45.585	
0.87365	0.87599	1.35061	1.39269	1.39737	1.44413	1.89537	1.90472	2.36298	2.67160	
5.555E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07	3.909E-07	3.803E-07	3.528E-07	3.479E-07	3.265E-07	
45.705	46.862	57.753	62.061	62.141	72.394	72.434	75.984	76.822	84.082	
2.67861	2.74641	3.38470	3.63720	3.64188	4.24275	4.24509	4.45318	4.50228	4.92780	
2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	1.076E-07	9.605E-08	8.032E-08	
86.955	92.939	94.774	95.532	96.290	96.529	97.327	97.447	97.766	97.846	
5.09614	5.44684	5.55439	5.59881	5.64324	5.65726	5.70403	5.71104	5.72974	5.73442	

6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08
97.886	98.245	99.003	99.641	99.801	100.000
5.73676	5.75780	5.80222	5.83963	5.84898	5.86067

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.142
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 0.651
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 1.349
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 2.361
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 3.382

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
10	1	-11.07050	-16.85526	-1.22451
10	2	-13.19985	-15.20294	-0.67101
10	3	-13.31455	-16.45239	-1.11498
10	4	-13.68351	-16.28066	-1.04583
10	5	-13.96752	-16.71303	-1.24131
10	6	-14.24977	-17.84059	-1.80952
10	7	-14.53378		

NUMXQ(K)= 7

2.547E-06	0.059	1.000
1.770E-06	0.176	3.000
1.546E-06	0.293	5.000
1.190E-06	0.586	10.000
1.019E-06	0.879	15.000
9.096E-07	1.172	20.000
8.256E-07	1.465	25.000
7.541E-07	1.758	30.000
6.972E-07	2.051	35.000
6.505E-07	2.344	40.000
5.950E-07	2.637	45.000
5.476E-07	2.930	50.000
5.073E-07	3.223	55.000
1.266E-06	0.5	8.53

ANNUAL AVERAGE = 2.57E-09

K= 10 FIVEXQ(K)= 1.266E-06 FIVEPR(K)= 8.531

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.479	3.112	4.269	16.648	49.642	97.527	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.09	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	1.102E-06								
A	4.4	0.09	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	8.296E-07								
A	5.4	0.14	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	6.651E-07								
A	8.7	0.09	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	4.173E-07								
B	3.3	0.14	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	3.067E-06								
B	4.4	0.19	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	2.308E-06								
B	5.4	0.28	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.851E-06								
B	6.5	0.28	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.546E-06								
B	8.7	0.14	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.161E-06								
B	10.8	0.05	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	9.350E-07								
C	3.3	0.33	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.192E-06								
C	4.4	0.42	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.650E-06								
C	5.4	0.70	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.323E-06								
C	6.5	0.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.105E-06								
C	8.7	0.75	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	8.302E-07								
C	10.8	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	6.684E-07								
C	26.5	0.09	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.719E-07								
D	0.2	0.00	4000.	0.	131.	263.4			

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.32	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	6.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	6.67	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.76	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.80	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.96	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	4.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.27	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.70	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.27	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	4.65	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	4.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	3.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.46	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.08    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.05    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.23    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.28    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.03    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.69    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.75    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.47    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.23    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.067E-06	2.308E-06	2.243E-06	2.192E-06	1.880E-06	1.851E-06	
0.003	0.019	0.037	0.460	0.601	0.789	1.869	2.198	2.997	3.278	
0.00017	0.00094	0.00185	0.02289	0.02990	0.03926	0.09303	0.10940	0.14914	0.16317	

1.696E-06	1.650E-06	1.546E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.102E-06	1.024E-06	
4.594	5.016	5.298	6.003	7.976	8.117	12.720	13.237	13.331	14.036	
0.22864	0.24968	0.26371	0.29878	0.39698	0.40399	0.63312	0.65884	0.66351	0.69858	

9.624E-07	9.350E-07	8.590E-07	8.302E-07	8.296E-07	6.935E-07	6.887E-07	6.684E-07	6.651E-07	6.477E-07	
16.995	17.042	23.055	23.807	23.900	24.699	31.369	31.510	31.651	39.355	
0.84588	0.84822	1.14748	1.18489	1.18957	1.22932	1.56132	1.56833	1.57534	1.95878	

5.752E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.719E-07	
43.113	44.382	53.354	57.629	57.722	65.473	70.124	70.829	75.479	75.573	
2.14582	2.20895	2.65552	2.86828	2.87295	3.25873	3.49019	3.52526	3.75673	3.76140	

2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	1.076E-07	9.605E-08	8.032E-08	
80.505	87.974	91.075	92.343	93.799	94.034	95.115	95.162	95.209	95.302	
4.00690	4.37865	4.53296	4.59608	4.66856	4.68025	4.73403	4.73636	4.73870	4.74338	

```
   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.537      95.819      96.853      98.544      99.295      99.765
100.000
     4.75507     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.109
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.249
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.632
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.146
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.957
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.653

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.07050 -16.83768  -1.24264
 11  2     -13.03054 -16.43022  -1.10965
 11  3     -13.31455 -16.61110  -1.17407
 11  4     -13.68351 -16.91969  -1.29782
 11  5     -13.96752 -16.99698  -1.33180
 11  6     -14.24977 -18.81505  -2.21317
 11  7     -14.53378     NUMXQ(K)=  7
    2.911E-06              0.050              1.000
    1.975E-06              0.149              3.000
    1.652E-06              0.249              5.000
    1.260E-06              0.498             10.000
    1.057E-06              0.747             15.000
    9.211E-07              0.995             20.000
    8.241E-07              1.244             25.000
    7.495E-07              1.493             30.000
    6.904E-07              1.742             35.000
    6.382E-07              1.991             40.000
    5.725E-07              2.240             45.000
    5.187E-07              2.489             50.000

    1.257E-06              0.5               10.05
```

ANNUAL AVERAGE = 2.24E-09

K= 11 FIVEXQ(K)= 1.257E-06 FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.423	3.382	4.463	22.519	51.600	95.256
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	5.4	0.14	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	6.651E-07								
A	6.5	0.28	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	5.555E-07								
A	8.7	0.05	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	4.173E-07								
A	10.8	0.09	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	3.360E-07								
A	26.5	0.05	1000.	0.	131.	187.3	449.8	0.0	0.000E+00
0.000E+00	1.367E-07								
B	3.3	0.05	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	3.067E-06								
B	4.4	0.09	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	2.308E-06								
B	5.4	0.24	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.851E-06								
B	6.5	0.33	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.546E-06								
B	8.7	0.61	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	1.161E-06								
B	10.8	0.09	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	9.350E-07								
B	26.5	0.05	1000.	0.	131.	140.9	110.2	0.0	0.000E+00
0.000E+00	3.803E-07								
C	3.3	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.192E-06								
C	4.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.650E-06								
C	5.4	0.66	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.323E-06								
C	6.5	0.71	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.105E-06								
C	8.7	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	8.302E-07								
C	10.8	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	6.684E-07								

C	26.5	0.09	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.28	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.13	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.77	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	4.19	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	4.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	6.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.94	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.56	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.69	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.22	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	5.46	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	8.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.71	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.85	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	3.62	90000.	0.	131.	1000.0

```
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       4.00     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       2.68     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       3.77     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.99     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07
   F       28.5       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.89     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.18     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       1.88     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       1.08     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.66     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
   G       11.6       0.09     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.009E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
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THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.067E-06	2.308E-06	2.243E-06	2.192E-06	1.880E-06	1.851E-06
0.002	0.019	0.038	0.320	0.367	0.461	0.885	1.026	1.920	2.156
0.00012	0.00097	0.00188	0.01591	0.01825	0.02292	0.04396	0.05098	0.09540	0.10709

1.696E-06	1.650E-06	1.546E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07
3.285	3.473	3.803	4.462	6.109	6.721	10.957	11.662	12.368	14.063
0.16320	0.17256	0.18892	0.22166	0.30349	0.33388	0.54430	0.57937	0.61444	0.69861

9.350E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07	6.651E-07	6.477E-07	5.752E-07	5.555E-07
14.157	17.922	19.051	19.899	24.087	24.228	24.370	29.594	34.441	34.723
0.70329	0.89033	0.94645	0.98853	1.19662	1.20363	1.21064	1.47017	1.71098	1.72501

5.243E-07	4.876E-07	4.321E-07	4.173E-07	3.909E-07	3.803E-07	3.528E-07	3.479E-07	3.360E-07	3.265E-07
36.418	41.877	48.419	48.466	55.478	55.525	58.537	59.479	59.573	66.962
1.80918	2.08039	2.40538	2.40772	2.75608	2.75842	2.90806	2.95482	2.95949	3.32656

2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.367E-07	1.336E-07	1.076E-07
67.056	70.680	79.010	83.010	84.799	87.481	88.046	88.093	91.858	92.846
3.33124	3.51127	3.92510	4.12383	4.21268	4.34594	4.37400	4.37634	4.56338	4.61248

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   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      93.317      93.411      93.788      94.164      94.211      95.105
96.282      98.165      99.247      99.906
     4.63586     4.64054     4.65924     4.67795     4.68028     4.72471
4.78316     4.87668     4.93045     4.96319

   1.009E-08
     100.000
     4.96786

 BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.001
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.163
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.544
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.579
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.945
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.469
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.753
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.324

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 12  1     -11.07050 -16.99141  -1.25333
 12  2     -11.63677 -16.93831  -1.24090
 12  3     -13.28753 -16.23471  -1.00175
 12  4     -13.68351 -17.41930  -1.46689
 12  5     -13.71559 -17.78374  -1.61123
 12  6     -14.00160 -17.45098  -1.46947
 12  7     -14.24977 -18.47832  -1.94105
 12  8     -14.75472 -18.91225  -2.16726
 12  9     -14.93482    NUMXQ(K)=  9
    2.619E-06              0.050              1.000
    1.755E-06              0.149              3.000
    1.485E-06              0.248              5.000
    1.178E-06              0.497             10.000
```

9.563E-07	0.745	15.000
8.083E-07	0.994	20.000
7.136E-07	1.242	25.000
6.410E-07	1.490	30.000
5.687E-07	1.739	35.000
5.115E-07	1.987	40.000
4.651E-07	2.236	45.000
4.265E-07	2.484	50.000
3.938E-07	2.732	55.000
3.629E-07	2.981	60.000
3.361E-07	3.229	65.000
1.175E-06	0.5	10.06

ANNUAL AVERAGE = 2.16E-09

K= 12 FIVEXQ(K)= 1.175E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.612	3.671	5.130	26.515	53.437	92.988
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.03	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.06	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.39	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.42	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
A	10.8	0.30	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	3.360E-07
A	26.5	0.18	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.367E-07
B	2.2	0.03	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	4.557E-06
B	3.3	0.09	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.09	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.39	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.30	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.63	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.33	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
B	26.5	0.21	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.803E-07
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.48	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.69	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.33	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06

C	8.7	1.44	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
C	10.8	0.87	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.48	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.90	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	2.66	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.26	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	4.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	4.25	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	9.30	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	6.31	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	3.71	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.90	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.72	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	3.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.77	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.37	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	12.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.63	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.30	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.42	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.66	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.29	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.63	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.83	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.84	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.81	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.557E-06 3.312E-06 3.067E-06 2.308E-06 2.243E-06 2.192E-06 1.880E-06
0.002 0.019 0.030 0.060 0.299 0.389 0.479 1.017 1.077 1.974
0.00015 0.00150 0.00235 0.00469 0.02339 0.03041 0.03742 0.07951 0.08418 0.15432

1.851E-06 1.696E-06 1.650E-06 1.546E-06 1.323E-06 1.273E-06 1.161E-06 1.141E-06 1.105E-06 1.024E-06
2.363 3.261 3.739 4.038 4.726 5.444 6.073 8.735 9.064 9.483
0.18472 0.25486 0.29227 0.31565 0.36942 0.42553 0.47463 0.68272 0.70844 0.74117

9.624E-07 9.350E-07 8.590E-07 8.302E-07 8.296E-07 6.935E-07 6.887E-07 6.684E-07 6.651E-07 6.477E-07
10.739 11.068 14.329 15.764 15.794 16.273 20.281 21.149 21.209 24.260
0.83937 0.86508 1.11993 1.23216 1.23449 1.27190 1.58520 1.65300 1.65768 1.89616

5.752E-07 5.555E-07 5.243E-07 4.876E-07 4.321E-07 4.173E-07 3.909E-07 3.803E-07 3.528E-07 3.479E-07
28.507 28.896 29.554 33.144 42.447 42.866 48.639 48.848 50.135 56.446
2.22816 2.25855 2.30999 2.59055 3.31768 3.35041 3.80165 3.81802 3.91856 4.41188

3.360E-07 3.265E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.367E-07
56.746 63.117 63.596 66.228 78.702 81.244 83.877 86.419 90.129 90.308
4.43526 4.93326 4.97067 5.17642 6.15138 6.35011 6.55586 6.75459 7.04451 7.05853

```
   1.336E-07   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08
4.375E-08   3.310E-08   2.491E-08   1.998E-08
      94.137      94.825      95.064      95.363      95.513      95.722
95.752      96.500      97.338      98.145
     7.35780     7.41158     7.43028     7.45366     7.46535     7.48172
7.48406     7.54251     7.60797     7.67110

   1.668E-08   1.253E-08   1.009E-08
      99.252      99.970     100.000
     7.75761     7.81372     7.81606
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

```
 CHI/Q =  1.556E-05      DISTANCE =   4000.000
```

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE ORDERED X/Q-FREQUENCY VALUES, AND AS PLOTTED ON A LOG-NORMAL GRAPH.)

```
 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.185
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.682
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.233
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.894
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.798
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   4.930

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1     -11.07050 -16.44367  -1.15172
 13  2     -11.63677 -16.77285  -1.23059
 13  3     -13.19985 -15.46872  -0.78143
 13  4     -13.31455 -16.82123  -1.27206
 13  5     -13.68351 -17.25835  -1.44927
 13  6     -14.00233 -17.26210  -1.45093
 13  7     -14.24977 -17.72627  -1.67451
 13  8     -14.75472 -17.35617  -1.46596
 13  9     -14.93482     NUMXQ(K)=  9
    2.547E-06              0.078              1.000
    1.745E-06              0.234              3.000
    1.460E-06              0.391              5.000
    1.063E-06              0.782             10.000
    8.538E-07              1.172             15.000
    7.254E-07              1.563             20.000
```

6.345E-07	1.954	25.000
5.586E-07	2.345	30.000
5.000E-07	2.736	35.000
4.533E-07	3.126	40.000
4.149E-07	3.517	45.000
3.837E-07	3.908	50.000
3.595E-07	4.299	55.000
3.384E-07	4.690	60.000
1.312E-06	0.5	6.40

ANNUAL AVERAGE = 4.66E-09

K= 13 FIVEXQ(K)= 1.312E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.376	5.713	7.777	22.895	58.074	95.154
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					
			AT 131.4 METERS							
CA=1292.SQ.METERS										
A	4.4	0.08	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.08	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.19	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.13	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
A	10.8	0.05	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	3.360E-07
A	26.5	0.13	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.367E-07
B	3.3	0.03	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.13	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.05	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.21	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.40	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.32	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
B	26.5	0.27	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.803E-07
C	3.3	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.21	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.72	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
C	26.5	0.89	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.719E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.51	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	0.51	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	0.51	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	1.58	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	3.09	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	4.29	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	5.26	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	14.57	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	10.52	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	6.09	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.01	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.46	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	0.51	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	0.62	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	2.20	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	3.11	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	4.32	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	6.23	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	11.84	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	3.33	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.32	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.35	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.40	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.48	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.05	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	2.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.62	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.59	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.70	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.54	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.067E-06	2.308E-06	2.243E-06	2.192E-06	1.880E-06	1.851E-06		
0.004	0.013	0.022	0.532	0.559	0.693	1.203	1.257	1.713	1.767		
0.00037	0.00113	0.00192	0.04634	0.04868	0.06037	0.10479	0.10947	0.14922	0.15389		
1.696E-06	1.650E-06	1.546E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.024E-06	9.624E-07		
2.277	2.438	2.652	3.001	3.511	3.914	5.497	6.061	6.410	7.027		
0.19831	0.21234	0.23105	0.26144	0.30586	0.34093	0.47888	0.52798	0.55837	0.61215		
9.350E-07	8.590E-07	8.302E-07	8.296E-07	6.935E-07	6.887E-07	6.684E-07	6.651E-07	6.477E-07	5.752E-07		
7.349	10.436	11.644	11.724	12.127	16.421	17.146	17.226	19.427	24.688		
0.64020	0.90908	1.01429	1.02130	1.05637	1.43046	1.49358	1.50060	1.69232	2.15057		
5.555E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07	3.909E-07	3.803E-07	3.528E-07	3.479E-07	3.360E-07		
24.876	25.359	28.472	43.046	43.180	47.502	47.770	48.817	59.338	59.392		
2.16694	2.20902	2.48023	3.74979	3.76148	4.13790	4.16128	4.25246	5.16897	5.17365		
3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.367E-07	1.336E-07		
65.618	66.504	67.819	79.655	81.642	84.970	86.446	92.539	92.673	95.464		
5.71607	5.79323	5.90779	6.93886	7.11188	7.40179	7.53038	8.06112	8.07281	8.31596		

```
   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.081      96.296      96.618      96.779      96.994      97.584
98.282      98.819      99.087      99.946
     8.36974     8.38844     8.41650     8.43053     8.44923     8.50067
8.56146     8.60822     8.63160     8.70641

   1.009E-08
     100.000
     8.71109
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.046
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.212
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.527
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.020
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.148
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.747
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.712
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
14	1	-11.07050	-16.99068	-1.32021
14	2	-12.61806	-17.71593	-1.53918
14	3	-13.31455	-17.10924	-1.32702
14	4	-13.71559	-16.79042	-1.20235
14	5	-14.00233	-16.88273	-1.24216
14	6	-14.36856	-16.74945	-1.17631
14	7	-14.65458	-17.13154	-1.39086
14	8	-14.93482	NUMXQ(K)= 8	

2.507E-06	0.087	1.000
1.511E-06	0.261	3.000
1.207E-06	0.436	5.000
8.908E-07	0.871	10.000
7.380E-07	1.307	15.000
6.405E-07	1.742	20.000
5.716E-07	2.178	25.000

5.219E-07	2.613	30.000
4.822E-07	3.049	35.000
4.495E-07	3.484	40.000
4.200E-07	3.920	45.000
3.922E-07	4.356	50.000
3.682E-07	4.791	55.000
3.472E-07	5.227	60.000
3.287E-07	5.662	65.000
1.133E-06	0.5	5.74

ANNUAL AVERAGE = 3.42E-09

K= 14 FIVEXQ(K)= 1.133E-06 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.671	4.616	6.039	16.516	63.462	96.403	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	6.5	0.06	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.04	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
A	26.5	0.02	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.367E-07
B	2.2	0.02	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	4.557E-06
B	3.3	0.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.02	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.02	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.06	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.13	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.11	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.17	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.38	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.47	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
C	26.5	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.719E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.17	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	5.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	7.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	17.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.45	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	5.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.30     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G        1.2       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.94     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.88     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.36     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.11     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.557E-06 3.312E-06 3.067E-06 2.308E-06 2.243E-06 2.192E-06 1.880E-06
0.001 0.011 0.018 0.039 0.210 0.253 0.274 0.873 0.937 1.428
0.00015 0.00118 0.00198 0.00431 0.02302 0.02769 0.03003 0.09550 0.10251 0.15629

1.851E-06 1.696E-06 1.650E-06 1.546E-06 1.323E-06 1.273E-06 1.161E-06 1.141E-06 1.105E-06 1.024E-06
1.450 2.304 2.475 2.540 2.732 3.074 3.202 5.723 6.108 6.386
0.15862 0.25215 0.27085 0.27786 0.29891 0.33632 0.35034 0.62623 0.66832 0.69871

9.624E-07 9.350E-07 8.590E-07 8.302E-07 6.935E-07 6.887E-07 6.684E-07 6.477E-07 5.752E-07 5.555E-07
7.027 7.134 11.108 11.664 11.942 16.963 17.433 19.826 26.921 26.985
0.76885 0.78054 1.21542 1.27620 1.30660 1.85604 1.90747 2.16933 2.94556 2.95257

5.243E-07 4.876E-07 4.321E-07 4.173E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.719E-07 2.656E-07
27.369 30.660 48.203 48.246 53.695 54.977 65.426 71.345 71.602 73.076
2.99466 3.35472 5.27424 5.27892 5.87511 6.01540 7.15869 7.80633 7.83439 7.99571

2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.367E-07 1.336E-07 9.605E-08 8.032E-08 6.505E-08
83.611 85.470 87.628 89.059 94.530 94.551 95.855 96.004 96.218 96.346
9.14836 9.35177 9.58791 9.74456 10.34310 10.34543 10.48805 10.50442 10.52780 10.54183

4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08	1.253E-08
96.581	97.521	98.654	99.530	99.893	100.000
10.56755	10.67042	10.79434	10.89020	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(2)=	HANDCHECK 0.156
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(4)=	HANDCHECK 0.271
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(5)=	HANDCHECK 0.625
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(6)=	HANDCHECK 1.214
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(7)=	HANDCHECK 2.943
GRAPH:	SLOPE LT -1.0 FOR LOW PERCENTAGES.	XSAVE(8)=	HANDCHECK 5.270

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.07050	-16.83786	-1.23621
15	2	-13.18433	-15.20717	-0.68445
15	3	-13.28753	-16.56140	-1.16730
15	4	-13.31455	-16.92728	-1.29885
15	5	-13.68351	-16.58137	-1.16034
15	6	-13.96752	-16.45361	-1.10362
15	7	-14.36856	-16.36916	-1.05892
15	8	-14.65458	NUMXQ(K)= 8	

2.149E-06	0.109	1.000
1.521E-06	0.328	3.000
1.214E-06	0.547	5.000
9.000E-07	1.094	10.000
7.541E-07	1.641	15.000
6.621E-07	2.188	20.000
5.961E-07	2.735	25.000
5.467E-07	3.282	30.000
5.076E-07	3.830	35.000
4.752E-07	4.377	40.000
4.477E-07	4.924	45.000
1.264E-06	0.5	4.57

ANNUAL AVERAGE = 2.04E-09

K= 15 FIVEXQ(K)= 1.264E-06 FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.128	2.222	2.628	10.926	64.626	96.068	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED						
	AT 131.4 METERS										
CA=1292.SQ.METERS											
A	3.3	0.02	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.102E-06
A	5.4	0.11	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.09	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.30	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
A	10.8	0.02	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	3.360E-07
A	26.5	0.02	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.367E-07
B	3.3	0.06	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.15	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.26	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.32	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.43	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.13	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
C	2.2	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.76	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.97	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.30	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
C	26.5	0.09	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.719E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.22	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	0.86	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	1.08	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	4.99	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	8.43	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	9.47	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	8.78	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	15.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	4.97	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	2.03	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.00	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.24	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	0.50	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	0.78	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	2.49	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	4.32	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	4.60	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	5.97	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	7.26	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.04	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.00	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.15	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.32	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.43	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.28	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.41	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.22	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.73	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.63	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 1000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.257E-06	3.067E-06	2.308E-06	2.243E-06	2.192E-06	1.880E-06	
0.002	0.006	0.010	0.226	0.248	0.313	0.464	1.329	1.675	1.912	
0.00019	0.00069	0.00111	0.02449	0.02683	0.03384	0.05021	0.14373	0.18114	0.20686	

1.851E-06	1.696E-06	1.650E-06	1.546E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.102E-06	
2.172	3.252	4.009	4.333	5.306	5.803	6.235	11.228	12.158	12.179	
0.23491	0.35182	0.43365	0.46872	0.57393	0.62770	0.67447	1.21455	1.31509	1.31742	

1.024E-06	9.624E-07	9.350E-07	8.590E-07	8.302E-07	6.935E-07	6.887E-07	6.684E-07	6.651E-07	6.477E-07	
12.331	13.109	13.238	21.668	23.268	23.592	33.059	33.362	33.470	35.956	
1.33379	1.41796	1.43199	2.34382	2.51683	2.55191	3.57596	3.60870	3.62039	3.88926	

5.752E-07	5.555E-07	5.243E-07	4.876E-07	4.321E-07	4.173E-07	3.909E-07	3.528E-07	3.479E-07	3.360E-07	
44.731	44.818	45.250	49.573	64.573	64.876	69.480	70.755	75.727	75.748	
4.83850	4.84785	4.89461	5.36222	6.98482	7.01755	7.51555	7.65349	8.19124	8.19358	

3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.367E-07	1.336E-07	
81.714	81.800	82.946	90.209	91.441	92.478	93.494	95.526	95.547	95.958	
8.83888	8.84823	8.97214	9.75772	9.89099	10.00322	10.11310	10.33288	10.33522	10.37964	

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   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.066      96.282      96.585      96.779      97.039      97.774
99.114      99.741      99.914     100.000
    10.39133    10.41471    10.44744    10.46848    10.49654    10.57603
10.72099    10.78879    10.80750    10.81685

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.181
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.314
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.341
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.514
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.573
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.835
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   6.981

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 16  1     -11.07050 -16.36624  -1.14645
 16  2     -13.03054 -15.92378  -0.99438
 16  3     -13.68351 -16.03240  -1.04259
 16  4     -13.71559 -16.10477  -1.07516
 16  5     -13.96752 -16.20172  -1.12393
 16  6     -14.00160 -16.36206  -1.20584
 16  7     -14.18845 -16.48304  -1.27295
 16  8     -14.36856 -16.95243  -1.55553
 16  9     -14.65458     NUMXQ(K)=  9
    2.626E-06              0.108              1.000
    1.820E-06              0.325              3.000
    1.532E-06              0.541              5.000
    1.192E-06              1.082             10.000
    1.011E-06              1.623             15.000
    8.907E-07              2.163             20.000
    7.998E-07              2.704             25.000
    7.260E-07              3.245             30.000
    6.662E-07              3.786             35.000
    6.155E-07              4.327             40.000
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5.726E-07	4.868	45.000
5.286E-07	5.408	50.000
4.910E-07	5.949	55.000
4.584E-07	6.490	60.000
1.574E-06	0.5	4.62

ANNUAL AVERAGE = 6.23E-09

K= 16 FIVEXQ(K)= 1.574E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.562	5.577	6.938	13.038	68.870	96.369
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.01	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	2.166E-06
A	2.2	0.09	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.637E-06
A	3.3	0.31	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.102E-06
A	4.4	0.33	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	8.296E-07
A	5.4	0.22	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	6.651E-07
A	6.5	0.18	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	5.555E-07
A	8.7	0.20	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	4.173E-07
A	10.8	0.05	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	3.360E-07
A	26.5	0.04	1000.	0.	131.	187.3	449.8	0.0	0.000E+00	0.000E+00	1.367E-07
B	1.1	0.00	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	8.900E-06
B	1.7	0.04	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	6.027E-06
B	2.2	0.12	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	4.557E-06
B	3.3	0.29	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	3.067E-06
B	4.4	0.26	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	2.308E-06
B	5.4	0.26	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.851E-06
B	6.5	0.22	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.546E-06
B	8.7	0.30	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	1.161E-06
B	10.8	0.12	1000.	0.	131.	140.9	110.2	0.0	0.000E+00	0.000E+00	9.350E-07
B	26.5	0.05	1000.	0.	131.	140.9					

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110.2      0.0      0.000E+00   0.000E+00   3.803E-07

   C        1.1       0.01      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   6.362E-06
   C        1.7       0.07      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   4.309E-06
   C        2.2       0.21      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   3.257E-06
   C        3.3       0.42      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   2.192E-06
   C        4.4       0.56      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   1.650E-06
   C        5.4       0.63      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   1.323E-06
   C        6.5       0.52      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   1.105E-06
   C        8.7       0.79      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   8.302E-07
   C       10.8       0.27      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   6.684E-07
   C       26.5       0.17      2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   2.719E-07

   D        0.2       0.00      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   1.556E-05
   D        1.1       0.57      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   3.312E-06
   D        1.7       1.50      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   2.243E-06
   D        2.2       2.03      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   1.696E-06
   D        3.3       5.42      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   1.141E-06
   D        4.4       7.33      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   8.590E-07
   D        5.4       7.08      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   6.887E-07
   D        6.5       6.11      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   5.752E-07
   D        8.7       9.08      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   4.321E-07
   D       10.8       3.90      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   3.479E-07
   D       26.5       1.98      4000.        0.        131.        263.4
78.0       0.0      0.000E+00   0.000E+00   1.415E-07

   E        0.3       0.01      9000.        0.        131.        389.6
74.2       0.0      0.000E+00   0.000E+00   8.835E-06
   E        1.2       0.73      9000.        0.        131.        389.6
74.2       0.0      0.000E+00   0.000E+00   1.880E-06
   E        1.8       1.24      9000.        0.        131.        389.6
74.2       0.0      0.000E+00   0.000E+00   1.273E-06
   E        2.4       1.88      9000.        0.        131.        389.6
74.2       0.0      0.000E+00   0.000E+00   9.624E-07
   E        3.5       5.25      9000.        0.        131.        389.6
74.2       0.0      0.000E+00   0.000E+00   6.477E-07
   E        4.7       6.52      9000.        0.        131.        389.6
74.2       0.0      0.000E+00   0.000E+00   4.876E-07
   E        5.9       6.35      9000.        0.        131.        389.6
74.2       0.0      0.000E+00   0.000E+00   3.909E-07
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E	7.0	5.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	6.91	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.44	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	1.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.18	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.25	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.69	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.01	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 1000.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.900E-06	8.835E-06	6.362E-06	6.027E-06	4.813E-06	4.557E-06	4.309E-06	3.312E-06	3.257E-06		
0.005	0.009	0.023	0.035	0.077	0.089	0.206	0.271	0.839	1.050		
0.00468	0.00935	0.02338	0.03507	0.07716	0.08885	0.20575	0.27121	0.83935	1.04978		

3.067E-06	2.308E-06	2.243E-06	2.192E-06	2.166E-06	1.880E-06	1.851E-06	1.696E-06	1.650E-06	1.637E-06		
1.342	1.606	3.110	3.528	3.535	4.267	4.524	6.556	7.112	7.206		
1.34203	1.60623	3.10958	3.52809	3.53511	4.26691	4.52409	6.55584	7.11230	7.20582		

1.546E-06	1.323E-06	1.273E-06	1.161E-06	1.141E-06	1.105E-06	1.102E-06	1.024E-06	9.624E-07	9.350E-07		
7.423	8.050	9.289	9.586	15.010	15.534	15.847	16.296	18.181	18.300		
7.42325	8.04985	9.28900	9.58593	15.01017	15.53389	15.84719	16.29609	18.18054	18.29978		

8.590E-07	8.302E-07	8.296E-07	6.935E-07	6.887E-07	6.684E-07	6.651E-07	6.477E-07	5.752E-07	5.555E-07		
25.625	26.415	26.742	27.306	34.388	34.661	34.879	40.130	46.237	46.415		
25.62484	26.41509	26.74242	27.30588	34.38778	34.66133	34.87877	40.12999	46.23693	46.41462		

5.243E-07	4.876E-07	4.321E-07	4.173E-07	3.909E-07	3.803E-07	3.528E-07	3.479E-07	3.360E-07	3.265E-07		
47.252	53.770	62.853	63.050	69.397	69.447	71.235	75.135	75.182	80.358		
47.25164	53.77007	62.85333	63.04973	69.39748	69.44658	71.23518	75.13502	75.18178	80.35818		

2.719E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07
1.415E-07 1.367E-07 1.336E-07 1.076E-07
80.531 82.404 89.315 90.882 92.322 93.360
95.336 95.373 96.477 96.657
80.53119 82.40395 89.31518 90.88166 92.32189 93.35998
95.33562 95.37302 96.47659 96.65662

9.605E-08 8.032E-08 6.505E-08 4.918E-08 4.375E-08 3.310E-08
2.491E-08 1.998E-08 1.668E-08 1.253E-08
96.904 97.164 97.351 97.613 97.629 98.347
99.039 99.518 99.785 99.988
96.90445 97.16397 97.35101 97.61287 97.62923 98.34701
99.03906 99.51836 99.78489 99.98830

1.009E-08
100.000
99.99998

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY
3.316E-06	1.000	1.000
2.328E-06	3.000	3.000
1.913E-06	5.000	5.000
1.408E-06	10.000	10.000
1.142E-06	15.000	15.000
9.872E-07	20.000	20.000
8.716E-07	25.000	25.000
7.842E-07	30.000	30.000
7.118E-07	35.000	35.000
6.493E-07	40.000	40.000
5.997E-07	45.000	45.000
5.548E-07	50.000	50.000
5.133E-07	55.000	55.000
4.742E-07	60.000	60.000
4.369E-07	65.000	65.000
4.008E-07	70.000	70.000
3.651E-07	75.000	75.000
3.291E-07	80.000	80.000
1.913E-06	5.0	5.00

K= 17 FIVEXQ(K)= 1.913E-06 FIVEPR(K)= 5.000

FUMIGATION X/Q AT THE BOUNDARY: 4.11E-05

EXPONENTIAL TERM AND FREQUENCIES

9.582E-01	5.200E-01	4.914E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.417	5.067	6.727	16.153	61.158	96.932	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.900E-06 8.835E-06 6.362E-06 6.027E-06 4.813E-06 4.557E-06 4.309E-06 3.312E-06 3.257E-06
0.005 0.009 0.023 0.035 0.077 0.089 0.206 0.271 0.839 1.050
0.00468 0.00935 0.02338 0.03507 0.07716 0.08885 0.20575 0.27121 0.83935 1.04978

3.067E-06 2.308E-06 2.243E-06 2.192E-06 2.166E-06 1.880E-06 1.851E-06 1.696E-06 1.650E-06 1.637E-06
1.342 1.606 3.110 3.528 3.535 4.267 4.524 6.556 7.112 7.206
1.34203 1.60623 3.10958 3.52809 3.53511 4.26691 4.52409 6.55584 7.11229 7.20582

1.546E-06 1.323E-06 1.273E-06 1.161E-06 1.141E-06 1.105E-06 1.102E-06 1.024E-06 9.624E-07 9.350E-07
7.423 8.050 9.289 9.586 15.010 15.534 15.847 16.296 18.181 18.300
7.42325 8.04985 9.28900 9.58594 15.01017 15.53389 15.84719 16.29609 18.18055 18.29979

8.590E-07 8.302E-07 8.296E-07 6.935E-07 6.887E-07 6.684E-07 6.651E-07 6.477E-07 5.752E-07 5.555E-07
25.625 26.415 26.742 27.306 34.388 34.661 34.879 40.130 46.237 46.415
25.62484 26.41510 26.74243 27.30589 34.38780 34.66135 34.87880 40.13002 46.23696 46.41466

5.243E-07 4.876E-07 4.321E-07 4.173E-07 3.909E-07 3.803E-07 3.528E-07 3.479E-07 3.360E-07 3.265E-07
47.252 53.770 62.853 63.050 69.398 69.447 71.235 75.135 75.182 80.358
47.25167 53.77011 62.85336 63.04977 69.39753 69.44662 71.23523 75.13508 75.18183 80.35825

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   2.719E-07   2.656E-07   2.453E-07   2.130E-07   1.975E-07   1.779E-07
1.415E-07   1.367E-07   1.336E-07   1.076E-07
      80.531      82.404      89.315      90.882      92.322      93.360
95.336      95.373      96.477      96.657
    80.53125    82.40401    89.31525    90.88174    92.32198    93.36006
95.33569    95.37309    96.47664    96.65665

   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.904      97.164      97.351      97.613      97.629      98.347
99.039      99.518      99.785      99.988
    96.90450    97.16401    97.35104    97.61291    97.62926    98.34705
99.03910    99.51839    99.78493    99.98832

   1.009E-08
     100.000
   100.00000

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY


                                                                ERROR IN
NORMAL TRANSFORMATION FOR A( 71)= 100.00000

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1     -11.07050 -14.89351  -0.97854
 18  2     -12.63456 -14.11297  -0.64042
 18  3     -12.69491 -14.52729  -0.82753
 18  4     -13.03054 -14.53726  -0.83304
 18  5     -13.31455 -14.56881  -0.85454
 18  6     -13.68351 -14.45505  -0.74474
 18  7     -13.96752 -14.42368  -0.69681
 18  8     -14.24977 -14.40465  -0.62057
 18  9     -14.93482     NUMXQ(K)=  9
    3.316E-06              1.000              1.000
    2.328E-06              3.000              3.000
    1.913E-06              5.000              5.000
    1.408E-06             10.000             10.000
    1.142E-06             15.000             15.000
    9.872E-07             20.000             20.000
    8.716E-07             25.000             25.000
    7.842E-07             30.000             30.000
    7.118E-07             35.000             35.000
    6.493E-07             40.000             40.000
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5.997E-07	45.000	45.000
5.548E-07	50.000	50.000
5.133E-07	55.000	55.000
4.742E-07	60.000	60.000
4.369E-07	65.000	65.000
4.008E-07	70.000	70.000
3.651E-07	75.000	75.000
3.291E-07	80.000	80.000
1.913E-06	5.0	5.00

K= 18 FIVEXQ(K)= 1.913E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-2.89153	0.19169	6.22377
2	-1.87956	3.00837	3.53187
3	-2.69849	0.34828	3.10925
4	-2.62720	0.43046	3.53945
5	-2.57624	0.49942	4.77421
6	-2.67451	0.37420	4.27580
7	-2.98034	0.14398	5.37250
8	-3.12173	0.08990	5.06821
9	-3.04167	0.11764	10.01358
10	-3.17136	0.07587	5.86067
11	-3.11095	0.09325	4.97718
12	-3.19640	0.06958	4.96786
13	-3.08873	0.10051	7.81606
14	-3.08219	0.10275	8.71109
15	-3.12727	0.08823	10.94163
16	-2.96076	0.15345	10.81685

K	HOURS(K)	TOTHRS
1	16.79244	16.79244
2	263.53280	280.32530
3	30.50897	310.83430
4	37.70871	348.54300
5	43.74879	392.29170
6	32.77974	425.07150
7	12.61221	437.68370
8	7.87539	445.55910
9	10.30541	455.86450
10	6.64628	462.51080
11	8.16883	470.67960
12	6.09542	476.77500
13	8.80479	485.57980
14	9.00059	494.58040
15	7.72867	502.30910
16	13.44189	515.75090

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.644E-06	3.667E-09	-0.7282	-12.8135			
					1	8.0	-14.32769
					2	16.0	-14.83242
					3	72.0	-15.92763
					4	624.0	-17.50009
2	1.605E-06	5.544E-09	-0.6760	-12.8736			
					1	8.0	-14.27932
					2	16.0	-14.74789
					3	72.0	-15.76467
					4	624.0	-17.22450

3	1.950E-06	6.113E-09	-0.6876	-12.6710			
					1	8.0	-14.10076
					2	16.0	-14.57735
					3	72.0	-15.61150
					4	624.0	-17.09630
4	2.192E-06	9.153E-09	-0.6534	-12.5776			
					1	8.0	-13.93632
					2	16.0	-14.38921
					3	72.0	-15.37195
					4	624.0	-16.78293
5	2.325E-06	1.325E-08	-0.6163	-12.5447			
					1	8.0	-13.82621
					2	16.0	-14.25337
					3	72.0	-15.18027
					4	624.0	-16.51108
6	2.047E-06	8.780E-09	-0.6502	-12.6485			
					1	8.0	-14.00046
					2	16.0	-14.45112
					3	72.0	-15.42901
					4	624.0	-16.83302
7	1.583E-06	4.891E-09	-0.6893	-12.8781			
					1	8.0	-14.31155
					2	16.0	-14.78936
					3	72.0	-15.82615
					4	624.0	-17.31474
8	1.354E-06	1.744E-09	-0.7936	-12.9622			
					1	8.0	-14.61254
					2	16.0	-15.16263
					3	72.0	-16.35630
					4	624.0	-18.07012
9	1.497E-06	5.149E-09	-0.6765	-12.9430			
					1	8.0	-14.34975
					2	16.0	-14.81867
					3	72.0	-15.83618
					4	624.0	-17.29708
10	1.266E-06	2.566E-09	-0.7395	-13.0673			
					1	8.0	-14.60517
					2	16.0	-15.11779
					3	72.0	-16.23013
					4	624.0	-17.82717
11	1.257E-06	2.237E-09	-0.7551	-13.0630			
					1	8.0	-14.63327
					2	16.0	-15.15669
					3	72.0	-16.29248
					4	624.0	-17.92319
12	1.175E-06	2.160E-09	-0.7512	-13.1332			
					1	8.0	-14.69541
					2	16.0	-15.21614
					3	72.0	-16.34607
					4	624.0	-17.96837
13	1.312E-06	4.657E-09	-0.6727	-13.0778			
					1	8.0	-14.47669
					2	16.0	-14.94298
					3	72.0	-15.95480
					4	624.0	-17.40752
14	1.133E-06	3.423E-09	-0.6920	-13.2109			
					1	8.0	-14.64981
					2	16.0	-15.12945
					3	72.0	-16.17022
					4	624.0	-17.66453

15	1.264E-06	2.038E-09	-0.7668	-13.0496			
					1	8.0	-14.64420
					2	16.0	-15.17573
					3	72.0	-16.32911
					4	624.0	-17.98507
16	1.574E-06	6.232E-09	-0.6597	-12.9048			
					1	8.0	-14.27655
					2	16.0	-14.73382
					3	72.0	-15.72604
					4	624.0	-17.15063
17	1.913E-06	1.325E-08	-0.5930	-12.7557			
					1	8.0	-13.98883
					2	16.0	-14.39988
					3	72.0	-15.29184
					4	624.0	-16.57247
18	1.913E-06	1.325E-08	-0.5930	-12.7557			
					1	8.0	-13.98883
					2	16.0	-14.39988
					3	72.0	-15.29184
					4	624.0	-16.57247

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL
INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT:
97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-
96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316
ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE
1.145

RELATIVE CONCENTRATION (X/Q) VALUES
(SEC/CUBIC METER)
VERSUS
HOURS PER YEAR MAX
AVERAGING TIME
0-2 HR X/Q IS
DOWNWIND DISTANCE
EXCEEDED DOWNWIND
SECTOR (METERS) 0-2 HOURS 0-8 HOURS 8-24 HOURS
1-4 DAYS 4-30 DAYS ANNUAL AVERAGE IN SECTOR SECTOR
S 1000. 1.64E-06 5.99E-07 3.62E-07
1.21E-07 2.51E-08 3.67E-09 16.8 S
SSW 1000. 1.61E-06 6.29E-07 3.94E-07
1.42E-07 3.31E-08 5.54E-09 263.5 SSW
SW 1000. 1.95E-06 7.52E-07 4.67E-07
1.66E-07 3.76E-08 6.11E-09 30.5 SW
WSW 1000. 2.19E-06 8.86E-07 5.63E-07
2.11E-07 5.14E-08 9.15E-09 37.7 WSW
W 1000. 2.32E-06 9.89E-07 6.45E-07
2.55E-07 6.75E-08 1.33E-08 43.7 W
WNW 1000. 2.05E-06 8.31E-07 5.30E-07
1.99E-07 4.89E-08 8.78E-09 32.8 WNW
NW 1000. 1.58E-06 6.09E-07 3.78E-07
1.34E-07 3.02E-08 4.89E-09 12.6 NW
NNW 1000. 1.35E-06 4.51E-07 2.60E-07
7.88E-08 1.42E-08 1.74E-09 7.9 NNW
N 1000. 1.50E-06 5.86E-07 3.67E-07
1.33E-07 3.08E-08 5.15E-09 10.3 N
NNE 1000. 1.27E-06 4.54E-07 2.72E-07
8.94E-08 1.81E-08 2.57E-09 6.6 NNE
NE 1000. 1.26E-06 4.41E-07 2.62E-07
8.40E-08 1.64E-08 2.24E-09 8.2 NE
ENE 1000. 1.18E-06 4.15E-07 2.46E-07
7.96E-08 1.57E-08 2.16E-09 6.1 ENE
E 1000. 1.31E-06 5.16E-07 3.24E-07
1.18E-07 2.75E-08 4.66E-09 8.8 E
ESE 1000. 1.13E-06 4.34E-07 2.69E-07
9.49E-08 2.13E-08 3.42E-09 9.0 ESE
SE 1000. 1.26E-06 4.37E-07 2.57E-07
8.10E-08 1.55E-08 2.04E-09 7.7 SE
SSE 1000. 1.57E-06 6.31E-07 3.99E-07
1.48E-07 3.56E-08 6.23E-09 13.4 SSE
MAX X/Q 2.32E-06
TOTAL HOURS AROUND SITE: 515.8

SRP 2.3.4 1000. 1.91E-06 8.41E-07 5.57E-07

2.28E-07	6.35E-08	1.33E-08		
SITE LIMIT		1.91E-06	8.41E-07	5.57E-07
2.28E-07	6.35E-08	1.33E-08		

THE FIVE-PERCENT-FOR-THE-ENTIRE-SITE X/Q IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

SECTOR	DOWNWIND DISTANCE (METERS)	FUMIGATION X/Q
S	1000.	4.11E-05
SSW	1000.	4.11E-05
SW	1000.	4.11E-05
WSW	1000.	4.11E-05
W	1000.	4.11E-05
WNW	1000.	4.11E-05
NW	1000.	4.11E-05
NNW	1000.	4.11E-05
N	1000.	4.11E-05
NNE	1000.	4.11E-05
NE	1000.	4.11E-05
ENE	1000.	4.11E-05
E	1000.	4.11E-05
ESE	1000.	4.11E-05
SE	1000.	4.11E-05
SSE	1000.	4.11E-05

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY.
CHECK THE REASONABLENESS OF THE ENVELOPES
COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY
FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

```
   1  1111
Peach Bottom                                   Stack Release
97.5 meters         10.1-96.3 meters

Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
   11    1
2584. 54.3131.4 97.5
    0    0    0    2    6    5    0
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   3.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   2.  10.  10.  15.   3.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   5.   6.  10.  23.  59.  25.   2.   0.   0.   1.   2.   0.   0.   0.
0.   1.
   1.   3.  11.  18.  43.  40.  10.   4.   2.   2.   2.   0.   1.   3.
0.   0.
   0.   6.  10.  11.  13.  17.   9.   0.   7.   4.   3.   3.   2.   3.
0.   5.
   0.   1.   2.  13.   8.   3.   9.   0.   4.   3.   0.   6.  13.   7.
3.   4.
   2.   4.   9.  11.   2.   3.   7.   0.   6.   2.   2.   1.  14.   5.
2.  14.
   1.   2.   0.   1.   0.   1.   0.   0.   0.   0.   0.   2.  10.   2.
0.   1.
   1.   0.   0.   0.   0.   1.   0.   0.   0.   0.   0.   1.   6.   5.
1.   1.
   0.   1.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   1.   1.   9.   5.   0.   2.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   1.   7.   5.   8.  21.   5.   1.   0.   0.   0.   0.   0.   1.   0.
1.   0.
  12.  15.   9.  11.  34.  19.   6.   1.   1.   4.   3.   1.   3.   1.
2.   3.
   1.  11.  11.  18.   6.  21.  11.   4.   4.   4.   4.   2.   3.   5.
1.   7.
   2.   5.   4.   2.   5.   9.  13.   5.  17.   9.   6.   5.  13.   2.
1.  12.
   3.   0.   3.   1.   3.   0.   9.   6.  14.   5.   6.   7.  10.   8.
3.  15.
   8.   2.   1.   1.   0.   2.   5.   3.  22.   5.   3.  13.  21.  15.
6.  20.
   1.   3.   0.   0.   0.   1.   1.   1.   6.   1.   1.   2.  11.  12.
5.   6.
   0.   0.   1.   0.   0.   0.   0.   0.   1.   1.   0.   1.   7.  10.
0.   0.
   0.   2.   2.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   3.  10.  14.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   4.   7.  11.  16.  31.  17.   2.   0.   1.   0.   0.   0.   0.   0.
0.   1.
  18.  14.  15.  17.  17.  40.   6.   4.  11.   4.   7.   3.   2.   2.
3.  16.
  26.  12.   8.  11.  10.  21.  26.  13.  20.  13.   9.   4.  16.   6.
8.  35.
  21.   6.   3.   8.   5.  11.  31.  10.  40.  14.  15.  14.  23.  13.
9.  45.
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8. 8. 0. 3. 2. 3. 15. 12. 37. 17. 11. 15. 11. 21.
18. 43.
14. 2. 4. 2. 2. 3. 7. 5. 48. 18. 16. 24. 48. 45.
26. 74.
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22. 14.
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12. 4.
18. 18. 28. 26. 28. 20. 14. 13. 12. 6. 9. 6. 8. 19.
8. 10.
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40. 50.
209. 119. 120. 174. 227. 179. 192. 134. 171. 110. 98. 90. 89. 59.
118. 231.
216. 175. 125. 187. 215. 168. 282. 234. 320. 203. 128. 80. 109. 115.
186. 390.
237. 151. 118. 123. 134. 129. 212. 204. 330. 193. 142. 89. 134. 160.
235. 438.
233. 99. 80. 54. 103. 102. 129. 147. 274. 132. 80. 103. 142. 196.
332. 406.
278. 113. 52. 44. 87. 94. 107. 58. 345. 108. 91. 139. 311. 543.
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21. 15. 15. 20. 24. 17. 26. 16. 26. 16. 17. 19. 30. 17.
23. 11.
39. 29. 21. 41. 36. 43. 35. 43. 44. 40. 42. 35. 24. 19.
16. 23.
50. 43. 35. 51. 65. 48. 90. 69. 60. 65. 63. 36. 42. 23.
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PRINTOUT OF INPUT CARDS

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   1     00010 01111 00000 00000 00000 00000 00000 00000 00000 00000
00000 00000 00000 00000 00000 00000   2     Peach Bottom
Stack Release
   3     97.5 meters         10.1-96.3 meters
   4
   5     Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316
ft Delta T           6         11 42771     1
   7          0.500  2584.000    54.300   131.400    97.500
   8       0.000  0.000  0.000  2.000  6.000  5.000  0.000
   9       0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       0.000  0.000  0.000  0.000  3.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       0.000  2.000 10.000 10.000 15.000  3.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       5.000  6.000 10.000 23.000 59.000 25.000  2.000  0.000  0.000
1.000  2.000  0.000  0.000  0.000  0.000  1.000
   9       1.000  3.000 11.000 18.000 43.000 40.000 10.000  4.000  2.000
2.000  2.000  0.000  1.000  3.000  0.000  0.000
   9       0.000  6.000 10.000 11.000 13.000 17.000  9.000  0.000  7.000
4.000  3.000  3.000  2.000  3.000  0.000  5.000
   9       0.000  1.000  2.000 13.000  8.000  3.000  9.000  0.000  4.000
3.000  0.000  6.000 13.000  7.000  3.000  4.000
   9       2.000  4.000  9.000 11.000  2.000  3.000  7.000  0.000  6.000
2.000  2.000  1.000 14.000  5.000  2.000 14.000
   9       1.000  2.000  0.000  1.000  0.000  1.000  0.000  0.000  0.000
0.000  0.000  2.000 10.000  2.000  0.000  1.000
   9       1.000  0.000  0.000  0.000  0.000  1.000  0.000  0.000  0.000
0.000  0.000  1.000  6.000  5.000  1.000  1.000
   9       0.000  1.000  1.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       0.000  1.000  1.000  9.000  5.000  0.000  2.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       1.000  7.000  5.000  8.000 21.000  5.000  1.000  0.000  0.000
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   9      12.000 15.000  9.000 11.000 34.000 19.000  6.000  1.000  1.000
4.000  3.000  1.000  3.000  1.000  2.000  3.000
   9       1.000 11.000 11.000 18.000  6.000 21.000 11.000  4.000  4.000
4.000  4.000  2.000  3.000  5.000  1.000  7.000
   9       2.000  5.000  4.000  2.000  5.000  9.000 13.000  5.000 17.000
9.000  6.000  5.000 13.000  2.000  1.000 12.000
   9       3.000  0.000  3.000  1.000  3.000  0.000  9.000  6.000 14.000
5.000  6.000  7.000 10.000  8.000  3.000 15.000
   9       8.000  2.000  1.000  1.000  0.000  2.000  5.000  3.000 22.000
5.000  3.000 13.000 21.000 15.000  6.000 20.000
   9       1.000  3.000  0.000  0.000  0.000  1.000  1.000  1.000  6.000
1.000  1.000  2.000 11.000 12.000  5.000  6.000
   9       0.000  0.000  1.000  0.000  0.000  0.000  0.000  0.000  1.000
1.000  0.000  1.000  7.000 10.000  0.000  0.000
   9       0.000  2.000  2.000  1.000  0.000  0.000  0.000  0.000  0.000
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   9       4.000  7.000 11.000 16.000 31.000 17.000  2.000  0.000  1.000
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS A
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22	0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05	1.13	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.55	1.67	0.000	0.000	0.000	0.000	0.007	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.007
2.05	2.21	0.000	0.005	0.023	0.023	0.035	0.007	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.094
3.05	3.28	0.012	0.014	0.023	0.054	0.138	0.058	0.005	0.000	0.000	0.002	0.005	0.000	0.000	0.000	0.000	0.313
4.05	4.36	0.002	0.007	0.026	0.042	0.101	0.094	0.023	0.009	0.005	0.005	0.005	0.000	0.002	0.007	0.000	0.327
5.05	5.44	0.000	0.014	0.023	0.026	0.030	0.040	0.021	0.000	0.016	0.009	0.007	0.007	0.005	0.007	0.000	0.217
6.05	6.52	0.000	0.002	0.005	0.030	0.019	0.007	0.021	0.000	0.009	0.007	0.000	0.014	0.030	0.016	0.007	0.178
8.05	8.67	0.005	0.009	0.021	0.026	0.005	0.007	0.016	0.000	0.014	0.005	0.005	0.002	0.033	0.012	0.005	0.196
10.00	10.77	0.002	0.005	0.000	0.002	0.000	0.002	0.000	0.000	0.000	0.000	0.000	0.005	0.023	0.005	0.000	0.047
24.59	26.49	0.002	0.000	0.000	0.000	0.000	0.002	0.000	0.000	0.000	0.000	0.000	0.002	0.014	0.012	0.002	0.037
TOTAL		0.02	0.06	0.12	0.20	0.33	0.22	0.09	0.01	0.04	0.03	0.02	0.03	0.11	0.06	0.01	1.42

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS B
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22	0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05	1.13	0.000	0.002	0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005
1.55	1.67	0.000	0.002	0.002	0.021	0.012	0.000	0.005	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.042
2.05	2.21	0.002	0.016	0.012	0.019	0.049	0.012	0.002	0.000	0.000	0.000	0.000	0.000	0.002	0.000	0.002	0.117
3.05	3.28	0.028	0.035	0.021	0.026	0.079	0.044	0.014	0.002	0.002	0.009	0.007	0.002	0.007	0.002	0.005	0.292

4.05	4.36	0.002	0.026	0.026	0.042	0.014	0.049	0.026	0.009
0.009	0.009	0.009	0.005	0.007	0.012	0.002	0.016	0.264	
5.05	5.44	0.005	0.012	0.009	0.005	0.012	0.021	0.030	0.012
0.040	0.021	0.014	0.012	0.030	0.005	0.002	0.028	0.257	
6.05	6.52	0.007	0.000	0.007	0.002	0.007	0.000	0.021	0.014
0.033	0.012	0.014	0.016	0.023	0.019	0.007	0.035	0.217	
8.05	8.67	0.019	0.005	0.002	0.002	0.000	0.005	0.012	0.007
0.051	0.012	0.007	0.030	0.049	0.035	0.014	0.047	0.297	
10.00	10.77	0.002	0.007	0.000	0.000	0.000	0.002	0.002	0.002
0.014	0.002	0.002	0.005	0.026	0.028	0.012	0.014	0.119	
24.59	26.49	0.000	0.000	0.002	0.000	0.000	0.000	0.000	0.000
0.002	0.002	0.000	0.002	0.016	0.023	0.000	0.000	0.049	
TOTAL		0.07	0.11	0.08	0.12	0.17	0.13	0.11	0.05
0.15	0.07	0.05	0.07	0.16	0.12	0.04	0.15	1.66	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS C
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
1.05	1.13	0.000	0.005	0.005	0.002	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.012	
1.55	1.67	0.000	0.007	0.023	0.033	0.002	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.065	
2.05	2.21	0.009	0.016	0.026	0.037	0.072	0.040	0.005	0.000
0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.002	0.210	
3.05	3.28	0.042	0.033	0.035	0.040	0.040	0.094	0.014	0.009
0.026	0.009	0.016	0.007	0.005	0.005	0.007	0.037	0.419	
4.05	4.36	0.061	0.028	0.019	0.026	0.023	0.049	0.061	0.030
0.047	0.030	0.021	0.009	0.037	0.014	0.019	0.082	0.556	
5.05	5.44	0.049	0.014	0.007	0.019	0.012	0.026	0.072	0.023
0.094	0.033	0.035	0.033	0.054	0.030	0.021	0.105	0.627	
6.05	6.52	0.019	0.019	0.000	0.007	0.005	0.007	0.035	0.028
0.087	0.040	0.026	0.035	0.026	0.049	0.042	0.101	0.524	
8.05	8.67	0.033	0.005	0.009	0.005	0.005	0.007	0.016	0.012
0.112	0.042	0.037	0.056	0.112	0.105	0.061	0.173	0.790	
10.00	10.77	0.009	0.002	0.000	0.000	0.002	0.005	0.000	0.002
0.023	0.000	0.007	0.007	0.068	0.063	0.051	0.033	0.274	
24.59	26.49	0.002	0.007	0.000	0.000	0.000	0.000	0.000	0.000
0.002	0.000	0.005	0.005	0.037	0.077	0.028	0.009	0.173	
TOTAL		0.22	0.14	0.12	0.17	0.16	0.23	0.20	0.11
0.39	0.15	0.15	0.15	0.34	0.34	0.23	0.54	3.65	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS D
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.24	0.000	0.000	0.001	0.001	0.001	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005	
1.05	1.13	0.042	0.042	0.065	0.061	0.065	0.047	0.033	0.030
0.028	0.014	0.021	0.014	0.019	0.044	0.019	0.023	0.568	
1.55	1.67	0.096	0.094	0.187	0.217	0.203	0.154	0.072	0.051
0.068	0.040	0.054	0.021	0.042	0.044	0.065	0.094	1.503	
2.05	2.21	0.157	0.124	0.182	0.231	0.304	0.180	0.126	0.117
0.091	0.072	0.065	0.056	0.070	0.044	0.094	0.117	2.032	

3.05	3.28	0.489	0.278	0.281	0.407	0.531	0.419	0.449	0.313
0.400	0.257	0.229	0.210	0.208	0.138	0.276	0.540	5.424	
4.05	4.36	0.505	0.409	0.292	0.437	0.503	0.393	0.659	0.547
0.748	0.475	0.299	0.187	0.255	0.269	0.435	0.912	7.325	
5.05	5.44	0.554	0.353	0.276	0.288	0.313	0.302	0.496	0.477
0.772	0.451	0.332	0.208	0.313	0.374	0.549	1.024	7.082	
6.05	6.52	0.545	0.231	0.187	0.126	0.241	0.238	0.302	0.344
0.641	0.309	0.187	0.241	0.332	0.458	0.776	0.949	6.107	
8.05	8.67	0.650	0.264	0.122	0.103	0.203	0.220	0.250	0.136
0.807	0.253	0.213	0.325	0.727	1.270	1.920	1.623	9.083	
10.00	10.77	0.161	0.065	0.030	0.026	0.056	0.056	0.035	0.023
0.224	0.049	0.035	0.047	0.493	0.917	1.143	0.538	3.900	
24.59	26.49	0.058	0.023	0.023	0.005	0.042	0.016	0.019	0.002
0.094	0.014	0.012	0.028	0.290	0.531	0.599	0.220	1.976	
TOTAL		3.26	1.88	1.65	1.90	2.46	2.03	2.44	2.04
3.87	1.93	1.45	1.34	2.75	4.09	5.88	6.04	45.00	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS E
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.26	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001
0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.000	0.014	
1.05	1.22	0.049	0.035	0.035	0.047	0.056	0.040	0.061	0.037
0.061	0.037	0.040	0.044	0.070	0.040	0.054	0.026	0.732	
1.55	1.80	0.091	0.068	0.049	0.096	0.084	0.101	0.082	0.101
0.103	0.094	0.098	0.082	0.056	0.044	0.037	0.054	1.239	
2.05	2.38	0.117	0.101	0.082	0.119	0.152	0.112	0.210	0.161
0.140	0.152	0.147	0.084	0.098	0.054	0.070	0.084	1.884	
3.05	3.54	0.320	0.215	0.213	0.323	0.393	0.264	0.435	0.411
0.615	0.458	0.383	0.260	0.238	0.192	0.262	0.269	5.251	
4.05	4.70	0.414	0.306	0.222	0.203	0.288	0.313	0.479	0.547
1.010	0.638	0.447	0.271	0.281	0.271	0.360	0.468	6.518	
5.05	5.86	0.421	0.185	0.161	0.094	0.159	0.271	0.355	0.456
0.989	0.601	0.386	0.348	0.451	0.376	0.596	0.498	6.348	
6.05	7.02	0.238	0.070	0.058	0.021	0.087	0.143	0.206	0.332
0.664	0.426	0.231	0.367	0.498	0.542	0.648	0.645	5.176	
8.05	9.35	0.257	0.061	0.040	0.014	0.091	0.108	0.161	0.241
0.858	0.351	0.372	0.414	0.975	1.031	1.153	0.786	6.911	
10.00	11.61	0.056	0.023	0.007	0.009	0.026	0.047	0.037	0.026
0.168	0.044	0.063	0.089	0.206	0.290	0.236	0.112	1.440	
24.59	28.54	0.019	0.002	0.014	0.002	0.049	0.007	0.021	0.002
0.021	0.005	0.005	0.005	0.023	0.028	0.023	0.033	0.260	
TOTAL		1.98	1.07	0.88	0.93	1.39	1.41	2.05	2.32
4.63	2.81	2.17	1.96	2.90	2.87	3.44	2.97	35.77	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS F
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.26	0.001	0.000	0.001	0.001	0.001	0.001	0.001	0.001
0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.000	0.012	
1.05	1.22	0.037	0.016	0.030	0.023	0.026	0.028	0.023	0.028
0.028	0.028	0.035	0.035	0.033	0.030	0.030	0.016	0.449	
1.55	1.80	0.023	0.028	0.021	0.037	0.047	0.026	0.042	0.047
0.026	0.047	0.040	0.042	0.037	0.035	0.030	0.035	0.563	

2.05	2.38	0.061	0.030	0.033	0.023	0.030	0.042	0.063	0.079
0.077	0.068	0.063	0.084	0.051	0.042	0.042	0.047	0.837	
3.05	3.54	0.124	0.044	0.042	0.040	0.035	0.065	0.101	0.103
0.175	0.208	0.231	0.150	0.101	0.091	0.140	0.138	1.789	
4.05	4.70	0.145	0.044	0.016	0.023	0.033	0.042	0.087	0.075
0.208	0.168	0.245	0.180	0.206	0.115	0.161	0.124	1.873	
5.05	5.86	0.068	0.021	0.014	0.000	0.012	0.026	0.042	0.108
0.108	0.108	0.154	0.199	0.199	0.173	0.203	0.133	1.566	
6.05	7.02	0.028	0.009	0.007	0.000	0.000	0.005	0.016	0.035
0.094	0.044	0.072	0.133	0.199	0.129	0.157	0.110	1.038	
8.05	9.35	0.005	0.000	0.000	0.000	0.000	0.002	0.009	0.014
0.056	0.047	0.054	0.187	0.299	0.243	0.143	0.044	1.104	
10.00	11.61	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.002	0.007	0.002	0.049	0.054	0.054	0.000	0.012	0.180	
24.59	28.54	0.002	0.000	0.000	0.000	0.009	0.000	0.000	0.000
0.000	0.000	0.000	0.002	0.002	0.000	0.000	0.000	0.016	
TOTAL		0.49	0.19	0.16	0.15	0.19	0.24	0.38	0.49
0.77	0.73	0.90	1.06	1.18	0.91	0.91	0.66	9.43	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS G
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.26	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
1.05	1.22	0.016	0.021	0.014	0.014	0.019	0.005	0.002	0.016
0.019	0.019	0.002	0.023	0.019	0.019	0.016	0.023	0.248	
1.55	1.80	0.009	0.012	0.012	0.009	0.012	0.007	0.007	0.005
0.021	0.002	0.012	0.019	0.012	0.014	0.014	0.021	0.187	
2.05	2.38	0.009	0.021	0.012	0.009	0.012	0.002	0.026	0.009
0.019	0.021	0.014	0.019	0.016	0.019	0.026	0.028	0.262	
3.05	3.54	0.082	0.019	0.035	0.030	0.016	0.012	0.028	0.012
0.051	0.044	0.051	0.044	0.058	0.051	0.103	0.079	0.718	
4.05	4.70	0.040	0.007	0.012	0.009	0.007	0.002	0.019	0.007
0.014	0.037	0.084	0.058	0.065	0.061	0.124	0.145	0.692	
5.05	5.86	0.016	0.009	0.002	0.000	0.000	0.002	0.009	0.007
0.019	0.009	0.037	0.094	0.063	0.047	0.096	0.068	0.479	
6.05	7.02	0.000	0.000	0.000	0.000	0.000	0.000	0.005	0.002
0.002	0.012	0.023	0.054	0.087	0.023	0.040	0.019	0.267	
8.05	9.35	0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.002
0.002	0.000	0.012	0.033	0.056	0.075	0.012	0.009	0.203	
10.00	11.61	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.005	0.002	0.005	0.000	0.000	0.012	
24.59	28.54	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
TOTAL		0.18	0.09	0.09	0.07	0.07	0.03	0.10	0.06
0.15	0.14	0.24	0.35	0.38	0.31	0.43	0.39	3.07	

WIND MEASURED AT 97.5 METERS.
WIND SPEED CORRECTED TO THE RELEASE HEIGHT OF 131.4 METERS.

OVERALL WIND DIRECTION FREQUENCY

WIND DIRECTION:	N	NNE	NE	ENE	E	ESE	SE	SSE
S SSW SW WSW	W	WNW	NW	NNW				
FREQUENCY:	6.2	3.5	3.1	3.5	4.8	4.3	5.4	5.1
10.0 5.9 5.0 5.0	7.8	8.7	10.9	10.8				

OVERALL WIND SPEED FREQUENCY AS MEASURED ON THE TOWER:
MAX.WIND SPEED (M/S): 0.224 1.051 1.551 2.052 3.049 4.050
5.052 6.048 8.051 10.000 24.587
WIND SPEED FREQUENCY: 0.03 2.01 3.61 5.44 14.21 17.56 16.58
13.51 18.59 5.97 2.51

BUILDING AND RELEASE CHARACTERISTICS:
RELEASE HEIGHT: 131.40 METERS
MIXING VOLUME COEFFICIENT: 0.50
BUILDING CROSS-SECTIONAL AREA: 2584.00 SQUARE METERS

BOUNDARY DISTANCES (METERS) FROM THE SOURCE FOR EACH DOWNWIND SECTOR:

DOWNWIND SECTOR	S	SSW	SW	WSW	W	WNW	NW	NNW	N	NNE	NE	ENE	E	ESE	SE	SSE
BOUNDARY 1	1500.	1500.	1500.	1500.	1500.	1500.	1500.	1500.	1500.	1500.	1500.	1500.	1500.	1500.	1500.	1500.
BOUNDARY 2	2000.	2000.	2000.	2000.	2000.	2000.	2000.	2000.	2000.	2000.	2000.	2000.	2000.	2000.	2000.	2000.

DISTANCES AND TERRAIN HEIGHTS (IN METERS) AS A FUNCTION OF THE DOWNWIND SECTOR:

SECTOR	S	SSW	SW	WSW	W	WNW	NW	NNW	N	NNE	NE	ENE	E	ESE	SE	SSE
DISTANCE	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.
ELEVATION	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.

THE CONVERSION FACTOR APPLIED TO THE WIND SPEED CLASSES IS 0.447

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

WINDSPEEDS ADJUSTED TO 131.4 METERS.

PERCENT OF THE TIME A GIVEN WINDSPEED IS LOWER:

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.24	0.00
0.26	0.03
1.13	0.61
1.22	2.04
1.67	3.66
1.80	5.65
2.21	8.10
2.38	11.09
3.28	17.54
3.54	25.29
4.36	33.77
4.70	42.85
5.44	51.03
5.86	59.43
6.52	66.45
7.02	72.93
8.67	83.30
9.35	91.52
10.77	95.86
11.61	97.49
26.49	99.72
28.54	100.00

WINDSPEED (INTERPOLATED) (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.26	0.03
1.19	2.04
1.74	5.65
2.30	11.09
3.42	25.29
4.54	42.85
5.66	59.43
6.76	72.93
8.97	91.52
11.00	97.49
26.72	100.00

LOG-NORMAL INTERPOLATION PERCENTILES

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.87	1.00
1.37	3.00
1.66	5.00
2.20	10.00
2.63	15.00
3.02	20.00
3.40	25.00
3.72	30.00
4.03	35.00
4.35	40.00
4.67	45.00
4.99	50.00
5.33	55.00
5.70	60.00
6.07	65.00
6.49	70.00
6.92	75.00
7.36	80.00
8.05	85.00
8.67	90.00

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.19	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	3.556E-07
A	4.4	0.04	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	8.7	0.08	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
A	10.8	0.04	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.084E-07
A	26.5	0.04	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	4.410E-08
B	2.2	0.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	3.086E-06
B	3.3	0.45	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.08	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.11	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.30	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
C	2.2	0.15	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	3.498E-06
C	3.3	0.68	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.98	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.79	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.30	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06
C	8.7	0.53	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	8.916E-07

C	10.8	0.15	1500.	0.	131.	154.3
88.4	0.0	0.000E+00	0.000E+00	7.178E-07		
C	26.5	0.04	1500.	0.	131.	154.3
88.4	0.0	0.000E+00	0.000E+00	2.919E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	7.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.11	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	8.90	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	8.75	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	10.44	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	2.59	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.94	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.15	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	3.83	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.13	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.90	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.30	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.99	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.33	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.09	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.08	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	28.5	0.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.31	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.64	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	9.3	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.498E-06 3.312E-06 3.086E-06 2.354E-06 2.243E-06 2.077E-06 1.880E-06
0.006 0.021 0.036 0.187 0.863 0.900 1.577 3.117 3.568 4.356
0.00035 0.00129 0.00226 0.01161 0.05370 0.05604 0.09812 0.19398 0.22204 0.27114

1.772E-06 1.696E-06 1.563E-06 1.421E-06 1.273E-06 1.253E-06 1.187E-06 1.141E-06 1.047E-06 1.024E-06
5.333 7.850 7.888 8.677 10.142 10.217 10.517 18.369 18.481 19.082
0.33192 0.48857 0.49091 0.54001 0.63119 0.63587 0.65457 1.14322 1.15024 1.18764

9.624E-07 8.916E-07 8.590E-07 7.864E-07 7.178E-07 6.935E-07 6.887E-07 6.477E-07 6.331E-07 5.752E-07
20.961 21.487 29.601 29.901 30.052 30.427 39.331 44.477 44.515 53.268
1.30455 1.33728 1.84229 1.86100 1.87035 1.89373 2.44784 2.76815 2.77049 3.31525

5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.556E-07 3.528E-07 3.479E-07 3.265E-07 2.919E-07 2.677E-07
54.244 60.894 71.337 78.099 78.287 80.278 82.870 86.702 86.739 86.777
3.37604 3.78988 4.43985 4.86069 4.87238 4.99630 5.15762 5.39610 5.39844 5.40078

2.656E-07 2.453E-07 2.130E-07 1.975E-07 1.779E-07 1.415E-07 1.347E-07 1.336E-07 1.084E-07 9.605E-08
89.106 93.238 94.328 95.229 95.680 96.619 96.694 96.769 96.807 97.070
5.54574 5.80292 5.87072 5.92684 5.95489 6.01334 6.01802 6.02270 6.02504 6.04140

```
   8.032E-08   6.505E-08   4.918E-08   4.410E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.253E-08
      97.370      97.521      97.671      97.708      97.746      99.061
99.700      99.962     100.000
     6.06011     6.06946     6.07881     6.08115     6.08349     6.16532
6.20506     6.22143     6.22377

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.194
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.142
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.840
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.312
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.436

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  1  1     -11.07050 -16.48812  -1.20504
  1  2     -13.00780 -15.66609  -0.92042
  1  3     -13.28753 -16.60900  -1.28529
  1  4     -13.68351 -17.11795  -1.50889
  1  5     -13.96752 -17.30163  -1.59686
  1  6     -14.36856 -18.27124  -2.12476
  1  7     -14.65458     NUMXQ(K)=  7
    3.381E-06              0.062              1.000
    2.275E-06              0.187              3.000
    1.950E-06              0.311              5.000
    1.521E-06              0.622             10.000
    1.259E-06              0.934             15.000
    1.086E-06              1.245             20.000
    9.519E-07              1.556             25.000
    8.515E-07              1.867             30.000
    7.691E-07              2.178             35.000
    7.027E-07              2.490             40.000
    6.479E-07              2.801             45.000
    6.017E-07              3.112             50.000
    5.579E-07              3.423             55.000
    5.129E-07              3.734             60.000
    4.741E-07              4.045             65.000
    4.404E-07              4.357             70.000
```

```
    1.678E-06              0.5                8.03

ANNUAL AVERAGE =   5.80E-09

K=  1     FIVEXQ(K)= 1.678E-06     FIVEPR(K)= 8.034

FUMIGATION X/Q AT THE BOUNDARY:   2.85E-05

 EXPONENTIAL TERM AND FREQUENCIES

   9.914E-01   7.442E-01   3.613E-01   3.314E-01   2.419E-01   2.081E-01
1.693E-02
       0.376       1.428       9.370      12.976      65.311      97.183
100.000
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.13	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	5.284E-07
A	3.3	0.40	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	3.556E-07
A	4.4	0.20	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.40	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.07	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.26	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
A	10.8	0.13	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.084E-07
B	1.1	0.07	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.027E-06
B	1.7	0.07	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	4.081E-06
B	2.2	0.46	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	3.086E-06
B	3.3	0.99	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.73	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.33	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	8.7	0.13	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.20	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
C	1.1	0.13	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	6.833E-06
C	1.7	0.20	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	4.627E-06
C	2.2	0.46	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	3.498E-06

C	3.3	0.93	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	2.354E-06			
C	4.4	0.79	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	1.772E-06			
C	5.4	0.40	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	1.421E-06			
C	6.5	0.53	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	1.187E-06			
C	8.7	0.13	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	8.916E-07			
C	10.8	0.07	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	7.178E-07			
C	26.5	0.20	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	2.919E-07			
D	0.2	0.01	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	1.19	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	2.65	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	3.51	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	7.88	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	11.58	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	10.00	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	6.55	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	7.48	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	1.85	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	0.66	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.02	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	0.99	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	1.92	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	2.85	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	6.09	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	8.67	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	5.23	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			
E	7.0	1.99	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	1.72	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	0.66	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	0.07	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			

```
   F          0.3        0.01     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   4.813E-06
   F          1.2        0.46     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   1.024E-06
   F          1.8        0.79     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   6.935E-07
   F          2.4        0.86     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   5.243E-07
   F          3.5        1.26     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   3.528E-07
   F          4.7        1.26     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   2.656E-07
   F          5.9        0.60     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   2.130E-07
   F          7.0        0.26     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   1.779E-07

   G          1.2        0.60     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   9.605E-08
   G          1.8        0.33     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   6.505E-08
   G          2.4        0.60     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   4.918E-08
   G          3.5        0.53     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   3.310E-08
   G          4.7        0.20     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   2.491E-08
   G          5.9        0.26     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 6.833E-06 6.027E-06 4.813E-06 4.627E-06 4.081E-06 3.498E-06 3.312E-06 3.086E-06
0.010 0.029 0.161 0.227 0.240 0.438 0.504 0.968 2.159 2.623
0.00035 0.00102 0.00569 0.00803 0.00846 0.01547 0.01781 0.03418 0.07626 0.09263

2.354E-06 2.243E-06 2.077E-06 1.880E-06 1.772E-06 1.696E-06 1.563E-06 1.421E-06 1.273E-06 1.253E-06
3.549 6.197 7.190 8.183 8.978 12.486 13.214 13.612 15.531 15.862
0.12536 0.21888 0.25395 0.28902 0.31708 0.44100 0.46671 0.48074 0.54854 0.56023

1.187E-06 1.141E-06 1.024E-06 9.624E-07 8.916E-07 8.590E-07 7.864E-07 7.178E-07 6.935E-07 6.887E-07
16.392 24.269 24.733 27.579 27.712 39.296 39.429 39.495 40.289 50.285
0.57894 0.85716 0.87353 0.97407 0.97874 1.38790 1.39257 1.39491 1.42297 1.77601

6.477E-07 6.331E-07 5.752E-07 5.284E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.556E-07 3.528E-07
56.375 56.574 63.128 63.260 64.121 72.793 80.273 85.503 85.900 87.158
1.99111 1.99812 2.22959 2.23427 2.26466 2.57094 2.83514 3.01985 3.03387 3.07830

3.479E-07 3.265E-07 2.919E-07 2.677E-07 2.656E-07 2.453E-07 2.146E-07 2.130E-07 1.975E-07 1.793E-07
89.011 90.997 91.196 91.394 92.652 94.373 94.770 95.366 96.028 96.094
3.14376 3.21390 3.22092 3.22793 3.27235 3.33314 3.34717 3.36821 3.39159 3.39393

```
   1.779E-07   1.415E-07   1.347E-07   1.084E-07   9.605E-08   8.032E-08
6.505E-08   4.918E-08   3.310E-08   2.491E-08
      96.359      97.021      97.286      97.418      98.014      98.080
98.411      99.007      99.537      99.735
     3.40328     3.42666     3.43601     3.44069     3.46173     3.46407
3.47576     3.49680     3.51551     3.52252

   1.998E-08
     100.000
     3.53187

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.076
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.440
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.856
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.386
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.989
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.227

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1     -11.07050 -16.31873  -1.16736
  2  2     -12.61806 -16.47149  -1.21555
  2  3     -13.28753 -17.69550  -1.68284
  2  4     -13.68351 -17.38510  -1.55265
  2  5     -13.96752 -18.24911  -1.94517
  2  6     -14.24977 -19.43431  -2.52163
  2  7     -14.36856     NUMXQ(K)=  7
    4.267E-06             0.035             1.000
    2.944E-06             0.106             3.000
    2.436E-06             0.177             5.000
    1.857E-06             0.353            10.000
    1.524E-06             0.530            15.000
    1.285E-06             0.706            20.000
    1.122E-06             0.883            25.000
    1.009E-06             1.060            30.000
    9.212E-07             1.236            35.000
    8.474E-07             1.413            40.000
```

7.739E-07	1.589	45.000
7.127E-07	1.766	50.000
6.607E-07	1.943	55.000
6.069E-07	2.119	60.000
1.577E-06	0.5	14.16

ANNUAL AVERAGE = 6.04E-09

K= 2 FIVEXQ(K)= 1.577E-06 FIVEPR(K)=14.157

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
1.589	4.568	10.074	13.914	67.279	97.484
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	2.2	0.75	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	5.284E-07
A	3.3	0.75	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	3.556E-07
A	4.4	0.83	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.75	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.15	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.68	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
B	1.1	0.08	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.027E-06
B	1.7	0.08	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	4.081E-06
B	2.2	0.38	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	3.086E-06
B	3.3	0.68	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.83	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.30	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.23	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.08	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	26.5	0.08	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.575E-07
C	1.1	0.15	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	6.833E-06
C	1.7	0.75	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	4.627E-06
C	2.2	0.83	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	3.498E-06

C	3.3	1.13	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	2.354E-06			
C	4.4	0.60	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	1.772E-06			
C	5.4	0.23	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	1.421E-06			
C	8.7	0.30	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	8.916E-07			
D	0.2	0.02	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	2.11	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	6.02	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	5.87	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	9.02	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	9.40	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	8.87	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	6.02	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	3.91	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	0.98	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	0.75	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.02	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	1.13	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	1.58	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	2.63	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	6.84	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	7.14	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	5.19	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			
E	7.0	1.88	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	1.28	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	0.23	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	0.45	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			
F	0.3	0.03	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.813E-06			
F	1.2	0.98	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.024E-06			
F	1.8	0.68	90000.	0.	131.	1000.0	

92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.35	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.53	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
G	1.2	0.45	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.833E-06	6.027E-06	4.813E-06	4.627E-06	4.081E-06	3.498E-06	3.312E-06	3.086E-06
0.017	0.039	0.189	0.265	0.290	1.042	1.117	1.944	4.050	4.426
0.00054	0.00121	0.00589	0.00823	0.00902	0.03240	0.03474	0.06045	0.12592	0.13761

2.354E-06	2.243E-06	2.077E-06	1.880E-06	1.772E-06	1.696E-06	1.563E-06	1.421E-06	1.273E-06	1.253E-06
5.554	11.569	12.246	13.374	13.976	19.841	20.668	20.894	22.473	22.774
0.17268	0.35972	0.38076	0.41583	0.43454	0.61691	0.64262	0.64964	0.69874	0.70809

1.141E-06	1.047E-06	1.024E-06	9.624E-07	8.916E-07	8.590E-07	7.864E-07	6.935E-07	6.887E-07	6.477E-07
31.797	32.023	33.000	35.632	35.933	45.332	45.408	46.084	54.958	61.800
0.98865	0.99567	1.02606	1.10789	1.11724	1.40950	1.41184	1.43288	1.70877	1.92153

5.752E-07	5.284E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.556E-07	3.528E-07	3.479E-07	3.265E-07
67.816	68.568	69.621	76.764	80.675	85.863	86.615	87.969	88.946	90.826
2.10857	2.13195	2.16468	2.38680	2.50837	2.66970	2.69308	2.73516	2.76556	2.82401

2.677E-07	2.656E-07	2.575E-07	2.453E-07	2.146E-07	2.130E-07	1.975E-07	1.793E-07	1.779E-07	1.415E-07
91.653	92.180	92.255	93.533	94.285	94.736	94.962	95.112	95.338	96.090
2.84973	2.86609	2.86843	2.90818	2.93156	2.94559	2.95260	2.95728	2.96429	2.98767

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   1.347E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08
      96.767      97.218      97.669      98.045      98.421      99.549
99.925     100.000
     3.00871     3.02274     3.03677     3.04846     3.06015     3.09522
3.10691     3.10925

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.126
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.359
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.616
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.987
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.408
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.919
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.106

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  3  1     -11.07050 -16.00768  -1.12185
  3  2     -12.61806 -16.15071  -1.16920
  3  3     -13.00780 -17.06455  -1.50915
  3  4     -13.28753 -19.06018  -2.30653
  3  5     -13.68351 -18.55190  -2.08848
  3  6     -13.96752 -18.94789  -2.26888
  3  7     -14.24977 -20.65343  -3.09255
  3  8     -14.36856     NUMXQ(K)=  8
    5.191E-06              0.031              1.000
    3.662E-06              0.093              3.000
    3.072E-06              0.155              5.000
    2.373E-06              0.311             10.000
    1.964E-06              0.466             15.000
    1.684E-06              0.622             20.000
    1.400E-06              0.777             25.000
    1.200E-06              0.933             30.000
    1.058E-06              1.088             35.000
    9.510E-07              1.244             40.000
    8.642E-07              1.399             45.000
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7.867E-07	1.555	50.000
7.214E-07	1.710	55.000
6.658E-07	1.866	60.000
6.074E-07	2.021	65.000
1.894E-06	0.5	16.08

ANNUAL AVERAGE = 6.53E-09

K= 3 FIVEXQ(K)= 1.894E-06 FIVEPR(K)=16.081

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
3.910	6.617	11.906	15.892	68.847	97.218
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED				
			AT 131.4 METERS						
CA=1292.SQ.METERS									
A	2.2	0.66	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	5.284E-07								
A	3.3	1.52	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	3.556E-07								
A	4.4	1.19	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	2.677E-07								
A	5.4	0.73	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	2.146E-07								
A	6.5	0.86	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	1.793E-07								
A	8.7	0.73	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	1.347E-07								
A	10.8	0.07	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	1.084E-07								
B	1.7	0.59	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	4.081E-06								
B	2.2	0.53	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	3.086E-06								
B	3.3	0.73	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	2.077E-06								
B	4.4	1.19	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	1.563E-06								
B	5.4	0.13	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	1.253E-06								
B	6.5	0.07	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	1.047E-06								
B	8.7	0.07	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	7.864E-07								
C	1.1	0.07	1500.	0.	131.	154.3	88.4	0.0	0.000E+00
0.000E+00	6.833E-06								
C	1.7	0.92	1500.	0.	131.	154.3	88.4	0.0	0.000E+00
0.000E+00	4.627E-06								
C	2.2	1.06	1500.	0.	131.	154.3	88.4	0.0	0.000E+00
0.000E+00	3.498E-06								
C	3.3	1.12	1500.	0.	131.	154.3	88.4	0.0	0.000E+00
0.000E+00	2.354E-06								

C	4.4	0.73	1500.	0.	131.	154.3
88.4	0.0	0.000E+00	0.000E+00	1.772E-06		
C	5.4	0.53	1500.	0.	131.	154.3
88.4	0.0	0.000E+00	0.000E+00	1.421E-06		
C	6.5	0.20	1500.	0.	131.	154.3
88.4	0.0	0.000E+00	0.000E+00	1.187E-06		
C	8.7	0.13	1500.	0.	131.	154.3
88.4	0.0	0.000E+00	0.000E+00	8.916E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	1.72	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	6.14	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	6.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	11.49	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	12.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	8.12	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.91	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.73	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.13	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.03	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	1.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	2.71	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.37	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	9.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	5.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	2.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	0.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	0.40	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.07	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	1.06	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
G	1.2	0.40	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.833E-06	4.813E-06	4.627E-06	4.081E-06	3.498E-06	3.312E-06	3.086E-06	2.354E-06		
0.014	0.039	0.106	0.123	1.048	1.642	2.699	4.416	4.945	6.068		
0.00050	0.00140	0.00373	0.00434	0.03708	0.05812	0.09553	0.15632	0.17502	0.21477		

2.243E-06	2.077E-06	1.880E-06	1.772E-06	1.696E-06	1.563E-06	1.421E-06	1.273E-06	1.253E-06	1.187E-06		
12.211	12.938	14.259	14.985	21.525	22.714	23.242	25.951	26.083	26.281		
0.43220	0.45792	0.50468	0.53040	0.76187	0.80395	0.82266	0.91851	0.92319	0.93020		

1.141E-06	1.047E-06	1.024E-06	9.624E-07	8.916E-07	8.590E-07	7.864E-07	6.935E-07	6.887E-07	6.477E-07		
37.775	37.841	38.501	41.870	42.002	54.355	54.421	55.478	63.603	72.719		
1.33702	1.33936	1.36274	1.48198	1.48666	1.92387	1.92621	1.96362	2.25119	2.57384		

5.752E-07	5.284E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.556E-07	3.528E-07	3.479E-07	3.265E-07		
76.286	76.946	77.607	83.354	86.260	88.903	90.422	91.545	92.271	92.866		
2.70010	2.72348	2.74686	2.95026	3.05314	3.14666	3.20043	3.24018	3.26590	3.28694		

2.677E-07	2.656E-07	2.453E-07	2.146E-07	1.975E-07	1.793E-07	1.415E-07	1.347E-07	1.084E-07	9.605E-08		
94.055	94.715	95.112	95.838	96.103	96.961	97.094	97.820	97.886	98.283		
3.32903	3.35241	3.36643	3.39215	3.40151	3.43190	3.43658	3.46229	3.46463	3.47866		

8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08
98.349	98.613	98.877	99.736	100.000
3.48100	3.49035	3.49970	3.53010	3.53945

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.156
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.432
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.761
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.336
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.922
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.571
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.947
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
4	1	-11.07050	-15.74727	-1.05882
4	2	-12.61806	-16.11750	-1.18410
4	3	-13.00780	-16.69749	-1.40494
4	4	-13.28753	-17.83410	-1.87324
4	5	-13.68351	-18.00686	-1.95121
4	6	-13.96752	-18.74677	-2.30862
4	7	-14.24977	-23.57303	-4.78628
4	8	-14.53378		

NUMXQ(K)= 8

5.229E-06	0.035	1.000
3.750E-06	0.106	3.000
3.164E-06	0.177	5.000
2.429E-06	0.354	10.000
2.030E-06	0.531	15.000
1.760E-06	0.708	20.000
1.530E-06	0.885	25.000
1.347E-06	1.062	30.000
1.206E-06	1.239	35.000
1.092E-06	1.416	40.000
9.973E-07	1.593	45.000
9.181E-07	1.770	50.000
8.494E-07	1.947	55.000
7.816E-07	2.124	60.000

7.233E-07	2.301	65.000
6.726E-07	2.478	70.000
6.078E-07	2.655	75.000
5.315E-07	2.832	80.000
2.091E-06	0.5	14.13

ANNUAL AVERAGE = 8.92E-09

K= 4 FIVEXQ(K)= 2.091E-06 FIVEPR(K)=14.126

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
5.747	9.050	13.228	17.985	71.703	97.952
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.7	0.15	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	6.990E-07								
A	2.2	0.73	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	5.284E-07								
A	3.3	2.89	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	3.556E-07								
A	4.4	2.11	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	2.677E-07								
A	5.4	0.64	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	2.146E-07								
A	6.5	0.39	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	1.793E-07								
A	8.7	0.10	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00
0.000E+00	1.347E-07								
B	1.7	0.24	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	4.081E-06								
B	2.2	1.03	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	3.086E-06								
B	3.3	1.67	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	2.077E-06								
B	4.4	0.29	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	1.563E-06								
B	5.4	0.24	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	1.253E-06								
B	6.5	0.15	1500.	0.	131.	203.2	170.9	0.0	0.000E+00
0.000E+00	1.047E-06								
C	1.7	0.05	1500.	0.	131.	154.3	88.4	0.0	0.000E+00
0.000E+00	4.627E-06								
C	2.2	1.52	1500.	0.	131.	154.3	88.4	0.0	0.000E+00
0.000E+00	3.498E-06								
C	3.3	0.83	1500.	0.	131.	154.3	88.4	0.0	0.000E+00
0.000E+00	2.354E-06								
C	4.4	0.49	1500.	0.	131.	154.3	88.4	0.0	0.000E+00
0.000E+00	1.772E-06								
C	5.4	0.24	1500.	0.	131.	154.3	88.4	0.0	0.000E+00
0.000E+00	1.421E-06								

C	6.5	0.10	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	1.187E-06			
C	8.7	0.10	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	8.916E-07			
C	10.8	0.05	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	7.178E-07			
D	0.2	0.01	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	1.37	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	4.26	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	6.37	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	11.12	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	10.53	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	6.56	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	5.04	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	4.26	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	1.18	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	0.88	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.02	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	1.18	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	1.76	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	3.18	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	8.23	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	6.02	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	3.33	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			
E	7.0	1.81	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	1.91	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	0.54	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	1.03	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			
F	0.3	0.01	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.813E-06			
F	1.2	0.54	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.024E-06			
F	1.8	0.98	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	6.935E-07			
F	2.4	0.64	90000.	0.	131.	1000.0	

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       0.73    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.69    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.24    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F       28.5       0.20    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.39    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.24    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.34    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.15    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.627E-06	4.081E-06	3.498E-06	3.312E-06	3.086E-06	2.354E-06	2.243E-06	
0.011	0.034	0.048	0.097	0.342	1.860	3.231	4.259	5.092	9.353	
0.00054	0.00161	0.00228	0.00462	0.01631	0.08879	0.15426	0.20336	0.24310	0.44651	
2.077E-06	1.880E-06	1.772E-06	1.696E-06	1.563E-06	1.421E-06	1.273E-06	1.253E-06	1.187E-06	1.141E-06	
11.018	12.193	12.683	19.049	19.343	19.588	21.351	21.596	21.694	32.810	
0.52600	0.58212	0.60550	0.90944	0.92347	0.93516	1.01933	1.03102	1.03569	1.56643	
1.047E-06	1.024E-06	9.624E-07	8.916E-07	8.590E-07	7.178E-07	6.990E-07	6.935E-07	6.887E-07	6.477E-07	
32.957	33.496	36.679	36.777	47.306	47.355	47.502	48.481	55.044	63.271	
1.57344	1.59916	1.75113	1.75581	2.25849	2.26082	2.26784	2.31460	2.62789	3.02068	
5.752E-07	5.284E-07	5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.556E-07	3.528E-07	3.479E-07	3.265E-07	
68.315	69.050	69.686	75.710	79.970	83.301	86.190	86.924	88.100	89.912	
3.26150	3.29657	3.32697	3.61454	3.81795	3.97694	4.11488	4.14995	4.20607	4.29257	
2.677E-07	2.656E-07	2.453E-07	2.146E-07	2.130E-07	1.975E-07	1.793E-07	1.415E-07	1.347E-07	9.605E-08	
92.018	92.703	94.613	95.250	95.495	96.033	96.425	97.307	97.404	97.796	
4.39311	4.42584	4.51702	4.54742	4.55911	4.58483	4.60353	4.64562	4.65029	4.66900	

8.032E-08	6.505E-08	4.918E-08	4.375E-08	3.310E-08	2.491E-08
98.825	99.070	99.314	99.510	99.853	100.000
4.71810	4.72979	4.74148	4.75083	4.76719	4.77421

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.203
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.908
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.565
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.256
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.018
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.258
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
5	1	-11.07050	-15.73252	-1.05933
5	2	-12.68879	-16.05494	-1.17155
5	3	-13.28753	-17.76584	-1.89583
5	4	-13.68351	-17.76572	-1.89578
5	5	-13.96752	-18.47977	-2.25218
5	6	-14.24977	-20.79418	-3.48444
5	7	-14.36856		

NUMXQ(K)= 7

4.868E-06	0.048	1.000
3.463E-06	0.143	3.000
2.907E-06	0.239	5.000
2.220E-06	0.477	10.000
1.878E-06	0.716	15.000
1.638E-06	0.955	20.000
1.396E-06	1.194	25.000
1.220E-06	1.432	30.000
1.087E-06	1.671	35.000
9.803E-07	1.910	40.000
8.938E-07	2.148	45.000
8.149E-07	2.387	50.000
7.433E-07	2.626	55.000
6.827E-07	2.865	60.000
6.214E-07	3.103	65.000
2.179E-06	0.5	10.47

ANNUAL AVERAGE = 1.09E-08

K= 5 FIVEXQ(K)= 2.179E-06 FIVEPR(K)=10.473

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
7.003	10.627	14.657	18.036	69.615	98.629
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					
			AT 131.4 METERS							
CA=1292.SQ.METERS										
A	2.2	0.16	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	5.284E-07
A	3.3	1.37	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	3.556E-07
A	4.4	2.19	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.93	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.16	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.16	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
A	10.8	0.05	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.084E-07
A	26.5	0.05	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	4.410E-08
B	2.2	0.27	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	3.086E-06
B	3.3	1.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	1.15	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.49	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	8.7	0.11	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.05	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
C	2.2	0.93	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	3.498E-06
C	3.3	2.19	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	1.15	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.60	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06

C	6.5	0.16	1500.	0.	131.	154.3	88.4	0.0
0.000E+00	0.000E+00	1.187E-06						
C	8.7	0.16	1500.	0.	131.	154.3	88.4	0.0
0.000E+00	0.000E+00	8.916E-07						
C	10.8	0.11	1500.	0.	131.	154.3	88.4	0.0
0.000E+00	0.000E+00	7.178E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.09	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	3.61	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	4.21	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	9.79	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	9.19	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	7.05	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	5.58	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	5.14	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.31	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.38	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.93	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.35	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.62	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	6.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	3.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	2.52	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	1.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.16	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.60	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.98	90000.	0.	131.	1000.0		

```
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       1.53     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.98     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.60     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.11     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G        1.2       0.11     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.16     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.27     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.498E-06	3.312E-06	3.086E-06	2.354E-06	2.243E-06	2.077E-06	1.880E-06
0.009	0.027	0.044	0.973	2.067	2.340	4.528	8.137	9.176	10.105
0.00038	0.00115	0.00188	0.04162	0.08838	0.10007	0.19360	0.34791	0.39233	0.43208

1.772E-06	1.696E-06	1.563E-06	1.421E-06	1.273E-06	1.253E-06	1.187E-06	1.141E-06	1.024E-06	9.624E-07
11.253	15.464	16.612	17.214	19.565	20.057	20.221	30.009	30.665	33.290
0.48117	0.66120	0.71030	0.73602	0.83656	0.85760	0.86461	1.28312	1.31118	1.42340

8.916E-07	8.590E-07	7.864E-07	7.178E-07	6.935E-07	6.887E-07	6.477E-07	6.331E-07	5.752E-07	5.284E-07
33.454	42.640	42.749	42.859	43.460	50.514	56.693	56.748	62.325	62.489
1.43042	1.82320	1.82788	1.83256	1.85828	2.15988	2.42408	2.42642	2.66490	2.67191

5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.556E-07	3.528E-07	3.479E-07	3.265E-07	2.677E-07	2.656E-07
63.473	70.801	75.941	82.284	83.651	85.182	86.494	89.829	92.017	93.001
2.71399	3.02729	3.24707	3.51828	3.57673	3.64219	3.69831	3.84093	3.93445	3.97653

2.453E-07	2.146E-07	2.130E-07	1.975E-07	1.793E-07	1.779E-07	1.415E-07	1.347E-07	1.336E-07	1.084E-07
95.516	96.446	97.047	98.141	98.305	98.414	98.797	98.961	99.016	99.070
4.08408	4.12383	4.14955	4.19631	4.20332	4.20800	4.22436	4.23138	4.23372	4.23605

9.605E-08 8.032E-08 6.505E-08 4.918E-08 4.410E-08 3.310E-08
2.491E-08 1.998E-08
99.180 99.344 99.508 99.563 99.617 99.891
99.945 100.000
4.24073 4.24774 4.25476 4.25710 4.25943 4.27112
4.27346 4.27580

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.348
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(3)= 0.660
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 1.282
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 1.821
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 2.422
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 2.662
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= 3.024
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(9)= 3.515

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
6	1	-11.07050	-15.95532	-1.09198
6	2	-13.00780	-16.42233	-1.26500
6	3	-13.28753	-17.27041	-1.60723
6	4	-13.68351	-18.22483	-2.03489
6	5	-13.96752	-18.94658	-2.37987
6	6	-14.24977	-20.01989	-2.92372
6	7	-14.36856	-20.10113	-2.96575
6	8	-14.53378	-20.69992	-3.28473
6	9	-14.75472	NUMXQ(K)= 9	

4.488E-06	0.043	1.000
3.169E-06	0.128	3.000
2.666E-06	0.214	5.000
2.054E-06	0.428	10.000
1.719E-06	0.641	15.000
1.460E-06	0.855	20.000
1.277E-06	1.069	25.000
1.141E-06	1.283	30.000

1.009E-06	1.497	35.000
9.055E-07	1.710	40.000
8.151E-07	1.924	45.000
7.347E-07	2.138	50.000
6.679E-07	2.352	55.000
6.034E-07	2.565	60.000
5.449E-07	2.779	65.000
4.949E-07	2.993	70.000
4.483E-07	3.207	75.000
4.076E-07	3.421	80.000
1.920E-06	0.5	11.69

ANNUAL AVERAGE = 8.56E-09

K= 6 FIVEXQ(K)= 1.920E-06 FIVEPR(K)=11.694

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
5.085	8.202	13.742	19.046	66.408	99.289
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.09	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	3.556E-07
A	4.4	0.44	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.39	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.39	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.30	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
B	1.7	0.09	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	4.081E-06
B	2.2	0.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	3.086E-06
B	3.3	0.26	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.48	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.57	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.39	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.22	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
C	2.2	0.09	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	3.498E-06
C	3.3	0.26	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	1.13	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	1.35	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.65	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06

AT 131.4 METERS
CA=1292.SQ.METERS

C	8.7	0.30	1500.	0.	131.	154.3
88.4	0.0	0.000E+00	0.000E+00	8.916E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.61	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	8.36	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	12.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.61	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.66	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.65	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	1.13	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.61	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	3.83	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	3.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.44	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.61	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.30	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.52	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.35	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NW SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.081E-06	3.498E-06	3.312E-06	3.086E-06	2.354E-06	2.243E-06	2.077E-06	
0.005	0.027	0.038	0.125	0.212	0.821	0.865	1.126	2.475	2.736	
0.00027	0.00143	0.00204	0.00672	0.01140	0.04413	0.04647	0.06049	0.13297	0.14700	
1.880E-06	1.772E-06	1.696E-06	1.563E-06	1.421E-06	1.273E-06	1.253E-06	1.187E-06	1.141E-06	1.047E-06	
3.868	4.999	7.349	7.828	9.177	10.700	11.266	11.919	20.274	20.666	
0.20779	0.26858	0.39483	0.42055	0.49303	0.57486	0.60526	0.64033	1.08923	1.11027	
1.024E-06	9.624E-07	8.916E-07	8.590E-07	7.864E-07	6.935E-07	6.887E-07	6.477E-07	6.331E-07	5.752E-07	
21.101	25.018	25.322	37.595	37.812	38.595	47.821	55.916	55.959	61.573	
1.13365	1.34407	1.36044	2.01977	2.03146	2.07354	2.56920	3.00408	3.00642	3.30802	
5.243E-07	4.876E-07	4.321E-07	3.909E-07	3.556E-07	3.528E-07	3.479E-07	3.265E-07	2.677E-07	2.656E-07	
62.748	71.669	76.326	82.941	83.028	84.899	85.552	89.382	89.817	91.427	
3.37115	3.85045	4.10062	4.45600	4.46067	4.56121	4.59628	4.80202	4.82541	4.91191	
2.453E-07	2.146E-07	2.130E-07	1.975E-07	1.793E-07	1.779E-07	1.415E-07	1.347E-07	1.336E-07	9.605E-08	
94.430	94.821	95.605	96.301	96.693	96.997	97.345	97.650	97.824	97.868	
5.07324	5.09428	5.13636	5.17377	5.19482	5.21118	5.22989	5.24625	5.25560	5.25794	

```
   8.032E-08   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08
1.668E-08
      98.259      98.390      98.869      99.391      99.739      99.913
100.000
     5.27898     5.28600     5.31172     5.33977     5.35848     5.36783
5.37251
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.133
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.088
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.018
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.001
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.847
                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.452
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
7	1	-11.07050	-16.77797	-1.25467
7	2	-13.00780	-15.42285	-0.80370
7	3	-13.28753	-16.19131	-1.09294
7	4	-13.68351	-16.34970	-1.16197
7	5	-13.96752	-17.38123	-1.66513
7	6	-14.24977	-19.02258	-2.53790
7	7	-14.53378	-20.25747	-3.23609
7	8	-14.75472	NUMXQ(K)= 8	

3.130E-06	0.054	1.000
2.139E-06	0.161	3.000
1.878E-06	0.269	5.000
1.511E-06	0.537	10.000
1.290E-06	0.806	15.000
1.148E-06	1.075	20.000
1.039E-06	1.343	25.000
9.557E-07	1.612	30.000
8.889E-07	1.880	35.000
8.229E-07	2.149	40.000
7.576E-07	2.418	45.000
7.026E-07	2.686	50.000
6.556E-07	2.955	55.000

5.983E-07	3.224	60.000
5.461E-07	3.492	65.000
5.012E-07	3.761	70.000
4.555E-07	4.029	75.000
4.131E-07	4.298	80.000
1.553E-06	0.5	9.31

ANNUAL AVERAGE = 5.86E-09

K= 7 FIVEXQ(K)= 1.553E-06 FIVEPR(K)= 9.307

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
1.610	3.699	10.847	14.634	60.072	98.216
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.18	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
B	3.3	0.05	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.18	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.23	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.28	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.14	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.05	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
C	3.3	0.18	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.60	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.46	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.55	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06
C	8.7	0.23	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	8.916E-07
C	10.8	0.05	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	7.178E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.60	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	6.18	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	10.79	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.41	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.78	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.46	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.05	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.74	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.55	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.92	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	2.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		

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   G          2.4        0.18    90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   4.918E-08
   G          3.5        0.23    90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   3.310E-08
   G          4.7        0.14    90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   2.491E-08
   G          5.9        0.14    90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.998E-08
   G          7.0        0.05    90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.668E-08
   G          9.3        0.05    90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.354E-06 2.243E-06 2.077E-06 1.880E-06 1.772E-06 1.696E-06
0.005 0.019 0.034 0.633 0.818 1.833 1.879 2.617 3.217 5.523
0.00025 0.00097 0.00170 0.03209 0.04144 0.09288 0.09522 0.13263 0.16302 0.27992

1.563E-06 1.421E-06 1.273E-06 1.253E-06 1.187E-06 1.141E-06 1.047E-06 1.024E-06 9.624E-07 8.916E-07
5.708 6.169 8.153 8.383 8.937 15.118 15.395 15.949 19.132 19.363
0.28928 0.31266 0.41319 0.42488 0.45294 0.76623 0.78026 0.80832 0.96964 0.98133

8.590E-07 7.864E-07 7.178E-07 6.935E-07 6.887E-07 6.477E-07 6.331E-07 5.752E-07 5.243E-07 4.876E-07
30.157 30.296 30.342 31.264 40.675 48.794 48.840 55.622 57.190 67.985
1.52843 1.53545 1.53779 1.58455 2.06150 2.47300 2.47534 2.81903 2.89852 3.44562

4.321E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.677E-07 2.656E-07 2.453E-07 2.130E-07 1.975E-07
70.661 79.656 81.686 82.147 88.698 88.882 90.359 95.110 97.232 97.740
3.58123 4.03714 4.14002 4.16340 4.49540 4.50475 4.57957 4.82038 4.92793 4.95365

1.779E-07 1.415E-07 1.336E-07 9.605E-08 8.032E-08 6.505E-08 4.918E-08 3.310E-08 2.491E-08 1.998E-08
98.432 98.478 98.754 99.077 99.124 99.216 99.400 99.631 99.769 99.908
4.98872 4.99106 5.00509 5.02145 5.02379 5.02847 5.03782 5.04951 5.05653 5.06354

```
   1.668E-08   1.253E-08
     99.954     100.000
    5.06588     5.06822

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.280
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.765
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.527
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.470
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.443
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.034

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1     -11.07050 -16.71215  -1.23598
  8  2     -13.28753 -16.46091  -1.14530
  8  3     -13.68351 -16.31271  -1.08419
  8  4     -13.96752 -17.05028  -1.42517
  8  5     -14.24977 -18.08186  -1.95014
  8  6     -14.53378 -20.06905  -3.04236
  8  7     -14.75472     NUMXQ(K)=  7
    3.209E-06             0.051             1.000
    2.153E-06             0.152             3.000
    1.764E-06             0.253             5.000
    1.350E-06             0.507            10.000
    1.145E-06             0.760            15.000
    1.020E-06             1.014            20.000
    9.303E-07             1.267            25.000
    8.609E-07             1.520            30.000
    7.888E-07             1.774            35.000
    7.296E-07             2.027            40.000
    6.802E-07             2.281            45.000
    6.347E-07             2.534            50.000
    5.857E-07             2.788            55.000
    5.437E-07             3.041            60.000
    5.072E-07             3.294            65.000
    4.684E-07             3.548            70.000
    4.255E-07             3.801            75.000
```

1.357E-06 0.5 9.87

ANNUAL AVERAGE = 3.08E-09

K= 8 FIVEXQ(K)= 1.357E-06 FIVEPR(K)= 9.865

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01	1.693E-02
0.185	1.107	10.763	12.839	53.116	98.801	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					

AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.05	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.16	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.09	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.14	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
B	3.3	0.02	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.09	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.40	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.33	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.51	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.14	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
B	26.5	0.02	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.575E-07
C	2.2	0.02	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	3.498E-06
C	3.3	0.26	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.47	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.93	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.86	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06
C	8.7	1.12	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	8.916E-07
C	10.8	0.23	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	7.178E-07

C	26.5	0.02	1500.	0.	131.	154.3	88.4	0.0
0.000E+00	0.000E+00	2.919E-07						
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	0.28	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	0.68	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	0.91	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	3.99	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	7.47	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	7.71	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.40	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	8.06	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	2.24	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.93	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.01	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.61	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	1.40	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.14	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	10.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	9.88	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	6.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	8.57	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	1.68	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.21	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.28	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.26	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.77	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	5.243E-07						
F	3.5	1.75	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	3.528E-07						
F	4.7	2.08	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.07     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.93     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.56     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.02     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.19     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.21     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.19     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.51     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.14     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.19     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.02     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.02     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.498E-06 3.312E-06 2.354E-06 2.243E-06 2.077E-06 1.880E-06 1.772E-06
0.002 0.014 0.021 0.045 0.325 0.582 1.259 1.282 1.889 2.356
0.00023 0.00140 0.00213 0.00446 0.03252 0.05824 0.12604 0.12838 0.18917 0.23593

1.696E-06 1.563E-06 1.421E-06 1.273E-06 1.253E-06 1.187E-06 1.141E-06 1.047E-06 1.024E-06 9.624E-07
3.267 3.360 4.294 5.321 5.718 6.582 10.575 10.902 11.182 12.583
0.32711 0.33647 0.42999 0.53286 0.57261 0.65911 1.05892 1.09165 1.11971 1.25999

8.916E-07 8.590E-07 7.864E-07 7.178E-07 6.935E-07 6.887E-07 6.477E-07 6.331E-07 5.752E-07 5.243E-07
13.704 21.175 21.689 21.922 22.179 29.884 36.025 36.165 42.562 43.333
1.37221 2.12038 2.17182 2.19520 2.22092 2.99247 3.60737 3.62140 4.26202 4.33918

4.876E-07 4.321E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.919E-07 2.677E-07 2.656E-07 2.575E-07
53.419 61.475 71.351 73.102 75.344 81.975 81.998 82.045 84.123 84.146
5.34921 6.15583 7.14482 7.32017 7.54462 8.20862 8.21096 8.21563 8.42372 8.42606

2.453E-07 2.146E-07 2.130E-07 1.975E-07 1.793E-07 1.779E-07 1.415E-07 1.347E-07 1.336E-07 1.076E-07
92.715 92.879 93.953 95.634 95.727 96.661 97.595 97.735 98.296 98.319
9.28411 9.30048 9.40803 9.57637 9.58572 9.67924 9.77276 9.78679 9.84290 9.84524

9.605E-08 8.032E-08 6.505E-08 4.918E-08 3.310E-08 2.491E-08
1.998E-08 1.668E-08 1.253E-08
98.506 98.716 98.926 99.113 99.626 99.766
99.953 99.977 100.000
9.86395 9.88499 9.90603 9.92473 9.97617 9.99020
10.00890 10.01124 10.01358

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.236 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 2.118 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 3.604 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 7.141 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= 8.205 HANDCHECK

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
9	1	-11.07050	-16.74131	-1.23782
9	2	-13.24324	-14.42039	-0.41654
9	3	-13.28753	-15.88606	-0.95546
9	4	-13.68351	-16.06172	-1.03166
9	5	-13.96752	-16.44414	-1.22005
9	6	-14.24977	-16.97529	-1.51536
9	7	-14.75472	-18.32343	-2.43537
9	8	-14.93482		

NUMXQ(K)= 8

2.458E-06	0.100	1.000
1.715E-06	0.300	3.000
1.478E-06	0.501	5.000
1.164E-06	1.001	10.000
9.925E-07	1.502	15.000
8.802E-07	2.003	20.000
7.885E-07	2.503	25.000
7.159E-07	3.004	30.000
6.582E-07	3.505	35.000
6.022E-07	4.005	40.000
5.537E-07	4.506	45.000
5.129E-07	5.007	50.000
4.779E-07	5.507	55.000
4.474E-07	6.008	60.000
4.206E-07	6.509	65.000

3.969E-07	7.010	70.000
3.667E-07	7.510	75.000
3.371E-07	8.011	80.000
1.478E-06	0.5	4.99

ANNUAL AVERAGE = 7.41E-09

K= 9 FIVEXQ(K)= 1.478E-06 FIVEPR(K)= 4.993

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
0.444	1.961	9.697	13.620	52.287	98.529
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.04	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	3.556E-07
A	4.4	0.08	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.16	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.12	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.08	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
B	3.3	0.16	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.16	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.36	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.20	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.20	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
B	26.5	0.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.575E-07
C	3.3	0.16	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.52	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.56	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.68	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06
C	8.7	0.72	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	8.916E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.39	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.10	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.31	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.84	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.82	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	10.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	5.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.08	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.16	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.76	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.80     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.12     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.32     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.04     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.36     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.76     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.64     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.16     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.20     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NNE SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.354E-06 2.243E-06 2.077E-06 1.880E-06 1.772E-06 1.696E-06
0.002 0.014 0.027 0.266 0.426 1.104 1.263 1.902 2.420 3.657
0.00012 0.00083 0.00156 0.01559 0.02494 0.06469 0.07404 0.11145 0.14185 0.21432

1.563E-06 1.421E-06 1.273E-06 1.253E-06 1.187E-06 1.141E-06 1.047E-06 1.024E-06 9.624E-07 8.916E-07
3.817 4.375 5.971 6.330 7.008 11.396 11.596 12.075 14.668 15.386
0.22368 0.25641 0.34993 0.37097 0.41072 0.66790 0.67959 0.70765 0.85962 0.90171

8.590E-07 7.864E-07 6.935E-07 6.887E-07 6.477E-07 6.331E-07 5.752E-07 5.243E-07 4.876E-07 4.321E-07
23.484 23.684 24.481 32.181 40.000 40.040 45.306 46.463 57.354 61.662
1.37633 1.38802 1.43478 1.88602 2.34427 2.34661 2.65523 2.72303 3.36132 3.61382

3.909E-07 3.556E-07 3.528E-07 3.479E-07 3.265E-07 2.677E-07 2.656E-07 2.575E-07 2.453E-07 2.146E-07
71.915 71.955 75.505 76.343 83.604 83.684 86.556 86.596 92.580 92.739
4.21470 4.21704 4.42512 4.47422 4.89974 4.90442 5.07276 5.07509 5.42580 5.43515

2.130E-07 1.975E-07 1.793E-07 1.779E-07 1.415E-07 1.347E-07 1.336E-07 1.076E-07 9.605E-08 8.032E-08
94.574 95.332 95.452 96.210 96.449 96.529 97.327 97.447 97.766 97.846
5.54270 5.58712 5.59414 5.63856 5.65259 5.65727 5.70403 5.71104 5.72974 5.73442

6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08
97.886	98.245	99.003	99.641	99.801	100.000
5.73676	5.75780	5.80222	5.83963	5.84898	5.86067

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.214
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.667
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.375
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.342
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.358
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.211
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
10	1	-11.07050	-16.67878	-1.18716
10	2	-13.28753	-16.24776	-1.03627
10	3	-13.68351	-16.28555	-1.05154
10	4	-13.96752	-16.83953	-1.30285
10	5	-14.24977	-17.84103	-1.80668
10	6	-14.53378	-18.42682	-2.12668
10	7	-14.75472	NUMXQ(K)= 7	

2.691E-06	0.059	1.000
1.826E-06	0.176	3.000
1.527E-06	0.293	5.000
1.197E-06	0.586	10.000
1.027E-06	0.879	15.000
9.170E-07	1.172	20.000
8.319E-07	1.465	25.000
7.565E-07	1.758	30.000
6.967E-07	2.051	35.000
6.477E-07	2.344	40.000
5.914E-07	2.637	45.000
5.444E-07	2.930	50.000
5.044E-07	3.223	55.000
4.669E-07	3.516	60.000
4.320E-07	3.809	65.000
4.016E-07	4.102	70.000

1.268E-06 0.5 8.53

ANNUAL AVERAGE = 3.59E-09

K= 10 FIVEXQ(K)= 1.268E-06 FIVEPR(K)= 8.531

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 7.442E-01 3.613E-01 3.314E-01 2.419E-01 2.081E-01
1.693E-02
0.479 1.636 14.015 16.648 49.642 97.527
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	3.556E-07
A	4.4	0.09	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.14	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	8.7	0.09	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
B	3.3	0.14	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.19	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.28	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.28	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.14	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.05	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
C	3.3	0.33	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.42	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.70	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.52	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06
C	8.7	0.75	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	8.916E-07
C	10.8	0.14	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	7.178E-07
C	26.5	0.09	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.919E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.32	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	6.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	6.67	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.76	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.80	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.96	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	4.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.27	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.70	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.27	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	4.65	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	4.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	3.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.46	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.08     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.28     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.03     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.69     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.75     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.354E-06	2.243E-06	2.077E-06	1.880E-06	1.772E-06	1.696E-06	
0.003	0.019	0.037	0.460	0.789	1.869	2.010	2.809	3.231	4.547	
0.00017	0.00094	0.00185	0.02289	0.03926	0.09303	0.10005	0.13979	0.16083	0.22630	

1.563E-06	1.421E-06	1.273E-06	1.253E-06	1.187E-06	1.141E-06	1.047E-06	1.024E-06	9.624E-07	8.916E-07	
4.735	5.439	7.412	7.694	8.211	12.814	13.096	13.801	16.760	17.512	
0.23565	0.27072	0.36892	0.38295	0.40867	0.63779	0.65182	0.68689	0.83419	0.87160	

8.590E-07	7.864E-07	7.178E-07	6.935E-07	6.887E-07	6.477E-07	6.331E-07	5.752E-07	5.243E-07	4.876E-07	
23.525	23.666	23.806	24.605	31.276	38.979	39.026	42.784	44.053	53.025	
1.17086	1.17788	1.18489	1.22464	1.55664	1.94008	1.94242	2.12946	2.19258	2.63915	

4.321E-07	3.909E-07	3.556E-07	3.528E-07	3.479E-07	3.265E-07	2.919E-07	2.677E-07	2.656E-07	2.453E-07	
57.300	65.051	65.145	69.795	70.500	75.150	75.244	75.338	80.270	87.740	
2.85191	3.23769	3.24236	3.47383	3.50890	3.74036	3.74504	3.74971	3.99521	4.36696	

2.146E-07	2.130E-07	1.975E-07	1.779E-07	1.415E-07	1.347E-07	1.336E-07	1.076E-07	9.605E-08	8.032E-08	
87.880	90.981	92.249	93.705	93.940	94.034	95.115	95.162	95.209	95.302	
4.37397	4.52828	4.59141	4.66389	4.67558	4.68025	4.73403	4.73636	4.73870	4.74338	

```
   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.537      95.819      96.853      98.544      99.295      99.765
100.000
     4.75507     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.226
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.637
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.170
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.938
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.637
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.235

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.07050 -16.78127  -1.23049
 11  2     -13.28753 -16.51473  -1.13661
 11  3     -13.68351 -16.84267  -1.26826
 11  4     -13.96752 -17.16251  -1.40935
 11  5     -14.24977 -18.77867  -2.19134
 11  6     -14.53378 -19.30218  -2.46159
 11  7     -14.75472     NUMXQ(K)=  7
    2.960E-06             0.050             1.000
    1.990E-06             0.149             3.000
    1.638E-06             0.249             5.000
    1.260E-06             0.498            10.000
    1.062E-06             0.747            15.000
    9.287E-07             0.995            20.000
    8.311E-07             1.244            25.000
    7.517E-07             1.493            30.000
    6.891E-07             1.742            35.000
    6.328E-07             1.991            40.000
    5.683E-07             2.240            45.000
    5.153E-07             2.489            50.000
    4.690E-07             2.737            55.000
    4.270E-07             2.986            60.000
```

3.913E-07	3.235	65.000
1.257E-06	0.5	10.05

ANNUAL AVERAGE = 3.14E-09

K= 11 FIVEXQ(K)= 1.257E-06 FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
0.423	1.503	19.560	22.519	51.600	95.256
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	5.4	0.14	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.28	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.05	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
A	10.8	0.09	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.084E-07
A	26.5	0.05	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	4.410E-08
B	3.3	0.05	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.09	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.24	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.33	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.61	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.09	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
B	26.5	0.05	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.575E-07
C	3.3	0.14	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.19	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.66	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.71	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06
C	8.7	1.13	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	8.916E-07
C	10.8	0.14	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	7.178E-07

C	26.5	0.09	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.919E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.28	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	0.42	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	1.13	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	4.24	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	3.77	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	4.19	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	4.85	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	6.54	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	0.94	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.56	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.89	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.65	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	1.69	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	5.22	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	5.46	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	7.01	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	7.39	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	8.33	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.79	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.71	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.85	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	1.69	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	3.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	3.62	90000.	0.	131.	1000.0					

```
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       4.00     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       2.68     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       3.77     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.99     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07
   F       28.5       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.89     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.18     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       1.88     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       1.08     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.66     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
   G       11.6       0.09     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.009E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
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ENE SECTOR BOUNDARY DISTANCE = 1500.0 METERS
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THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.354E-06 2.243E-06 2.077E-06 1.880E-06 1.772E-06 1.696E-06
0.002 0.019 0.038 0.320 0.461 0.885 0.932 1.826 2.015 3.144
0.00012 0.00097 0.00188 0.01591 0.02292 0.04396 0.04630 0.09073 0.10008 0.15619

1.563E-06 1.421E-06 1.273E-06 1.253E-06 1.187E-06 1.141E-06 1.047E-06 1.024E-06 9.624E-07 8.916E-07
3.238 3.897 5.544 5.780 6.486 10.721 11.051 11.757 13.451 14.580
0.16087 0.19360 0.27543 0.28712 0.32219 0.53261 0.54898 0.58405 0.66822 0.72433

8.590E-07 7.864E-07 7.178E-07 6.935E-07 6.887E-07 6.477E-07 6.331E-07 5.752E-07 5.243E-07 4.876E-07
18.345 18.957 19.098 19.946 24.134 29.358 29.452 34.300 35.994 41.453
0.91138 0.94177 0.94878 0.99087 1.19895 1.45847 1.46315 1.70397 1.78814 2.05935

4.321E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.919E-07 2.656E-07 2.575E-07 2.453E-07 2.146E-07
47.995 55.008 58.020 58.961 66.350 66.444 70.068 70.115 78.445 78.586
2.38434 2.73270 2.88234 2.92910 3.29617 3.30084 3.48087 3.48321 3.89704 3.90406

2.130E-07 1.975E-07 1.793E-07 1.779E-07 1.415E-07 1.347E-07 1.336E-07 1.084E-07 1.076E-07 9.605E-08
82.587 84.375 84.657 87.340 87.905 87.952 91.717 91.811 92.799 93.270
4.10279 4.19163 4.20566 4.33893 4.36699 4.36933 4.55637 4.56104 4.61014 4.63352

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   8.032E-08   6.505E-08   4.918E-08   4.410E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      93.364      93.741      94.117      94.164      94.211      95.105
96.282      98.165      99.247      99.906
     4.63820     4.65690     4.67561     4.67795     4.68028     4.72471
4.78316     4.87668     4.93045     4.96319

   1.009E-08
     100.000
     4.96786

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.001
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.156
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.910
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.457
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.702
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.730
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.293

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 12  1     -11.07050 -16.99141  -1.25333
 12  2     -11.63677 -16.99297  -1.25370
 12  3     -13.28753 -16.20399  -0.98675
 12  4     -13.68351 -17.44396  -1.47219
 12  5     -13.96752 -17.67518  -1.57011
 12  6     -14.24977 -18.42571  -1.91413
 12  7     -14.36856 -18.51213  -1.95491
 12  8     -14.75472 -18.94127  -2.17818
 12  9     -14.93482     NUMXQ(K)=  9
    2.587E-06              0.050              1.000
    1.726E-06              0.149              3.000
    1.468E-06              0.248              5.000
    1.169E-06              0.497             10.000
    9.575E-07              0.745             15.000
    8.166E-07              0.994             20.000
```

7.148E-07	1.242	25.000
6.372E-07	1.490	30.000
5.661E-07	1.739	35.000
5.088E-07	1.987	40.000
4.623E-07	2.236	45.000
4.237E-07	2.484	50.000
3.910E-07	2.732	55.000
3.599E-07	2.981	60.000
3.331E-07	3.229	65.000
1.166E-06	0.5	10.06

ANNUAL AVERAGE = 2.84E-09

K= 12 FIVEXQ(K)= 1.166E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
0.612	2.071	23.456	26.515	53.437	92.988
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.03	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.06	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.39	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.42	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
A	10.8	0.30	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.084E-07
A	26.5	0.18	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	4.410E-08
B	2.2	0.03	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	3.086E-06
B	3.3	0.09	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.09	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.39	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.30	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.63	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.33	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
B	26.5	0.21	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.575E-07
C	3.3	0.06	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.48	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.69	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.33	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06

C	8.7	1.44	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	8.916E-07			
C	10.8	0.87	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	7.178E-07			
C	26.5	0.48	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	2.919E-07			
D	0.2	0.00	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	0.24	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	0.54	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	0.90	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	2.66	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	3.26	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	4.01	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	4.25	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	9.30	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	6.31	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	3.71	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.02	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	0.90	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	0.72	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	1.26	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	3.05	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	3.59	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	5.77	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			
E	7.0	6.37	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	12.47	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	2.63	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	0.30	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			
F	0.3	0.01	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.813E-06			
F	1.2	0.42	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.024E-06			
F	1.8	0.48	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	6.935E-07			
F	2.4	0.66	90000.	0.	131.	1000.0	

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.29	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.63	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.83	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.84	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.81	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.086E-06	2.354E-06	2.243E-06	2.077E-06	1.880E-06	1.772E-06	
0.002	0.019	0.030	0.269	0.299	0.359	0.898	0.987	1.885	2.363	
0.00015	0.00150	0.00235	0.02106	0.02339	0.02807	0.07015	0.07717	0.14731	0.18472	

1.696E-06	1.563E-06	1.421E-06	1.273E-06	1.253E-06	1.187E-06	1.141E-06	1.047E-06	1.024E-06	9.624E-07	
3.261	3.350	4.038	4.756	5.145	5.474	8.137	8.436	8.854	10.111	
0.25486	0.26187	0.31565	0.37176	0.40215	0.42787	0.63596	0.65934	0.69207	0.79027	

8.916E-07	8.590E-07	7.864E-07	7.178E-07	6.935E-07	6.887E-07	6.477E-07	6.331E-07	5.752E-07	5.243E-07	
11.547	14.807	15.435	16.303	16.781	20.790	23.841	24.170	28.418	29.076	
0.90249	1.15734	1.20644	1.27424	1.31165	1.62495	1.86342	1.88914	2.22114	2.27258	

4.876E-07	4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.919E-07	2.677E-07	2.656E-07	2.575E-07	
32.665	41.968	47.742	49.028	55.340	61.711	62.190	62.220	64.852	65.061	
2.55314	3.28027	3.73151	3.83205	4.32537	4.82337	4.86078	4.86312	5.06887	5.08523	

2.453E-07	2.146E-07	2.130E-07	1.975E-07	1.793E-07	1.779E-07	1.415E-07	1.347E-07	1.336E-07	1.084E-07	
77.535	77.595	80.138	82.770	83.159	85.701	89.411	89.830	93.658	93.958	
6.06019	6.06487	6.26360	6.46935	6.49974	6.69848	6.98839	7.02112	7.32039	7.34377	

```
   1.076E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.410E-08
4.375E-08   3.310E-08   2.491E-08   1.998E-08
      94.646      94.885      95.184      95.334      95.543      95.722
95.752      96.500      97.338      98.145
     7.39755     7.41625     7.43963     7.45132     7.46769     7.48172
7.48406     7.54251     7.60797     7.67110

   1.668E-08   1.253E-08   1.009E-08
      99.252      99.970     100.000
     7.75760     7.81372     7.81606
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

```
 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.255
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.635
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.156
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.861
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.820
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   6.056

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1     -11.07050 -16.44367  -1.15172
 13  2     -11.63677 -16.65668  -1.20276
 13  3     -13.28753 -16.87452  -1.28052
 13  4     -13.68351 -16.89302  -1.28795
 13  5     -13.96752 -17.37427  -1.49982
 13  6     -14.24977 -17.64236  -1.62851
 13  7     -14.93482 -19.16069  -2.54174
 13  8     -15.22084     NUMXQ(K)=  8
    2.620E-06              0.078              1.000
    1.751E-06              0.234              3.000
    1.416E-06              0.391              5.000
    1.037E-06              0.782             10.000
    8.526E-07              1.172             15.000
    7.204E-07              1.563             20.000
    6.275E-07              1.954             25.000
```

5.544E-07	2.345	30.000
4.978E-07	2.736	35.000
4.525E-07	3.126	40.000
4.152E-07	3.517	45.000
3.838E-07	3.908	50.000
3.570E-07	4.299	55.000
3.338E-07	4.690	60.000
3.063E-07	5.080	65.000
2.793E-07	5.471	70.000
2.559E-07	5.862	75.000
1.271E-06	0.5	6.40

ANNUAL AVERAGE = 5.49E-09

K= 13 FIVEXQ(K)= 1.271E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
1.376	3.440	18.557	22.895	58.074	95.154
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.08	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.08	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.19	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.13	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
A	10.8	0.05	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.084E-07
A	26.5	0.13	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	4.410E-08
B	3.3	0.03	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.13	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.05	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.21	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.40	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.32	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
B	26.5	0.27	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.575E-07
C	3.3	0.05	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.16	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.35	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.56	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06
C	8.7	1.21	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	8.916E-07

C	10.8	0.72	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	7.178E-07			
C	26.5	0.89	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	2.919E-07			
D	0.2	0.00	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	0.51	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	0.51	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	0.51	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	1.58	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	3.09	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	4.29	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	5.26	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	14.57	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	10.52	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	6.09	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.01	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	0.46	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	0.51	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	0.62	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	2.20	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	3.11	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	4.32	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			
E	7.0	6.23	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	11.84	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	3.33	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	0.32	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			
F	0.3	0.01	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.813E-06			
F	1.2	0.35	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.024E-06			
F	1.8	0.40	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	6.935E-07			
F	2.4	0.48	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	5.243E-07			
F	3.5	1.05	90000.	0.	131.	1000.0	

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	2.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.62	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.59	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.70	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.54	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.354E-06	2.243E-06
2.077E-06	1.880E-06	1.772E-06	1.696E-06		
0.004	0.013	0.022	0.532	0.586	1.096
1.122	1.579	1.740	2.250		
0.00037	0.00113	0.00192	0.04634	0.05102	0.09544
0.09778	0.13752	0.15155	0.19598		

1.563E-06	1.421E-06	1.273E-06	1.253E-06	1.187E-06	1.141E-06
1.047E-06	1.024E-06	9.624E-07	8.916E-07		
2.384	2.733	3.243	3.296	3.860	5.444
5.658	6.007	6.625	7.832		
0.20767	0.23806	0.28248	0.28716	0.33626	0.47420
0.49291	0.52330	0.57708	0.68229		

8.590E-07	7.864E-07	7.178E-07	6.935E-07	6.887E-07	6.477E-07
6.331E-07	5.752E-07	5.243E-07	4.876E-07		
10.919	11.322	12.046	12.449	16.743	18.944
19.266	24.527	25.010	28.123		
0.95116	0.98623	1.04936	1.08443	1.45851	1.65023
1.67829	2.13654	2.17863	2.44984		

4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.919E-07
2.677E-07	2.656E-07	2.575E-07	2.453E-07		
42.697	47.018	48.065	58.586	64.813	65.699
65.779	67.095	67.363	79.199		
3.71939	4.09581	4.18700	5.10351	5.64593	5.72308
5.73010	5.84466	5.86804	6.89912		

2.146E-07	2.130E-07	1.975E-07	1.793E-07	1.779E-07	1.415E-07
1.347E-07	1.336E-07	1.084E-07	1.076E-07		
79.280	81.266	84.594	84.782	86.258	92.351
92.485	95.276	95.330	95.947		
6.90613	7.07914	7.36906	7.38543	7.51402	8.04475
8.05644	8.29960	8.30427	8.35805		

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   9.605E-08   8.032E-08   6.505E-08   4.918E-08   4.410E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.162      96.484      96.645      96.860      96.994      97.584
98.282      98.819      99.087      99.946
     8.37675     8.40481     8.41884     8.43754     8.44923     8.50067
8.56146     8.60822     8.63160     8.70642

   1.009E-08
     100.000
     8.71109

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05     DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.046
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.196
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.474
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.950
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.134
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.716
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.642

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1     -11.07050 -16.99068  -1.32021
 14  2     -12.61806 -17.80889  -1.56724
 14  3     -13.28753 -17.22113  -1.36351
 14  4     -13.68351 -16.64295  -1.14066
 14  5     -13.96752 -16.91863  -1.25820
 14  6     -14.36856 -16.76250  -1.18116
 14  7     -14.65458 -17.16687  -1.40775
 14  8     -14.93482      NUMXQ(K)=  8
    2.494E-06              0.087              1.000
    1.496E-06              0.261              3.000
    1.187E-06              0.436              5.000
    8.915E-07              0.871             10.000
    7.378E-07              1.307             15.000
    6.392E-07              1.742             20.000
    5.698E-07              2.178             25.000
```

5.200E-07	2.613	30.000
4.803E-07	3.049	35.000
4.475E-07	3.484	40.000
4.177E-07	3.920	45.000
3.897E-07	4.356	50.000
3.656E-07	4.791	55.000
3.445E-07	5.227	60.000
1.118E-06	0.5	5.74

ANNUAL AVERAGE = 4.97E-09

K= 14 FIVEXQ(K)= 1.118E-06 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
0.671	2.093	12.570	16.516	63.462	96.403
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS

AT 131.4 METERS
CA=1292.SQ.METERS

A	6.5	0.06	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.04	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
A	26.5	0.02	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	4.410E-08
B	2.2	0.02	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	3.086E-06
B	3.3	0.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.02	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.02	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.06	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.13	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.11	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
C	3.3	0.06	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.17	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.19	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.38	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06
C	8.7	0.56	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	8.916E-07
C	10.8	0.47	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	7.178E-07
C	26.5	0.26	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.919E-07
D	0.2	0.00	4000.	0.	131.	263.4				

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.17	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	5.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	7.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	17.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.45	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	5.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F         9.3       1.30    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G         1.2       0.15    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.24    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.94    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       1.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.88    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.36    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.11    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.086E-06	2.354E-06	2.243E-06	2.077E-06	1.880E-06	1.772E-06	
0.001	0.011	0.018	0.189	0.210	0.274	0.873	0.916	1.407	1.578	
0.00015	0.00118	0.00198	0.02068	0.02302	0.03003	0.09550	0.10017	0.15395	0.17265	

1.696E-06	1.563E-06	1.421E-06	1.273E-06	1.253E-06	1.187E-06	1.141E-06	1.047E-06	1.024E-06	9.624E-07
2.433	2.454	2.646	2.988	3.010	3.394	5.916	5.980	6.258	6.899
0.26617	0.26851	0.28955	0.32696	0.32930	0.37139	0.64727	0.65429	0.68468	0.75482

8.916E-07	8.590E-07	7.864E-07	7.178E-07	6.935E-07	6.887E-07	6.477E-07	6.331E-07	5.752E-07	5.243E-07
7.454	11.429	11.557	12.027	12.305	17.326	19.720	19.826	26.921	27.305
0.81561	1.25049	1.26451	1.31595	1.34635	1.89578	2.15764	2.16933	2.94556	2.98764

4.876E-07	4.321E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.919E-07	2.656E-07	2.453E-07	2.130E-07
30.596	48.139	53.588	54.870	65.319	71.238	71.495	72.969	83.504	85.363
3.34770	5.26723	5.86342	6.00371	7.14700	7.79464	7.82270	7.98402	9.13667	9.34008

1.975E-07	1.793E-07	1.779E-07	1.415E-07	1.347E-07	1.336E-07	9.605E-08	8.032E-08	6.505E-08	4.918E-08
87.521	87.585	89.017	94.487	94.530	95.833	95.983	96.196	96.325	96.560
9.57622	9.58323	9.73988	10.33842	10.34310	10.48572	10.50208	10.52546	10.53949	10.56521

4.410E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08	1.253E-08
96.581	97.521	98.654	99.530	99.893	100.000
10.56755	10.67042	10.79434	10.89020	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.154 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 0.647 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 1.249 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 2.943 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 5.263 HANDCHECK

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.07050	-16.85357	-1.23958
15	2	-13.18433	-14.95092	-0.59681
15	3	-13.28753	-16.94858	-1.31355
15	4	-13.68351	-16.57688	-1.16401
15	5	-13.96752	-16.51850	-1.13797
15	6	-14.36856	-16.37400	-1.06149
15	7	-14.65458		

NUMXQ(K)= 7

2.138E-06	0.109	1.000
1.549E-06	0.328	3.000
1.234E-06	0.547	5.000
9.117E-07	1.094	10.000
7.605E-07	1.641	15.000
6.650E-07	2.188	20.000
5.968E-07	2.735	25.000
5.466E-07	3.282	30.000
5.074E-07	3.830	35.000
4.750E-07	4.377	40.000
4.474E-07	4.924	45.000
1.285E-06	0.5	4.57

ANNUAL AVERAGE = 4.53E-09

K= 15 FIVEXQ(K)= 1.285E-06 FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
0.128	0.534	8.832	10.926	64.626	96.068
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.02	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	3.556E-07
A	5.4	0.11	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.09	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.30	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
A	10.8	0.02	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.084E-07
A	26.5	0.02	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	4.410E-08
B	3.3	0.06	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.15	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.26	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.32	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.43	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.13	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
C	2.2	0.02	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	3.498E-06
C	3.3	0.35	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	2.354E-06
C	4.4	0.76	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.772E-06
C	5.4	0.97	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.421E-06
C	6.5	0.93	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	1.187E-06
C	8.7	1.60	1500.	0.	131.	154.3	88.4	0.0	0.000E+00	0.000E+00	8.916E-07

C	10.8	0.30	1500.	0.	131.	154.3
88.4	0.0	0.000E+00	0.000E+00	7.178E-07		
C	26.5	0.09	1500.	0.	131.	154.3
88.4	0.0	0.000E+00	0.000E+00	2.919E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.22	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.86	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.99	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.43	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	8.78	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	15.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	4.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	2.03	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.24	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.50	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.78	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	4.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	4.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.04	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.30	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.00	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.43	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       1.15     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.23     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       1.02     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.41     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.11     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.22     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.19     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.73     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.34     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.63     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.17     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.09     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 1500.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.498E-06 3.312E-06 2.354E-06 2.243E-06 2.077E-06 1.880E-06 1.772E-06
0.002 0.006 0.010 0.032 0.248 0.594 1.458 1.523 1.761 2.518
0.00019 0.00069 0.00111 0.00345 0.02683 0.06424 0.15776 0.16477 0.19049 0.27232

1.696E-06 1.563E-06 1.421E-06 1.273E-06 1.253E-06 1.187E-06 1.141E-06 1.047E-06 1.024E-06 9.624E-07
3.598 3.750 4.722 5.219 5.479 6.408 11.401 11.725 11.877 12.655
0.38923 0.40559 0.51080 0.56458 0.59263 0.69317 1.23325 1.26833 1.28469 1.36886

8.916E-07 8.590E-07 7.864E-07 7.178E-07 6.935E-07 6.887E-07 6.477E-07 6.331E-07 5.752E-07 5.243E-07
14.254 22.684 23.116 23.419 23.743 33.211 35.696 35.826 44.601 45.034
1.54188 2.45371 2.50047 2.53320 2.56827 3.59233 3.86120 3.87523 4.82447 4.87123

4.876E-07 4.321E-07 3.909E-07 3.556E-07 3.528E-07 3.479E-07 3.265E-07 2.919E-07 2.656E-07 2.453E-07
49.357 64.357 68.961 68.983 70.258 75.230 81.195 81.282 82.427 89.690
5.33884 6.96143 7.45944 7.46177 7.59972 8.13747 8.78276 8.79211 8.91603 9.70161

2.146E-07 2.130E-07 1.975E-07 1.793E-07 1.779E-07 1.415E-07 1.347E-07 1.336E-07 1.084E-07 1.076E-07
89.798 91.030 92.067 92.154 93.170 95.202 95.504 95.915 95.936 96.045
9.71330 9.84657 9.95879 9.96814 10.07803 10.29781 10.33054 10.37496 10.37730 10.38899

9.605E-08 8.032E-08 6.505E-08 4.918E-08 4.410E-08 3.310E-08
2.491E-08 1.998E-08 1.668E-08 1.253E-08
96.261 96.563 96.758 97.017 97.039 97.774
99.114 99.741 99.914 100.000
10.41237 10.44510 10.46615 10.49420 10.49654 10.57603
10.72099 10.78879 10.80750 10.81685

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= HANDCHECK 0.158
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= HANDCHECK 2.451
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= HANDCHECK 4.821
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= HANDCHECK 6.958
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= HANDCHECK 8.779

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
16	1	-11.07050	-16.43962	-1.16233
16	2	-13.00780	-15.84733	-0.96173
16	3	-13.28753	-15.82955	-0.95505
16	4	-13.68351	-15.97360	-1.01915
16	5	-13.96752	-16.54811	-1.31103
16	6	-14.36856	-16.95952	-1.55849
16	7	-14.65458	-17.98416	-2.25130
16	8	-14.93482	NUMXQ(K)= 8	

2.562E-06	0.108	1.000
1.797E-06	0.325	3.000
1.522E-06	0.541	5.000
1.197E-06	1.082	10.000
1.022E-06	1.623	15.000
9.068E-07	2.163	20.000
8.132E-07	2.704	25.000
7.320E-07	3.245	30.000
6.679E-07	3.786	35.000
6.157E-07	4.327	40.000
5.714E-07	4.868	45.000
5.274E-07	5.408	50.000
4.898E-07	5.949	55.000
4.572E-07	6.490	60.000
4.271E-07	7.031	65.000

3.912E-07	7.572	70.000
3.599E-07	8.113	75.000
3.326E-07	8.653	80.000
1.563E-06	0.5	4.62

ANNUAL AVERAGE = 9.73E-09

K= 16 FIVEXQ(K)= 1.563E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 2.85E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01
1.693E-02					
0.562	1.924	8.023	13.038	68.870	96.369
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.7	0.01	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	6.990E-07
A	2.2	0.09	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	5.284E-07
A	3.3	0.31	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	3.556E-07
A	4.4	0.33	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.677E-07
A	5.4	0.22	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	2.146E-07
A	6.5	0.18	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.793E-07
A	8.7	0.20	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.347E-07
A	10.8	0.05	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	1.084E-07
A	26.5	0.04	1500.	0.	131.	270.1	1000.0	0.0	0.000E+00	0.000E+00	4.410E-08
B	1.1	0.00	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.027E-06
B	1.7	0.04	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	4.081E-06
B	2.2	0.12	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	3.086E-06
B	3.3	0.29	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	2.077E-06
B	4.4	0.26	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.563E-06
B	5.4	0.26	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.253E-06
B	6.5	0.22	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	1.047E-06
B	8.7	0.30	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	7.864E-07
B	10.8	0.12	1500.	0.	131.	203.2	170.9	0.0	0.000E+00	0.000E+00	6.331E-07
B	26.5	0.05	1500.	0.	131.	203.2					

CA=1292.SQ.METERS
AT 131.4 METERS

170.9	0.0	0.000E+00	0.000E+00	2.575E-07			
C	1.1	0.01	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	6.833E-06			
C	1.7	0.07	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	4.627E-06			
C	2.2	0.21	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	3.498E-06			
C	3.3	0.42	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	2.354E-06			
C	4.4	0.56	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	1.772E-06			
C	5.4	0.63	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	1.421E-06			
C	6.5	0.52	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	1.187E-06			
C	8.7	0.79	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	8.916E-07			
C	10.8	0.27	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	7.178E-07			
C	26.5	0.17	1500.	0.	131.	154.3	
88.4	0.0	0.000E+00	0.000E+00	2.919E-07			
D	0.2	0.00	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	0.57	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	1.50	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	2.03	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	5.42	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	7.33	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	7.08	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	6.11	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	9.08	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	3.90	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	1.98	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.01	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	0.73	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	1.24	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	1.88	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	5.25	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	6.52	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	6.35	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			

E	7.0	5.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	6.91	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.44	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	1.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.18	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.25	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.69	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.01	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 1500.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 6.833E-06 6.027E-06 4.813E-06 4.627E-06 4.081E-06 3.498E-06 3.312E-06 3.086E-06
0.005 0.019 0.030 0.035 0.047 0.112 0.154 0.365 0.933 1.050
0.00468 0.01870 0.03039 0.03507 0.04676 0.11223 0.15431 0.36473 0.93288 1.04978

2.354E-06 2.243E-06 2.077E-06 1.880E-06 1.772E-06 1.696E-06 1.563E-06 1.421E-06 1.273E-06 1.253E-06
1.468 2.972 3.264 3.996 4.552 6.584 6.848 7.475 8.714 8.971
1.46828 2.97164 3.26389 3.99570 4.55215 6.58390 6.84810 7.47469 8.71385 8.97103

1.187E-06 1.141E-06 1.047E-06 1.024E-06 9.624E-07 8.916E-07 8.590E-07 7.864E-07 7.178E-07 6.990E-07
9.495 14.919 15.136 15.585 17.470 18.260 25.585 25.882 26.156 26.163
9.49475 14.91899 15.13643 15.58533 17.46978 18.26003 25.58509 25.88202 26.15557 26.16259

6.935E-07 6.887E-07 6.477E-07 6.331E-07 5.752E-07 5.284E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07
26.726 33.808 39.059 39.178 45.285 45.379 46.216 52.734 61.818 68.165
26.72605 33.80795 39.05917 39.17841 45.28535 45.37888 46.21589 52.73433 61.81759 68.16534

3.556E-07 3.528E-07 3.479E-07 3.265E-07 2.919E-07 2.677E-07 2.656E-07 2.575E-07 2.453E-07 2.146E-07
68.479 70.267 74.167 79.343 79.516 79.844 81.717 81.766 88.677 88.894
68.47864 70.26723 74.16707 79.34348 79.51649 79.84381 81.71658 81.76567 88.67690 88.89433

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   2.130E-07   1.975E-07   1.793E-07   1.779E-07   1.415E-07   1.347E-07
1.336E-07   1.084E-07   1.076E-07   9.605E-08
      90.461      91.901      92.079      93.117      95.092      95.289
96.392      96.439      96.619      96.867
    90.46082    91.90105    92.07874    93.11682    95.09246    95.28886
96.39242    96.43918    96.61921    96.86704

   8.032E-08   6.505E-08   4.918E-08   4.410E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      97.127      97.314      97.575      97.613      97.629      98.347
99.039      99.518      99.785      99.988
    97.12656    97.31361    97.57546    97.61287    97.62923    98.34701
99.03906    99.51836    99.78489    99.98830

   1.009E-08
     100.000
    99.99998

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

    3.244E-06             1.000              1.000
    2.279E-06             3.000              3.000
    1.891E-06             5.000              5.000
    1.400E-06            10.000             10.000
    1.138E-06            15.000             15.000
    9.853E-07            20.000             20.000
    8.707E-07            25.000             25.000
    7.785E-07            30.000             30.000
    7.018E-07            35.000             35.000
    6.372E-07            40.000             40.000
    5.847E-07            45.000             45.000
    5.373E-07            50.000             50.000
    4.938E-07            55.000             55.000
    4.531E-07            60.000             60.000
    4.146E-07            65.000             65.000
    3.805E-07            70.000             70.000
    3.519E-07            75.000             75.000

    1.891E-06             5.0                5.00

K= 17     FIVEXQ(K)= 1.891E-06     FIVEPR(K)= 5.000

FUMIGATION X/Q AT THE BOUNDARY:   2.85E-05
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EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	7.442E-01	3.613E-01	3.314E-01	2.419E-01	2.081E-01	1.693E-02
1.417	3.077	12.504	16.153	61.158	96.932	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 6.833E-06 6.027E-06 4.813E-06 4.627E-06 4.081E-06 3.498E-06 3.312E-06 3.086E-06
0.005 0.019 0.030 0.035 0.047 0.112 0.154 0.365 0.933 1.050
0.00468 0.01870 0.03039 0.03507 0.04676 0.11223 0.15431 0.36473 0.93288 1.04978

2.354E-06 2.243E-06 2.077E-06 1.880E-06 1.772E-06 1.696E-06 1.563E-06 1.421E-06 1.273E-06 1.253E-06
1.468 2.972 3.264 3.996 4.552 6.584 6.848 7.475 8.714 8.971
1.46828 2.97164 3.26389 3.99570 4.55215 6.58390 6.84810 7.47469 8.71385 8.97103

1.187E-06 1.141E-06 1.047E-06 1.024E-06 9.624E-07 8.916E-07 8.590E-07 7.864E-07 7.178E-07 6.990E-07
9.495 14.919 15.136 15.585 17.470 18.260 25.585 25.882 26.156 26.163
9.49475 14.91898 15.13642 15.58532 17.46978 18.26003 25.58509 25.88202 26.15557 26.16258

6.935E-07 6.887E-07 6.477E-07 6.331E-07 5.752E-07 5.284E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07
26.726 33.808 39.059 39.178 45.285 45.379 46.216 52.734 61.818 68.165
26.72605 33.80795 39.05917 39.17842 45.28536 45.37888 46.21590 52.73434 61.81759 68.16535

3.556E-07 3.528E-07 3.479E-07 3.265E-07 2.919E-07 2.677E-07 2.656E-07 2.575E-07 2.453E-07 2.146E-07
68.479 70.267 74.167 79.343 79.516 79.844 81.717 81.766 88.677 88.894
68.47865 70.26726 74.16711 79.34352 79.51653 79.84384 81.71661 81.76569 88.67693 88.89437

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   2.130E-07   1.975E-07   1.793E-07   1.779E-07   1.415E-07   1.347E-07
1.336E-07   1.084E-07   1.076E-07   9.605E-08
      90.461      91.901      92.079      93.117      95.092      95.289
96.392      96.439      96.619      96.867
    90.46085    91.90109    92.07878    93.11687    95.09250    95.28889
96.39244    96.43919    96.61920    96.86705

   8.032E-08   6.505E-08   4.918E-08   4.410E-08   4.375E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      97.127      97.314      97.575      97.613      97.629      98.347
99.039      99.518      99.785      99.988
    97.12656    97.31360    97.57546    97.61285    97.62921    98.34699
99.03905    99.51833    99.78487    99.98827

   1.009E-08
     100.000
    99.99995
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BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
18	1	-11.07050	-14.96087	-0.99578
18	2	-12.61806	-14.48224	-0.79234
18	3	-13.28753	-14.56357	-0.84628
18	4	-13.68351	-14.45256	-0.73953
18	5	-13.96752	-14.45658	-0.74567
18	6	-14.24977	-14.43669	-0.67393
18	7	-14.75472	-14.50929	-0.52007
18	8	-14.93482	NUMXQ(K)= 8	

3.244E-06	1.000	1.000
2.279E-06	3.000	3.000
1.891E-06	5.000	5.000
1.400E-06	10.000	10.000
1.138E-06	15.000	15.000
9.853E-07	20.000	20.000
8.707E-07	25.000	25.000
7.785E-07	30.000	30.000
7.018E-07	35.000	35.000
6.372E-07	40.000	40.000
5.847E-07	45.000	45.000
5.373E-07	50.000	50.000
4.938E-07	55.000	55.000
4.531E-07	60.000	60.000

4.146E-07	65.000	65.000
3.805E-07	70.000	70.000
3.519E-07	75.000	75.000
1.891E-06	5.0	5.00

K= 18 FIVEXQ(K)= 1.891E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-2.85667	0.21406	6.22377
2	-1.82431	3.40524	3.53187
3	-2.66891	0.38050	3.10925
4	-2.60561	0.45856	3.53945
5	-2.57624	0.49942	4.77421
6	-2.67634	0.37217	4.27580
7	-2.96887	0.14946	5.37250
8	-2.97368	0.14713	5.06821
9	-2.99281	0.13822	10.01358
10	-3.06786	0.10781	5.86067
11	-3.04312	0.11708	4.97718
12	-3.15564	0.08008	4.96786
13	-3.00969	0.13077	7.81606
14	-3.04492	0.11638	8.71109
15	-3.07911	0.10381	10.94163
16	-2.92242	0.17367	10.81685

K	HOURS(K)	TOTHRS
1	18.75150	18.75150
2	298.29880	317.05030
3	33.33164	350.38190
4	40.17006	390.55200
5	43.74879	434.30080
6	32.60169	466.90240
7	13.09258	479.99500
8	12.88894	492.88400
9	12.10783	504.99180
10	9.44389	514.43570
11	10.25581	524.69150
12	7.01491	531.70640
13	11.45516	543.16150
14	10.19472	553.35620
15	9.09405	562.45030
16	15.21350	577.66380

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.678E-06	5.802E-09	-0.6759	-12.8293			
					1	8.0	-14.23475
					2	16.0	-14.70322
					3	72.0	-15.71979
					4	624.0	-17.17932
2	1.577E-06	6.039E-09	-0.6637	-12.9001			
					1	8.0	-14.28014
					2	16.0	-14.74017
					3	72.0	-15.73839
					4	624.0	-17.17159
3	1.894E-06	6.528E-09	-0.6763	-12.7079			
					1	8.0	-14.11412
					2	16.0	-14.58288
					3	72.0	-15.60005
					4	624.0	-17.06044

4	2.091E-06	8.916E-09	-0.6509	-12.6269			
					1	8.0	-13.98029
					2	16.0	-14.43143
					3	72.0	-15.41036
					4	624.0	-16.81586
5	2.179E-06	1.085E-08	-0.6323	-12.5984			
					1	8.0	-13.91338
					2	16.0	-14.35169
					3	72.0	-15.30279
					4	624.0	-16.66834
6	1.920E-06	8.558E-09	-0.6456	-12.7159			
					1	8.0	-14.05831
					2	16.0	-14.50577
					3	72.0	-15.47673
					4	624.0	-16.87079
7	1.553E-06	5.858E-09	-0.6654	-12.9144			
					1	8.0	-14.29814
					2	16.0	-14.75939
					3	72.0	-15.76028
					4	624.0	-17.19730
8	1.357E-06	3.079E-09	-0.7261	-13.0071			
					1	8.0	-14.51690
					2	16.0	-15.02018
					3	72.0	-16.11226
					4	624.0	-17.68022
9	1.478E-06	7.406E-09	-0.6317	-12.9867			
					1	8.0	-14.30023
					2	16.0	-14.73806
					3	72.0	-15.68812
					4	624.0	-17.05217
10	1.268E-06	3.589E-09	-0.6997	-13.0931			
					1	8.0	-14.54810
					2	16.0	-15.03311
					3	72.0	-16.08554
					4	624.0	-17.59658
11	1.257E-06	3.138E-09	-0.7147	-13.0911			
					1	8.0	-14.57737
					2	16.0	-15.07278
					3	72.0	-16.14777
					4	624.0	-17.69120
12	1.166E-06	2.837E-09	-0.7178	-13.1643			
					1	8.0	-14.65695
					2	16.0	-15.15449
					3	72.0	-16.23411
					4	624.0	-17.78417
13	1.271E-06	5.493E-09	-0.6493	-13.1255			
					1	8.0	-14.47568
					2	16.0	-14.92573
					3	72.0	-15.90230
					4	624.0	-17.30441
14	1.118E-06	4.966E-09	-0.6460	-13.2566			
					1	8.0	-14.59982
					2	16.0	-15.04756
					3	72.0	-16.01912
					4	624.0	-17.41404
15	1.285E-06	4.526E-09	-0.6737	-13.0976			
					1	8.0	-14.49850
					2	16.0	-14.96547
					3	72.0	-15.97876
					4	624.0	-17.43359

16	1.563E-06	9.726E-09	-0.6058	-12.9492			
					1	8.0	-14.20889
					2	16.0	-14.62877
					3	72.0	-15.53989
					4	624.0	-16.84803
17	1.891E-06	1.085E-08	-0.6154	-12.7521			
					1	8.0	-14.03183
					2	16.0	-14.45841
					3	72.0	-15.38405
					4	624.0	-16.71305
18	1.891E-06	1.085E-08	-0.6154	-12.7521			
					1	8.0	-14.03183
					2	16.0	-14.45841
					3	72.0	-15.38405
					4	624.0	-16.71305

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

0-2 HR X/Q IS

SECTOR	DOWNWIND DISTANCE EXCEEDED (METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS	1-4 DAYS	4-30 DAYS	ANNUAL AVERAGE	IN SECTOR	SECTOR
S	1500.	1.68E-06	6.58E-07	4.12E-07	1.49E-07	3.46E-08	5.80E-09	18.8	S
SSW	1500.	1.58E-06	6.28E-07	3.97E-07	1.46E-07	3.49E-08	6.04E-09	298.3	SSW
SW	1500.	1.89E-06	7.42E-07	4.64E-07	1.68E-07	3.90E-08	6.53E-09	33.3	SW
WSW	1500.	2.09E-06	8.48E-07	5.40E-07	2.03E-07	4.98E-08	8.92E-09	40.2	WSW
W	1500.	2.18E-06	9.07E-07	5.85E-07	2.26E-07	5.77E-08	1.09E-08	43.7	W
WNW	1500.	1.92E-06	7.84E-07	5.01E-07	1.90E-07	4.71E-08	8.56E-09	32.6	WNW
NW	1500.	1.55E-06	6.17E-07	3.89E-07	1.43E-07	3.40E-08	5.86E-09	13.1	NW
NNW	1500.	1.36E-06	4.96E-07	3.00E-07	1.01E-07	2.10E-08	3.08E-09	12.9	NNW
N	1500.	1.48E-06	6.16E-07	3.98E-07	1.54E-07	3.93E-08	7.41E-09	12.1	N
NNE	1500.	1.27E-06	4.81E-07	2.96E-07	1.03E-07	2.28E-08	3.59E-09	9.4	NNE
NE	1500.	1.26E-06	4.67E-07	2.84E-07	9.71E-08	2.07E-08	3.14E-09	10.3	NE
ENE	1500.	1.17E-06	4.31E-07	2.62E-07	8.90E-08	1.89E-08	2.84E-09	7.0	ENE
E	1500.	1.27E-06	5.17E-07	3.29E-07	1.24E-07	3.05E-08	5.49E-09	11.5	E
ESE	1500.	1.12E-06	4.56E-07	2.92E-07	1.10E-07	2.74E-08	4.97E-09	10.2	ESE
SE	1500.	1.29E-06	5.05E-07	3.17E-07	1.15E-07	2.68E-08	4.53E-09	9.1	SE
SSE	1500.	1.56E-06	6.75E-07	4.43E-07	1.78E-07	4.82E-08	9.73E-09	15.2	SSE
MAX X/Q		2.18E-06							
TOTAL HOURS AROUND SITE:		577.7							
SRP 2.3.4	1500.	1.89E-06	8.05E-07	5.26E-07					

2.08E-07 5.52E-08 1.09E-08
SITE LIMIT 1.89E-06 8.05E-07 5.26E-07
2.08E-07 5.52E-08 1.09E-08

THE FIVE-PERCENT-FOR-THE-ENTIRE-SITE X/Q IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

DOWNWIND SECTOR	DISTANCE (METERS)	FUMIGATION X/Q
S	1500.	2.85E-05
SSW	1500.	2.85E-05
SW	1500.	2.85E-05
WSW	1500.	2.85E-05
W	1500.	2.85E-05
WNW	1500.	2.85E-05
NW	1500.	2.85E-05
NNW	1500.	2.85E-05
N	1500.	2.85E-05
NNE	1500.	2.85E-05
NE	1500.	2.85E-05
ENE	1500.	2.85E-05
E	1500.	2.85E-05
ESE	1500.	2.85E-05
SE	1500.	2.85E-05
SSE	1500.	2.85E-05

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY.
CHECK THE REASONABLENESS OF THE ENVELOPES
COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY
FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.19	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.743E-07
A	4.4	0.04	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	8.7	0.08	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	10.8	0.04	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	8.362E-08
A	26.5	0.04	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	3.401E-08
B	2.2	0.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.997E-06
B	3.3	0.45	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.08	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.11	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.30	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
C	2.2	0.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.68	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.98	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.79	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.30	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.53	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.15	2000.	0.	131.	200.0		
114.9	0.0	0.000E+00	0.000E+00	6.684E-07				
C	26.5	0.04	2000.	0.	131.	200.0		
114.9	0.0	0.000E+00	0.000E+00	2.719E-07				
D	0.2	0.01	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.556E-05				
D	1.1	0.68	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.312E-06				
D	1.7	1.54	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	2.243E-06				
D	2.2	2.52	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.696E-06				
D	3.3	7.85	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.141E-06				
D	4.4	8.11	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	8.590E-07				
D	5.4	8.90	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	6.887E-07				
D	6.5	8.75	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	5.752E-07				
D	8.7	10.44	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	4.321E-07				
D	10.8	2.59	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.479E-07				
D	26.5	0.94	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.415E-07				
E	0.3	0.02	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.835E-06				
E	1.2	0.79	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.880E-06				
E	1.8	1.47	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.273E-06				
E	2.4	1.88	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	9.624E-07				
E	3.5	5.15	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	6.477E-07				
E	4.7	6.65	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	4.876E-07				
E	5.9	6.76	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.909E-07				
E	7.0	3.83	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.265E-07				
E	9.3	4.13	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	2.453E-07				
E	11.6	0.90	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.975E-07				
E	28.5	0.30	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.032E-08				
F	0.3	0.02	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	4.813E-06				
F	1.2	0.60	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	1.024E-06				
F	1.8	0.38	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	6.935E-07				
F	2.4	0.98	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	5.243E-07				
F	3.5	1.99	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.33	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.09	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.08	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	28.5	0.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.31	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.64	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	9.3	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.257E-06	2.243E-06	2.192E-06	1.997E-06	1.880E-06	1.696E-06	
0.006	0.021	0.036	0.713	0.863	2.403	3.079	3.117	3.906	6.423	
0.00035	0.00129	0.00226	0.04435	0.05370	0.14956	0.19164	0.19398	0.24308	0.39973	

1.650E-06	1.344E-06	1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06	9.624E-07	8.590E-07	
7.399	7.850	8.639	10.104	17.955	18.256	18.857	18.895	20.773	28.887	
0.46052	0.48857	0.53767	0.62885	1.11750	1.13621	1.17362	1.17595	1.29286	1.79787	

8.302E-07	8.111E-07	6.935E-07	6.887E-07	6.774E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	5.089E-07	
29.413	29.488	29.864	38.767	38.880	39.030	44.177	52.930	53.906	54.207	
1.83060	1.83528	1.85866	2.41277	2.41979	2.42914	2.74945	3.29421	3.35500	3.37371	

4.876E-07	4.321E-07	4.097E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.743E-07	2.719E-07	2.656E-07	
60.856	71.299	71.337	78.099	80.090	82.682	86.514	86.702	86.739	89.068	
3.78754	4.43751	4.43985	4.86069	4.98461	5.14593	5.38441	5.39610	5.39844	5.54340	

2.453E-07	2.130E-07	2.065E-07	1.975E-07	1.779E-07	1.415E-07	1.336E-07	1.039E-07	9.605E-08	8.362E-08	
93.201	94.290	94.328	95.229	95.680	96.619	96.694	96.769	97.032	97.070	
5.80058	5.86839	5.87072	5.92684	5.95489	6.01334	6.01802	6.02270	6.03906	6.04140	

8.032E-08 6.505E-08 4.918E-08 4.375E-08 3.401E-08 3.310E-08
2.491E-08 1.998E-08 1.253E-08
97.370 97.521 97.671 97.708 97.746 99.061
99.700 99.962 100.000
6.06011 6.06946 6.07881 6.08115 6.08349 6.16532
6.20506 6.22143 6.22377

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= HANDCHECK 0.399
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= HANDCHECK 1.116
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= HANDCHECK 1.796
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= HANDCHECK 3.291
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= HANDCHECK 4.434
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= HANDCHECK 4.857

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
1	1	-11.07050	-16.47839	-1.20288
1	2	-13.28753	-14.77611	-0.56116
1	3	-13.31455	-16.32003	-1.15394
1	4	-13.68351	-17.15443	-1.51913
1	5	-13.96752	-17.22557	-1.55304
1	6	-14.36856	-18.20307	-2.08440
1	7	-14.65458	-18.57110	-2.30058
1	8	-14.75472		

NUMXQ(K)= 8

3.390E-06	0.062	1.000
2.283E-06	0.187	3.000
1.875E-06	0.311	5.000
1.462E-06	0.622	10.000
1.234E-06	0.934	15.000
1.072E-06	1.245	20.000
9.383E-07	1.556	25.000
8.387E-07	1.867	30.000
7.596E-07	2.178	35.000
6.958E-07	2.490	40.000
6.430E-07	2.801	45.000
5.983E-07	3.112	50.000
5.549E-07	3.423	55.000

5.109E-07	3.734	60.000
4.730E-07	4.045	65.000
4.400E-07	4.357	70.000
4.088E-07	4.668	75.000
1.597E-06	0.5	8.03

ANNUAL AVERAGE = 9.06E-09

K= 1 FIVEXQ(K)= 1.597E-06 FIVEPR(K)= 8.034

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.376	1.428	5.034	12.976	65.311	97.183	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.13	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	4.075E-07
A	3.3	0.40	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.743E-07
A	4.4	0.20	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.40	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.07	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.26	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	10.8	0.13	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	8.362E-08
B	1.1	0.07	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	3.900E-06
B	1.7	0.07	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	2.641E-06
B	2.2	0.46	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.997E-06
B	3.3	0.99	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.73	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.33	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	8.7	0.13	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.20	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
C	1.1	0.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.20	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	0.46	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06

C	3.3	0.93	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.192E-06		
C	4.4	0.79	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.650E-06		
C	5.4	0.40	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.323E-06		
C	6.5	0.53	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.105E-06		
C	8.7	0.13	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
C	10.8	0.07	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.20	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	1.19	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	2.65	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	3.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	7.88	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	11.58	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	10.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.55	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	7.48	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	1.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.66	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.99	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.85	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	6.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.67	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.23	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	1.99	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	1.72	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.66	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.07	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		

F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.46	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.26	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.26	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.26	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
G	1.2	0.60	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.33	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.60	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.53	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.362E-06	4.813E-06	4.309E-06	3.900E-06	3.312E-06	3.257E-06	2.641E-06	2.243E-06	
0.010	0.029	0.161	0.173	0.372	0.438	1.630	2.093	2.159	4.807	
0.00035	0.00102	0.00569	0.00612	0.01314	0.01547	0.05756	0.07392	0.07626	0.16978	
2.192E-06	1.997E-06	1.880E-06	1.696E-06	1.650E-06	1.344E-06	1.323E-06	1.273E-06	1.141E-06	1.105E-06	
5.734	6.197	7.190	10.699	11.493	12.486	12.883	14.803	22.681	23.210	
0.20252	0.21888	0.25395	0.37787	0.40592	0.44100	0.45502	0.52283	0.80105	0.81976	
1.024E-06	1.012E-06	9.624E-07	8.590E-07	8.302E-07	8.111E-07	6.935E-07	6.887E-07	6.684E-07	6.477E-07	
23.674	24.402	27.248	38.833	38.965	39.296	40.091	50.087	50.153	56.243	
0.83612	0.86184	0.96238	1.37153	1.37621	1.38790	1.41595	1.76900	1.77134	1.98643	
5.752E-07	5.243E-07	5.089E-07	4.876E-07	4.321E-07	4.097E-07	4.075E-07	3.909E-07	3.528E-07	3.479E-07	
62.797	63.657	63.790	72.462	79.942	80.141	80.273	85.503	86.760	88.614	
2.21790	2.24829	2.25297	2.55925	2.82345	2.83046	2.83514	3.01985	3.06427	3.12973	
3.265E-07	2.743E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	2.065E-07	1.975E-07	1.779E-07	1.655E-07	
90.600	90.997	91.196	92.453	94.175	94.770	94.969	95.631	95.896	96.293	
3.19987	3.21390	3.22092	3.26534	3.32613	3.34717	3.35418	3.37756	3.38692	3.40094	

```
   1.415E-07   1.382E-07   1.039E-07   9.605E-08   8.362E-08   8.032E-08
6.505E-08   4.918E-08   3.310E-08   2.491E-08
      96.955      97.021      97.286      97.882      98.014      98.080
98.411      99.007      99.537      99.735
     3.42432     3.42666     3.43601     3.45706     3.46173     3.46407
3.47576     3.49680     3.51551     3.52252

   1.998E-08
     100.000
     3.53187

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.074
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.405
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.370
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.984
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.216
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.557

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1     -11.07050 -16.41105  -1.18790
  2  2     -12.63456 -16.70077  -1.27903
  2  3     -13.31455 -17.22822  -1.47825
  2  4     -13.96752 -18.15219  -1.89714
  2  5     -14.24977 -19.57660  -2.58961
  2  6     -14.36856 -19.83615  -2.71867
  2  7     -14.53378     NUMXQ(K)=  7
    4.171E-06              0.035              1.000
    2.845E-06              0.106              3.000
    2.331E-06              0.177              5.000
    1.752E-06              0.353             10.000
    1.442E-06              0.530             15.000
    1.241E-06              0.706             20.000
    1.100E-06              0.883             25.000
    9.947E-07              1.060             30.000
    9.118E-07              1.236             35.000
    8.403E-07              1.413             40.000
```

7.691E-07	1.589	45.000
7.097E-07	1.766	50.000
6.592E-07	1.943	55.000
6.043E-07	2.119	60.000
5.529E-07	2.296	65.000
5.076E-07	2.472	70.000
1.485E-06	0.5	14.16

ANNUAL AVERAGE = 7.58E-09

K= 2 FIVEXQ(K)= 1.485E-06 FIVEPR(K)=14.157

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.589	4.568	8.407	13.914	67.279	97.484
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS

AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.75	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	4.075E-07
A	3.3	0.75	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.743E-07
A	4.4	0.83	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.75	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.15	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.68	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
B	1.1	0.08	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	3.900E-06
B	1.7	0.08	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	2.641E-06
B	2.2	0.38	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.997E-06
B	3.3	0.68	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.83	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.30	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.23	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.08	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	26.5	0.08	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.667E-07
C	1.1	0.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.75	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	0.83	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06

C	3.3	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.23	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	8.7	0.30	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
D	0.2	0.02	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	2.11	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	6.02	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	5.87	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	9.02	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	9.40	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	8.87	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	6.02	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	3.91	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	0.98	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.75	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.58	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	2.63	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	6.84	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	7.14	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	5.19	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	1.88	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	1.28	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	0.23	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.45	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.03	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.98	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.68	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.35	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.53	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
G	1.2	0.45	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.362E-06	4.813E-06	4.309E-06	3.900E-06	3.312E-06	3.257E-06	2.641E-06	2.243E-06		
0.017	0.039	0.189	0.215	0.967	1.042	3.147	3.975	4.050	10.065		
0.00054	0.00121	0.00589	0.00668	0.03006	0.03240	0.09786	0.12358	0.12592	0.31296		

2.192E-06	1.997E-06	1.880E-06	1.696E-06	1.650E-06	1.344E-06	1.323E-06	1.273E-06	1.141E-06	1.024E-06		
11.193	11.569	12.697	18.563	19.164	19.841	20.067	21.646	30.669	31.647		
0.34803	0.35972	0.39479	0.57716	0.59586	0.61691	0.62392	0.67302	0.95358	0.98398		

1.012E-06	9.624E-07	8.590E-07	8.302E-07	8.111E-07	6.935E-07	6.887E-07	6.774E-07	6.477E-07	5.752E-07		
32.474	35.106	44.505	44.806	45.107	45.784	54.657	54.882	61.725	67.741		
1.00969	1.09153	1.38378	1.39313	1.40248	1.42353	1.69941	1.70643	1.91919	2.10623		

5.243E-07	5.089E-07	4.876E-07	4.321E-07	4.075E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.743E-07		
68.794	68.869	76.012	79.923	80.675	85.863	87.217	88.194	90.074	90.826		
2.13896	2.14130	2.36342	2.48499	2.50837	2.66970	2.71178	2.74218	2.80063	2.82401		

2.656E-07	2.453E-07	2.130E-07	2.065E-07	1.975E-07	1.779E-07	1.667E-07	1.655E-07	1.415E-07	1.382E-07		
91.352	92.631	93.082	93.909	94.135	94.360	94.436	95.187	95.939	96.090		
2.84037	2.88012	2.89415	2.91987	2.92688	2.93390	2.93623	2.95961	2.98299	2.98767		

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   1.039E-07   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08
2.491E-08   1.998E-08
      96.767      97.218      97.669      98.045      98.421      99.549
99.925     100.000
     3.00871     3.02274     3.03677     3.04846     3.06015     3.09522
3.10691     3.10925

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


         X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.123
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.348
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.576
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.382
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.917
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.104
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.361

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  3  1     -11.07050 -16.08088  -1.13849
  3  2     -12.63456 -16.28907  -1.20726
  3  3     -13.03054 -17.04284  -1.48653
  3  4     -13.28753 -18.59058  -2.09920
  3  5     -13.96752 -18.70812  -2.15257
  3  6     -14.24977 -20.64870  -3.08952
  3  7     -14.36856 -21.30724  -3.41349
  3  8     -14.53378     NUMXQ(K)=  8
    5.107E-06             0.031             1.000
    3.584E-06             0.093             3.000
    2.993E-06             0.155             5.000
    2.293E-06             0.311            10.000
    1.893E-06             0.466            15.000
    1.604E-06             0.622            20.000
    1.356E-06             0.777            25.000
    1.178E-06             0.933            30.000
    1.043E-06             1.088            35.000
    9.372E-07             1.244            40.000
    8.510E-07             1.399            45.000
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7.781E-07	1.555	50.000
7.166E-07	1.710	55.000
6.641E-07	1.866	60.000
6.065E-07	2.021	65.000
5.489E-07	2.176	70.000
4.971E-07	2.332	75.000
1.826E-06	0.5	16.08

ANNUAL AVERAGE = 8.36E-09

K= 3 FIVEXQ(K)= 1.826E-06 FIVEPR(K)=16.081

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
3.910	6.617	10.603	15.892	68.847	97.218
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.66	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	4.075E-07
A	3.3	1.52	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.743E-07
A	4.4	1.19	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.73	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.86	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.73	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	10.8	0.07	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	8.362E-08
B	1.7	0.59	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	2.641E-06
B	2.2	0.53	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.997E-06
B	3.3	0.73	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	1.19	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.13	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.07	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.07	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
C	1.1	0.07	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.362E-06
C	1.7	0.92	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	4.309E-06
C	2.2	1.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	1.12	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06

C	4.4	0.73	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.650E-06		
C	5.4	0.53	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.323E-06		
C	6.5	0.20	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	1.105E-06		
C	8.7	0.13	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	8.302E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	1.72	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	6.14	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	6.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	11.49	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	12.35	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	8.12	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.91	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.73	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.13	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.03	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	1.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	2.71	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.37	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	9.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	5.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	2.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	0.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	0.40	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.07	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	1.06	90000.	0.	131.	1000.0

```
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.66    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.12    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       0.66    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07

   G         1.2       0.40    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.86    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	6.362E-06	4.813E-06	4.309E-06	3.312E-06	3.257E-06	2.641E-06	2.243E-06	2.192E-06
0.014	0.039	0.106	0.123	1.048	2.765	3.822	4.416	10.560	11.683
0.00050	0.00140	0.00373	0.00434	0.03708	0.09786	0.13527	0.15632	0.37375	0.41350

1.997E-06	1.880E-06	1.696E-06	1.650E-06	1.344E-06	1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06
12.211	13.532	20.072	20.798	21.525	22.053	24.762	36.256	36.454	37.114
0.43220	0.47896	0.71043	0.73615	0.76187	0.78057	0.87643	1.28325	1.29026	1.31364

1.012E-06	9.624E-07	8.590E-07	8.302E-07	8.111E-07	6.935E-07	6.887E-07	6.774E-07	6.477E-07	5.752E-07
38.303	41.672	54.025	54.157	54.289	55.346	63.471	63.537	72.653	76.220
1.35573	1.47497	1.91218	1.91685	1.92153	1.95894	2.24652	2.24885	2.57150	2.69776

5.243E-07	5.089E-07	4.876E-07	4.321E-07	4.075E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.743E-07
76.880	76.946	82.693	85.600	86.260	88.903	90.025	90.752	91.347	92.866
2.72114	2.72348	2.92688	3.02976	3.05314	3.14666	3.18641	3.21212	3.23317	3.28694

2.656E-07	2.453E-07	2.065E-07	1.975E-07	1.655E-07	1.415E-07	1.382E-07	1.039E-07	9.605E-08	8.362E-08
93.526	93.923	95.112	95.376	96.103	96.235	97.094	97.820	98.216	98.283
3.31032	3.32435	3.36643	3.37579	3.40150	3.40618	3.43658	3.46229	3.47632	3.47866

8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08
98.349	98.613	98.877	99.736	100.000
3.48100	3.49035	3.49970	3.53010	3.53945

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.135
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.413
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.710
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.282
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.910
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.569
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.924
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
4	1	-11.07050	-15.94489	-1.10357
4	2	-12.63456	-15.94842	-1.10474
4	3	-13.03054	-16.62448	-1.36070
4	4	-13.28753	-17.68789	-1.79433
4	5	-13.68351	-17.66951	-1.78609
4	6	-13.96752	-18.67131	-2.26943
4	7	-14.24977	-24.08993	-5.05063
4	8	-14.53378		

NUMXQ(K)= 8

4.993E-06	0.035	1.000
3.531E-06	0.106	3.000
2.973E-06	0.177	5.000
2.323E-06	0.354	10.000
1.951E-06	0.531	15.000
1.698E-06	0.708	20.000
1.469E-06	0.885	25.000
1.300E-06	1.062	30.000
1.169E-06	1.239	35.000
1.066E-06	1.416	40.000
9.803E-07	1.593	45.000
9.088E-07	1.770	50.000
8.448E-07	1.947	55.000
7.784E-07	2.124	60.000

7.213E-07	2.301	65.000
6.716E-07	2.478	70.000
6.044E-07	2.655	75.000
5.246E-07	2.832	80.000
2.007E-06	0.5	14.13

ANNUAL AVERAGE = 1.07E-08

K= 4 FIVEXQ(K)= 2.007E-06 FIVEPR(K)=14.126

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
5.747	9.050	13.806	17.985	71.703	97.952
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.7	0.15	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	5.390E-07								
A	2.2	0.73	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	4.075E-07								
A	3.3	2.89	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	2.743E-07								
A	4.4	2.11	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	2.065E-07								
A	5.4	0.64	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	1.655E-07								
A	6.5	0.39	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	1.382E-07								
A	8.7	0.10	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	1.039E-07								
B	1.7	0.24	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	2.641E-06								
B	2.2	1.03	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	1.997E-06								
B	3.3	1.67	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	1.344E-06								
B	4.4	0.29	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	1.012E-06								
B	5.4	0.24	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	8.111E-07								
B	6.5	0.15	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	6.774E-07								
C	1.7	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	4.309E-06								
C	2.2	1.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	3.257E-06								
C	3.3	0.83	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.192E-06								
C	4.4	0.49	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.650E-06								
C	5.4	0.24	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.323E-06								

AT 131.4 METERS
CA=1292.SQ.METERS

C	6.5	0.10	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.105E-06						
C	8.7	0.10	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
C	10.8	0.05	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.37	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	4.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	6.37	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	11.12	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	10.53	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	6.56	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	5.04	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	4.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.18	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.88	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.76	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	8.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	6.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	3.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.81	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.91	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.54	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	1.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.54	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.64	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	0.73	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.24	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	28.5	0.20	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.39	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	4.309E-06	3.312E-06	3.257E-06	2.641E-06	2.243E-06	2.192E-06	1.997E-06
0.011	0.034	0.048	0.097	1.468	2.986	3.231	7.492	8.324	9.353
0.00054	0.00161	0.00228	0.00462	0.07009	0.14257	0.15426	0.35767	0.39741	0.44651

1.880E-06	1.696E-06	1.650E-06	1.344E-06	1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06
10.528	16.894	17.384	19.049	19.294	21.057	32.174	32.272	32.810	33.104
0.50262	0.80657	0.82995	0.90944	0.92113	1.00530	1.53603	1.54071	1.56643	1.58046

9.624E-07	8.590E-07	8.302E-07	8.111E-07	6.935E-07	6.887E-07	6.774E-07	6.684E-07	6.477E-07	5.752E-07
36.287	46.816	46.914	47.159	48.139	54.701	54.848	54.897	63.124	68.168
1.73243	2.23511	2.23978	2.25147	2.29823	2.61153	2.61854	2.62088	3.01367	3.25449

5.390E-07	5.243E-07	4.876E-07	4.321E-07	4.075E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.743E-07
68.315	68.952	74.975	79.236	79.970	83.301	84.035	85.210	87.022	89.912
3.26150	3.29190	3.57947	3.78288	3.81795	3.97694	4.01201	4.06812	4.15463	4.29257

2.656E-07	2.453E-07	2.130E-07	2.065E-07	1.975E-07	1.655E-07	1.415E-07	1.382E-07	1.039E-07	9.605E-08
90.597	92.507	92.752	94.858	95.397	96.033	96.915	97.307	97.404	97.796
4.32531	4.41649	4.42818	4.52872	4.55443	4.58483	4.62691	4.64562	4.65029	4.66900

8.032E-08	6.505E-08	4.918E-08	4.375E-08	3.310E-08	2.491E-08
98.825	99.070	99.314	99.510	99.853	100.000
4.71810	4.72979	4.74148	4.75083	4.76719	4.77421

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.142
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.806
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.534
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.233
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.011
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.251
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
5	1	-11.07050	-15.92725	-1.10358
5	2	-12.63456	-16.00938	-1.13111
5	3	-13.28753	-17.17291	-1.61463
5	4	-13.68351	-17.68902	-1.85345
5	5	-13.96752	-18.37188	-2.19353
5	6	-14.24977	-20.78571	-3.47803
5	7	-14.36856	NUMXQ(K)= 7	

4.638E-06	0.048	1.000
3.252E-06	0.143	3.000
2.714E-06	0.239	5.000
2.092E-06	0.477	10.000
1.780E-06	0.716	15.000
1.533E-06	0.955	20.000
1.338E-06	1.194	25.000
1.193E-06	1.432	30.000
1.072E-06	1.671	35.000
9.695E-07	1.910	40.000
8.858E-07	2.148	45.000
8.082E-07	2.387	50.000
7.390E-07	2.626	55.000
6.802E-07	2.865	60.000
6.192E-07	3.103	65.000
2.055E-06	0.5	10.47

ANNUAL AVERAGE = 1.27E-08

K= 5 FIVEXQ(K)= 2.055E-06 FIVEPR(K)=10.473

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
7.003	10.627	14.006	18.036	69.615	98.629
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	2.2	0.16	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	4.075E-07
A	3.3	1.37	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.743E-07
A	4.4	2.19	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.93	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.16	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.16	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	10.8	0.05	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	8.362E-08
A	26.5	0.05	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	3.401E-08
B	2.2	0.27	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.997E-06
B	3.3	1.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	1.15	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.49	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	8.7	0.11	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.05	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
C	2.2	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	2.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	1.15	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06

C	6.5	0.16	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	1.105E-06						
C	8.7	0.16	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	8.302E-07						
C	10.8	0.11	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.09	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	3.61	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	4.21	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	9.79	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	9.19	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	7.05	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	5.58	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	5.14	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.31	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.38	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.93	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.35	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.62	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	6.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	3.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	2.52	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	1.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.16	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.60	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.98	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       1.53     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.98     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.60     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.11     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G        1.2       0.11     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.16     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.27     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.257E-06	2.243E-06	2.192E-06	1.997E-06	1.880E-06	1.696E-06	
0.009	0.027	0.044	1.138	2.067	5.676	7.863	8.137	9.066	13.277	
0.00038	0.00115	0.00188	0.04864	0.08838	0.24269	0.33622	0.34791	0.38765	0.56768	

1.650E-06	1.344E-06	1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06	9.624E-07	8.590E-07
14.425	15.464	16.065	18.417	28.204	28.368	29.025	30.173	32.798	41.984
0.61678	0.66120	0.68692	0.78746	1.20596	1.21298	1.24103	1.29013	1.40236	1.79515

8.302E-07	8.111E-07	6.935E-07	6.887E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	5.089E-07	4.876E-07
42.148	42.640	43.242	50.295	50.405	56.584	62.161	63.145	63.255	70.582
1.80216	1.82320	1.84892	2.15053	2.15521	2.41940	2.65788	2.69997	2.70464	3.01794

4.321E-07	4.097E-07	4.075E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.743E-07	2.656E-07	2.453E-07
75.722	75.777	75.941	82.283	83.815	85.127	88.462	89.829	90.814	93.329
3.23771	3.24005	3.24707	3.51828	3.58374	3.63986	3.78248	3.84093	3.88301	3.99056

2.130E-07	2.065E-07	1.975E-07	1.779E-07	1.655E-07	1.415E-07	1.382E-07	1.336E-07	1.039E-07	9.605E-08
93.930	96.118	97.211	97.321	98.250	98.633	98.797	98.852	99.016	99.125
4.01628	4.10980	4.15656	4.16124	4.20098	4.21735	4.22436	4.22670	4.23372	4.23839

8.362E-08 8.032E-08 6.505E-08 4.918E-08 3.401E-08 3.310E-08
2.491E-08 1.998E-08
99.180 99.344 99.508 99.563 99.617 99.891
99.945 100.000
4.24073 4.24774 4.25476 4.25710 4.25943 4.27112
4.27346 4.27580

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.336
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(3)= 0.616
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 1.205
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 1.793
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 2.417
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 2.655
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= 3.015
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(9)= 3.515

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
6	1	-11.07050	-16.04447	-1.11191
6	2	-13.03054	-16.73583	-1.36697
6	3	-13.31455	-17.05095	-1.49288
6	4	-13.68351	-17.75880	-1.80669
6	5	-13.96752	-18.74068	-2.27460
6	6	-14.24977	-20.06769	-2.94671
6	7	-14.36856	-20.12803	-2.97791
6	8	-14.53378	-20.58156	-3.21933
6	9	-14.75472	NUMXQ(K)= 9	

4.387E-06	0.043	1.000
3.078E-06	0.128	3.000
2.581E-06	0.214	5.000
1.963E-06	0.428	10.000
1.616E-06	0.641	15.000
1.384E-06	0.855	20.000
1.222E-06	1.069	25.000
1.093E-06	1.283	30.000

9.801E-07	1.497	35.000
8.900E-07	1.710	40.000
8.053E-07	1.924	45.000
7.293E-07	2.138	50.000
6.657E-07	2.352	55.000
6.016E-07	2.565	60.000
5.430E-07	2.779	65.000
4.929E-07	2.993	70.000
4.471E-07	3.207	75.000
4.073E-07	3.421	80.000
1.825E-06	0.5	11.69

ANNUAL AVERAGE = 1.02E-08

K= 6 FIVEXQ(K)= 1.825E-06 FIVEPR(K)=11.694

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 8.538E-01 5.200E-01 3.613E-01 2.419E-01 2.081E-01
1.693E-02
5.085 8.202 13.506 19.046 66.408 99.289
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.743E-07
A	4.4	0.44	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.39	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.39	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.30	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
B	1.7	0.09	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	2.641E-06
B	2.2	0.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.997E-06
B	3.3	0.26	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.48	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.57	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.39	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.22	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
C	2.2	0.09	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	1.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.65	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06

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   C          8.7        0.30     2000.         0.        131.        200.0
114.9       0.0       0.000E+00   0.000E+00   8.302E-07

   D          0.2        0.01     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   1.556E-05
   D          1.1        0.61     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   3.312E-06
   D          1.7        1.35     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   2.243E-06
   D          2.2        2.35     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   1.696E-06
   D          3.3        8.36     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   1.141E-06
   D          4.4       12.27     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   8.590E-07
   D          5.4        9.23     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   6.887E-07
   D          6.5        5.61     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   5.752E-07
   D          8.7        4.66     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   4.321E-07
   D         10.8        0.65     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   3.479E-07
   D         26.5        0.35     4000.         0.        131.        263.4
78.0       0.0       0.000E+00   0.000E+00   1.415E-07

   E          0.3        0.02     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   8.835E-06
   E          1.2        1.13     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   1.880E-06
   E          1.8        1.52     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   1.273E-06
   E          2.4        3.92     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   9.624E-07
   E          3.5        8.09     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   6.477E-07
   E          4.7        8.92     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   4.876E-07
   E          5.9        6.61     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   3.909E-07
   E          7.0        3.83     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   3.265E-07
   E          9.3        3.00     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   2.453E-07
   E         11.6        0.70     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   1.975E-07
   E         28.5        0.39     9000.         0.        131.        389.6
74.2       0.0       0.000E+00   0.000E+00   8.032E-08

   F          0.3        0.01    90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   4.813E-06
   F          1.2        0.44    90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   1.024E-06
   F          1.8        0.78    90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   6.935E-07
   F          2.4        1.17    90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   5.243E-07
   F          3.5        1.87    90000.         0.        131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   3.528E-07
   F          4.7        1.61    90000.         0.        131.       1000.0
```

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.30	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.52	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.35	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NW SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.257E-06	2.641E-06	2.243E-06	2.192E-06	1.997E-06	1.880E-06	
0.005	0.027	0.038	0.647	0.734	0.821	2.170	2.432	2.475	3.607	
0.00027	0.00143	0.00204	0.03478	0.03945	0.04413	0.11661	0.13064	0.13297	0.19376	

1.696E-06	1.650E-06	1.344E-06	1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06	9.624E-07	
5.957	7.088	7.349	8.698	10.221	18.577	19.230	19.665	20.144	24.060	
0.32002	0.38080	0.39483	0.46731	0.54914	0.99805	1.03312	1.05650	1.08221	1.29264	

8.590E-07	8.302E-07	8.111E-07	6.935E-07	6.887E-07	6.774E-07	6.477E-07	5.752E-07	5.243E-07	5.089E-07	
36.332	36.637	37.203	37.986	47.212	47.604	55.698	61.312	62.487	62.705	
1.95196	1.96833	1.99872	2.04081	2.53647	2.55751	2.99239	3.29399	3.35712	3.36881	

4.876E-07	4.321E-07	4.097E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.743E-07	2.656E-07	2.453E-07	
71.626	76.282	76.326	82.941	84.812	85.465	89.294	89.382	90.992	93.994	
3.84811	4.09828	4.10061	4.45600	4.55653	4.59160	4.79735	4.80202	4.88853	5.04986	

2.130E-07	2.065E-07	1.975E-07	1.779E-07	1.655E-07	1.415E-07	1.382E-07	1.336E-07	1.039E-07	9.605E-08	
94.778	95.213	95.909	96.214	96.606	96.954	97.345	97.519	97.824	97.868	
5.09194	5.11532	5.15273	5.16910	5.19014	5.20884	5.22988	5.23924	5.25560	5.25794	

```
   8.032E-08   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08
1.668E-08
      98.259      98.390      98.869      99.391      99.739      99.913
100.000
     5.27898     5.28600     5.31172     5.33977     5.35848     5.36783
5.37250

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.194
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.950
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.990
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.845
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.452

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  7  1     -11.07050 -16.86143  -1.27302
  7  2     -13.18433 -14.89820  -0.59335
  7  3     -13.31455 -16.19612  -1.07964
  7  4     -13.96752 -17.17091  -1.55187
  7  5     -14.24977 -18.96628  -2.50567
  7  6     -14.53378 -20.23501  -3.22288
  7  7     -14.75472     NUMXQ(K)=  7
    3.057E-06             0.054             1.000
    2.022E-06             0.161             3.000
    1.767E-06             0.269             5.000
    1.453E-06             0.537            10.000
    1.243E-06             0.806            15.000
    1.108E-06             1.075            20.000
    1.010E-06             1.343            25.000
    9.342E-07             1.612            30.000
    8.733E-07             1.880            35.000
    8.074E-07             2.149            40.000
    7.476E-07             2.418            45.000
    6.969E-07             2.686            50.000
    6.534E-07             2.955            55.000
    5.963E-07             3.224            60.000
    5.449E-07             3.492            65.000
    5.007E-07             3.761            70.000
```

4.552E-07	4.029	75.000
4.130E-07	4.298	80.000
1.493E-06	0.5	9.31

ANNUAL AVERAGE = 8.25E-09

K= 7 FIVEXQ(K)= 1.493E-06 FIVEPR(K)= 9.307

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.610	3.699	7.485	14.634	60.072	98.216
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.18	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
B	3.3	0.05	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.18	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.23	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.28	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.14	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.05	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
C	3.3	0.18	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.46	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.55	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.23	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.60	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	6.18	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	10.79	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.41	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.78	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.46	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.05	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.74	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.55	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.92	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	2.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		

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   G         2.4       0.18    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.23    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	2.192E-06	1.880E-06	1.696E-06	1.650E-06	1.344E-06		
0.005	0.019	0.034	0.633	1.648	1.833	2.571	4.877	5.477	5.523		
0.00025	0.00097	0.00170	0.03209	0.08353	0.09288	0.13029	0.24719	0.27759	0.27992		

1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06	9.624E-07	8.590E-07	8.302E-07	8.111E-07		
5.984	7.968	14.150	14.703	15.257	15.441	18.624	29.419	29.650	29.880		
0.30330	0.40384	0.71714	0.74519	0.77325	0.78260	0.94392	1.49102	1.50271	1.51440		

6.935E-07	6.887E-07	6.774E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	5.089E-07	4.876E-07	4.321E-07		
30.803	40.214	40.491	40.537	48.656	55.437	57.006	57.144	67.939	70.614		
1.56117	2.03812	2.05215	2.05449	2.46598	2.80967	2.88917	2.89618	3.44328	3.57889		

4.097E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.656E-07	2.453E-07	2.130E-07	2.065E-07	1.975E-07		
70.660	79.656	81.686	82.147	88.698	90.174	94.926	97.048	97.232	97.740		
3.58123	4.03714	4.14001	4.16339	4.49540	4.57021	4.81103	4.91858	4.92793	4.95365		

1.779E-07	1.415E-07	1.336E-07	9.605E-08	8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08		
98.432	98.478	98.754	99.077	99.124	99.216	99.400	99.631	99.769	99.908		
4.98872	4.99106	5.00509	5.02145	5.02379	5.02847	5.03782	5.04951	5.05652	5.06354		

```
   1.668E-08   1.253E-08
      99.954     100.000
     5.06588     5.06822

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.277
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.489
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.463
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.440
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.034

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1     -11.07050 -16.78961  -1.25294
  8  2     -13.31455 -16.32989  -1.08719
  8  3     -13.96752 -16.93525  -1.36579
  8  4     -14.24977 -18.06052  -1.93808
  8  5     -14.53378 -20.04672  -3.02957
  8  6     -14.75472     NUMXQ(K)=  6
    3.140E-06              0.051              1.000
    2.095E-06              0.152              3.000
    1.712E-06              0.253              5.000
    1.325E-06              0.507             10.000
    1.133E-06              0.760             15.000
    1.010E-06              1.014             20.000
    9.206E-07              1.267             25.000
    8.499E-07              1.520             30.000
    7.811E-07              1.774             35.000
    7.248E-07              2.027             40.000
    6.777E-07              2.281             45.000
    6.333E-07              2.534             50.000
    5.847E-07              2.788             55.000
    5.430E-07              3.041             60.000
    5.068E-07              3.294             65.000
    4.680E-07              3.548             70.000
    4.254E-07              3.801             75.000

    1.332E-06              0.5                9.87
```

ANNUAL AVERAGE = 5.51E-09

K= 8 FIVEXQ(K)= 1.332E-06 FIVEPR(K)= 9.865

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.185	1.107	3.183	12.839	53.116	98.801	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.05	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.16	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.09	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.14	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
B	3.3	0.02	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.09	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.40	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.33	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.51	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.14	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
B	26.5	0.02	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.667E-07
C	2.2	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.47	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.86	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.12	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.23	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07

AT 131.4 METERS
CA=1292.SQ.METERS

```
   C        26.5       0.02     2000.        0.        131.        200.0
114.9      0.0      0.000E+00   0.000E+00   2.719E-07

   D         0.2       0.00     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   1.556E-05
   D         1.1       0.28     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   3.312E-06
   D         1.7       0.68     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   2.243E-06
   D         2.2       0.91     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   1.696E-06
   D         3.3       3.99     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   1.141E-06
   D         4.4       7.47     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   8.590E-07
   D         5.4       7.71     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   6.887E-07
   D         6.5       6.40     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   5.752E-07
   D         8.7       8.06     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   4.321E-07
   D        10.8       2.24     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   3.479E-07
   D        26.5       0.93     4000.        0.        131.        263.4
78.0      0.0      0.000E+00   0.000E+00   1.415E-07

   E         0.3       0.01     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   8.835E-06
   E         1.2       0.61     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   1.880E-06
   E         1.8       1.03     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   1.273E-06
   E         2.4       1.40     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   9.624E-07
   E         3.5       6.14     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   6.477E-07
   E         4.7      10.09     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   4.876E-07
   E         5.9       9.88     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   3.909E-07
   E         7.0       6.63     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   3.265E-07
   E         9.3       8.57     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   2.453E-07
   E        11.6       1.68     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   1.975E-07
   E        28.5       0.21     9000.        0.        131.        389.6
74.2      0.0      0.000E+00   0.000E+00   8.032E-08

   F         0.3       0.01    90000.        0.        131.       1000.0
92.1      0.0      0.000E+00   0.000E+00   4.813E-06
   F         1.2       0.28    90000.        0.        131.       1000.0
92.1      0.0      0.000E+00   0.000E+00   1.024E-06
   F         1.8       0.26    90000.        0.        131.       1000.0
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.77    90000.        0.        131.       1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.75    90000.        0.        131.       1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       2.08    90000.        0.        131.       1000.0
```

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.07	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.51	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.14	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.02	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.02	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.257E-06	2.243E-06	2.192E-06	1.880E-06	1.696E-06	1.650E-06	
0.002	0.014	0.021	0.301	0.325	1.002	1.259	1.866	2.776	3.243	
0.00023	0.00140	0.00213	0.03018	0.03252	0.10032	0.12604	0.18683	0.27801	0.32478	
1.344E-06	1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06	9.624E-07	8.590E-07	8.302E-07	
3.267	4.201	5.228	9.221	10.084	10.365	10.458	11.859	19.331	20.451	
0.32711	0.42063	0.52351	0.92331	1.00982	1.03788	1.04723	1.18751	1.93568	2.04791	
8.111E-07	6.935E-07	6.887E-07	6.774E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	5.089E-07	4.876E-07	
20.848	21.105	28.810	29.137	29.370	35.511	41.909	42.679	43.193	53.279	
2.08765	2.11337	2.88492	2.91765	2.94103	3.55594	4.19656	4.27371	4.32515	5.33518	
4.321E-07	4.097E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	
61.335	61.475	71.351	73.102	75.344	81.975	81.998	84.076	92.645	93.719	
6.14180	6.15583	7.14482	7.32017	7.54462	8.20862	8.21096	8.41904	9.27710	9.38465	
2.065E-07	1.975E-07	1.779E-07	1.667E-07	1.655E-07	1.415E-07	1.382E-07	1.336E-07	1.076E-07	1.039E-07	
93.766	95.447	96.381	96.404	96.568	97.502	97.595	98.155	98.179	98.319	
9.38933	9.55766	9.65119	9.65352	9.66989	9.76341	9.77276	9.82888	9.83121	9.84524	

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   9.605E-08   8.032E-08   6.505E-08   4.918E-08   3.310E-08   2.491E-08
1.998E-08   1.668E-08   1.253E-08
      98.506      98.716      98.926      99.113      99.626      99.766
99.953      99.977     100.000
     9.86395     9.88499     9.90603     9.92473     9.97617     9.99020
10.00890    10.01124    10.01358

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.324
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   3.553
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   5.331
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.141

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  9  1     -11.07050 -16.59994  -1.20696
  9  2     -13.31455 -16.03073  -0.99785
  9  3     -13.96752 -16.19047  -1.07511
  9  4     -14.24977 -16.92569  -1.48240
  9  5     -14.53378 -16.93982  -1.49116
  9  6     -14.75472     NUMXQ(K)=  6
    2.573E-06              0.100              1.000
    1.702E-06              0.300              3.000
    1.426E-06              0.501              5.000
    1.112E-06              1.001             10.000
    9.513E-07              1.502             15.000
    8.461E-07              2.003             20.000
    7.649E-07              2.503             25.000
    7.025E-07              3.004             30.000
    6.523E-07              3.505             35.000
    5.973E-07              4.005             40.000
    5.503E-07              4.506             45.000
    5.105E-07              5.007             50.000
    4.763E-07              5.507             55.000
    4.464E-07              6.008             60.000
    4.202E-07              6.509             65.000
    3.968E-07              7.010             70.000

    1.427E-06              0.5                4.99
```

ANNUAL AVERAGE = 1.07E-08

K= 9 FIVEXQ(K)= 1.427E-06 FIVEPR(K)= 4.993

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.444	1.961	5.884	13.620	52.287	98.529	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.04	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.743E-07
A	4.4	0.08	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.16	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.12	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.08	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
B	3.3	0.16	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.16	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.36	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.20	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.20	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
B	26.5	0.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.667E-07
C	3.3	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.68	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.72	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.39	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.10	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.31	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.84	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.82	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	10.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	5.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.08	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.16	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.76	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.80     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.12     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.32     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.04     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.36     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.76     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.64     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.16     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.20     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNE SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	2.192E-06	1.880E-06	1.696E-06	1.650E-06	1.344E-06		
0.002	0.014	0.027	0.266	0.944	1.104	1.742	2.979	3.497	3.657		
0.00012	0.00083	0.00156	0.01559	0.05534	0.06469	0.10210	0.17458	0.20497	0.21432		

1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06	9.624E-07	8.590E-07	8.302E-07	8.111E-07		
4.215	5.811	10.200	10.878	11.356	11.516	14.109	22.208	22.926	23.285		
0.24706	0.34058	0.59776	0.63751	0.66556	0.67492	0.82689	1.30151	1.34359	1.36464		

6.935E-07	6.887E-07	6.774E-07	6.477E-07	5.752E-07	5.243E-07	5.089E-07	4.876E-07	4.321E-07	4.097E-07		
24.083	31.782	31.981	39.801	45.067	46.223	46.423	57.314	61.622	61.662		
1.41140	1.86264	1.87433	2.33258	2.64120	2.70900	2.72070	3.35898	3.61149	3.61382		

3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.743E-07	2.656E-07	2.453E-07	2.130E-07	2.065E-07	1.975E-07		
71.915	75.465	76.303	83.564	83.604	86.476	92.460	94.295	94.375	95.133		
4.21470	4.42278	4.47188	4.89740	4.89974	5.06808	5.41879	5.52633	5.53101	5.57543		

1.779E-07	1.667E-07	1.655E-07	1.415E-07	1.382E-07	1.336E-07	1.076E-07	1.039E-07	9.605E-08	8.032E-08		
95.891	95.931	96.090	96.330	96.449	97.247	97.367	97.447	97.766	97.846		
5.61986	5.62219	5.63155	5.64558	5.65259	5.69935	5.70636	5.71104	5.72974	5.73442		

6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08
97.886	98.245	99.003	99.641	99.801	100.000
5.73676	5.75780	5.80222	5.83963	5.84898	5.86067

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.205
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.300
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.330
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.356
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.211
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.894
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
10	1	-11.07050	-16.79041	-1.21078
10	2	-13.31455	-16.22281	-1.01307
10	3	-13.96752	-16.62643	-1.19437
10	4	-14.24977	-17.80409	-1.78619
10	5	-14.53378	-18.41579	-2.12030
10	6	-14.75472	-19.10806	-2.52122
10	7	-14.93482	NUMXQ(K)= 7	

2.599E-06	0.059	1.000
1.749E-06	0.176	3.000
1.469E-06	0.293	5.000
1.158E-06	0.586	10.000
9.985E-07	0.879	15.000
8.948E-07	1.172	20.000
8.127E-07	1.465	25.000
7.449E-07	1.758	30.000
6.908E-07	2.051	35.000
6.453E-07	2.344	40.000
5.898E-07	2.637	45.000
5.434E-07	2.930	50.000
5.039E-07	3.223	55.000
4.667E-07	3.516	60.000
4.319E-07	3.809	65.000
4.015E-07	4.102	70.000
3.719E-07	4.396	75.000

3.442E-07	4.689	80.000
1.225E-06	0.5	8.53

ANNUAL AVERAGE = 5.48E-09

K= 10 FIVEXQ(K)= 1.225E-06 FIVEPR(K)= 8.531

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.479	1.636	4.269	16.648	49.642	97.527
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
									AT 131.4 METERS
CA=1292.SQ.METERS									
A	3.3	0.09	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	2.743E-07								
A	4.4	0.09	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	2.065E-07								
A	5.4	0.14	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	1.655E-07								
A	8.7	0.09	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00
0.000E+00	1.039E-07								
B	3.3	0.14	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	1.344E-06								
B	4.4	0.19	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	1.012E-06								
B	5.4	0.28	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	8.111E-07								
B	6.5	0.28	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	6.774E-07								
B	8.7	0.14	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	5.089E-07								
B	10.8	0.05	2000.	0.	131.	263.4	233.7	0.0	0.000E+00
0.000E+00	4.097E-07								
C	3.3	0.33	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.192E-06								
C	4.4	0.42	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.650E-06								
C	5.4	0.70	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.323E-06								
C	6.5	0.52	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	1.105E-06								
C	8.7	0.75	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	8.302E-07								
C	10.8	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	6.684E-07								
C	26.5	0.09	2000.	0.	131.	200.0	114.9	0.0	0.000E+00
0.000E+00	2.719E-07								
D	0.2	0.00	4000.	0.	131.	263.4			

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.32	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	6.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	6.67	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.76	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.80	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.96	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	4.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.27	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.70	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.27	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	4.65	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	4.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	3.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.46	90000.	0.	131.	1000.0

```
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.08     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.28     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.03     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.69     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.75     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 2.192E-06 1.880E-06 1.696E-06 1.650E-06 1.344E-06
0.003 0.019 0.037 0.460 1.540 1.869 2.668 3.983 4.406 4.547
0.00017 0.00094 0.00185 0.02289 0.07667 0.09303 0.13278 0.19824 0.21929 0.22630

1.323E-06 1.273E-06 1.141E-06 1.105E-06 1.024E-06 1.012E-06 9.624E-07 8.590E-07 8.302E-07 8.111E-07
5.251 7.224 11.828 12.345 13.049 13.237 16.197 22.209 22.961 23.243
0.26137 0.35957 0.58869 0.61441 0.64948 0.65884 0.80613 1.10540 1.14281 1.15684

6.935E-07 6.887E-07 6.774E-07 6.684E-07 6.477E-07 5.752E-07 5.243E-07 5.089E-07 4.876E-07 4.321E-07
24.041 30.712 30.994 31.135 38.839 42.597 43.865 44.006 52.978 57.253
1.19658 1.52858 1.54261 1.54963 1.93306 2.12011 2.18323 2.19025 2.63681 2.84957

4.097E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.743E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07
57.300 65.051 69.701 70.406 75.056 75.150 75.244 80.177 87.646 90.746
2.85191 3.23769 3.46915 3.50422 3.73569 3.74036 3.74504 3.99053 4.36228 4.51659

2.065E-07 1.975E-07 1.779E-07 1.655E-07 1.415E-07 1.336E-07 1.076E-07 1.039E-07 9.605E-08 8.032E-08
90.840 92.108 93.564 93.705 93.940 95.021 95.068 95.162 95.209 95.302
4.52127 4.58439 4.65687 4.66389 4.67558 4.72935 4.73169 4.73636 4.73870 4.74338

```
   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.537      95.819      96.853      98.544      99.295      99.765
100.000
     4.75507     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.219
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.588
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.104
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.931
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.634
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.235

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.07050 -16.88322  -1.25245
 11  2     -13.31455 -16.49951  -1.11778
 11  3     -13.68351 -16.79006  -1.23312
 11  4     -13.96752 -16.89443  -1.27872
 11  5     -14.24977 -18.74357  -2.17279
 11  6     -14.53378 -19.28288  -2.45115
 11  7     -14.75472     NUMXQ(K)=  7
    2.873E-06              0.050              1.000
    1.918E-06              0.149              3.000
    1.577E-06              0.249              5.000
    1.218E-06              0.498             10.000
    1.028E-06              0.747             15.000
    9.019E-07              0.995             20.000
    8.106E-07              1.244             25.000
    7.400E-07              1.493             30.000
    6.839E-07              1.742             35.000
    6.309E-07              1.991             40.000
    5.671E-07              2.240             45.000
    5.146E-07              2.489             50.000
    4.686E-07              2.737             55.000
    4.269E-07              2.986             60.000
```

3.913E-07	3.235	65.000
1.216E-06	0.5	10.05

ANNUAL AVERAGE = 4.66E-09

K= 11 FIVEXQ(K)= 1.216E-06 FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.423	1.503	4.463	22.519	51.600	95.256	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	5.4	0.14	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.28	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.05	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	10.8	0.09	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	8.362E-08
A	26.5	0.05	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	3.401E-08
B	3.3	0.05	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.09	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.24	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.33	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.61	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.09	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
B	26.5	0.05	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.667E-07
C	3.3	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.66	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.71	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.13	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.14	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07

C	26.5	0.09	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.28	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.13	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.77	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	4.19	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	4.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	6.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.94	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.56	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.69	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.22	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	5.46	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	8.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.71	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.85	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	3.62	90000.	0.	131.	1000.0

```
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       4.00     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       2.68     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       3.77     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.99     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07
   F       28.5       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.89     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.18     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       1.88     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       1.08     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.66     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
   G       11.6       0.09     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.009E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

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THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	2.192E-06	1.880E-06	1.696E-06	1.650E-06	1.344E-06
0.002	0.019	0.038	0.320	0.744	0.885	1.779	2.909	3.097	3.144
0.00012	0.00097	0.00188	0.01591	0.03695	0.04396	0.08839	0.14450	0.15385	0.15619

1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06	9.624E-07	8.590E-07	8.302E-07	8.111E-07
3.803	5.450	9.686	10.392	11.098	11.192	12.886	16.651	17.781	18.016
0.18892	0.27075	0.48118	0.51625	0.55132	0.55599	0.64016	0.82721	0.88332	0.89501

6.935E-07	6.887E-07	6.774E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	5.089E-07	4.876E-07	4.321E-07
18.863	23.052	23.381	23.522	28.746	33.594	35.288	35.900	41.359	47.901
0.93709	1.14518	1.16154	1.16856	1.42808	1.66890	1.75307	1.78346	2.05467	2.37966

4.097E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	1.975E-07
47.995	55.008	58.020	58.961	66.350	66.444	70.068	78.398	82.398	84.187
2.38434	2.73270	2.88234	2.92910	3.29617	3.30084	3.48087	3.89471	4.09344	4.18228

1.779E-07	1.667E-07	1.655E-07	1.415E-07	1.382E-07	1.336E-07	1.076E-07	1.039E-07	9.605E-08	8.362E-08
86.869	86.916	87.058	87.622	87.905	91.670	92.658	92.705	93.176	93.270
4.31555	4.31789	4.32490	4.35296	4.36699	4.55403	4.60313	4.60547	4.62885	4.63352

```
   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.401E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      93.364      93.741      94.117      94.164      94.211      95.105
96.282      98.165      99.247      99.906
     4.63820     4.65690     4.67561     4.67795     4.68028     4.72471
4.78316     4.87668     4.93045     4.96319

   1.009E-08
     100.000
     4.96786

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.001
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.144
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.481
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.516
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.882
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.426
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.730
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.293

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 12  1     -11.07050 -16.99141  -1.25333
 12  2     -11.63677 -17.09203  -1.27688
 12  3     -13.28753 -16.31238  -1.01521
 12  4     -13.68351 -17.09968  -1.31925
 12  5     -13.71559 -17.53307  -1.48820
 12  6     -14.00160 -17.21887  -1.35580
 12  7     -14.24977 -18.37761  -1.88492
 12  8     -14.75472 -18.94128  -2.17819
 12  9     -14.93482     NUMXQ(K)=  9
    2.529E-06              0.050              1.000
    1.679E-06              0.149              3.000
    1.427E-06              0.248              5.000
    1.125E-06              0.497             10.000
```

9.107E-07	0.745	15.000
7.824E-07	0.994	20.000
6.973E-07	1.242	25.000
6.275E-07	1.490	30.000
5.586E-07	1.739	35.000
5.040E-07	1.987	40.000
4.595E-07	2.236	45.000
4.224E-07	2.484	50.000
3.910E-07	2.732	55.000
3.599E-07	2.981	60.000
3.331E-07	3.229	65.000
1.121E-06	0.5	10.06

ANNUAL AVERAGE = 4.01E-09

K= 12 FIVEXQ(K)= 1.121E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.612	2.071	5.130	26.515	53.437	92.988
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.03	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.06	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.39	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.42	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	10.8	0.30	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	8.362E-08
A	26.5	0.18	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	3.401E-08
B	2.2	0.03	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.997E-06
B	3.3	0.09	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.09	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.39	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.30	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.63	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.33	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
B	26.5	0.21	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.667E-07
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.48	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.69	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.33	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06

C	8.7	1.44	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.87	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
C	26.5	0.48	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.719E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.24	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	0.54	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	0.90	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	2.66	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	3.26	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	4.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	4.25	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	9.30	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	6.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	3.71	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.90	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	0.72	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	1.26	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	3.05	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	3.59	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	5.77	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	6.37	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	12.47	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	2.63	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.42	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.48	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.66	90000.	0.	131.	1000.0					

```
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       1.29     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       2.63     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       2.54     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       2.54     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       3.83     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.69     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07
   F       28.5       0.03     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.21     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.75     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.84     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.81     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       1.11     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.72     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
   G       11.6       0.03     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.009E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 2.192E-06 1.997E-06 1.880E-06 1.696E-06 1.650E-06
0.002 0.019 0.030 0.269 0.808 0.868 0.898 1.795 2.692 3.171
0.00015 0.00150 0.00235 0.02106 0.06314 0.06782 0.07015 0.14029 0.21044 0.24784

1.344E-06 1.323E-06 1.273E-06 1.141E-06 1.105E-06 1.024E-06 1.012E-06 9.624E-07 8.590E-07 8.302E-07
3.261 3.949 4.667 7.329 7.658 8.077 8.166 9.423 12.683 14.119
0.25486 0.30863 0.36475 0.57283 0.59855 0.63128 0.63830 0.73649 0.99134 1.10356

8.111E-07 6.935E-07 6.887E-07 6.774E-07 6.684E-07 6.477E-07 5.752E-07 5.243E-07 5.089E-07 4.876E-07
14.508 14.987 18.995 19.294 20.162 23.213 27.460 28.119 28.747 32.336
1.13396 1.17137 1.48466 1.50804 1.57585 1.81433 2.14633 2.19776 2.24686 2.52743

4.321E-07 4.097E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07
41.639 41.968 47.742 49.028 55.340 61.711 62.190 64.822 77.296 79.839
3.25455 3.28027 3.73151 3.83205 4.32537 4.82337 4.86078 5.06653 6.04149 6.24022

2.065E-07 1.975E-07 1.779E-07 1.667E-07 1.655E-07 1.415E-07 1.382E-07 1.336E-07 1.076E-07 1.039E-07
79.868 82.501 85.043 85.253 85.313 89.022 89.411 93.240 93.928 94.346
6.24256 6.44831 6.64704 6.66341 6.66808 6.95800 6.98839 7.28766 7.34144 7.37417

```
   9.605E-08   8.362E-08   8.032E-08   6.505E-08   4.918E-08   4.375E-08
3.401E-08   3.310E-08   2.491E-08   1.998E-08
      94.586      94.885      95.184      95.334      95.543      95.573
95.752      96.500      97.338      98.145
     7.39287     7.41625     7.43963     7.45132     7.46769     7.47003
7.48406     7.54251     7.60797     7.67110

   1.668E-08   1.253E-08   1.009E-08
      99.252      99.970     100.000
     7.75761     7.81372     7.81606
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

```
 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q       WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.248
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.572
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.102
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.812
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.728
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.820

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1     -11.07050 -16.44367  -1.15172
 13  2     -11.63677 -16.77249  -1.23050
 13  3     -13.31455 -17.00030  -1.31157
 13  4     -13.68351 -17.04521  -1.32933
 13  5     -14.00160 -16.90898  -1.26983
 13  6     -14.24977 -17.64969  -1.62354
 13  7     -14.75472 -17.41901  -1.49417
 13  8     -14.93482     NUMXQ(K)=  8
    2.547E-06              0.078              1.000
    1.687E-06              0.234              3.000
    1.356E-06              0.391              5.000
    9.845E-07              0.782             10.000
    8.062E-07              1.172             15.000
    6.990E-07              1.563             20.000
    6.166E-07              1.954             25.000
```

5.449E-07	2.345	30.000
4.895E-07	2.736	35.000
4.450E-07	3.126	40.000
4.084E-07	3.517	45.000
3.787E-07	3.908	50.000
3.544E-07	4.299	55.000
3.332E-07	4.690	60.000
1.214E-06	0.5	6.40

ANNUAL AVERAGE = 7.13E-09

K= 13 FIVEXQ(K)= 1.214E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.376	3.440	7.777	22.895	58.074	95.154	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.08	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.08	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.19	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.13	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	10.8	0.05	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	8.362E-08
A	26.5	0.13	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	3.401E-08
B	3.3	0.03	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.13	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.05	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.21	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.40	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.32	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
B	26.5	0.27	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.667E-07
C	3.3	0.05	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.16	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.21	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.72	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	6.684E-07		
C	26.5	0.89	2000.	0.	131.	200.0
114.9	0.0	0.000E+00	0.000E+00	2.719E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	1.58	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	4.29	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.26	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	14.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	6.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.46	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.62	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.20	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.11	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	4.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.23	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	11.84	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	3.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.35	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.40	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.05	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	2.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.62	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.59	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.70	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.54	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	2.192E-06	1.880E-06	1.696E-06	1.650E-06	1.344E-06		
0.004	0.013	0.022	0.532	1.042	1.096	1.552	2.062	2.223	2.250		
0.00037	0.00113	0.00192	0.04634	0.09076	0.09544	0.13519	0.17961	0.19364	0.19598		
1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06	9.624E-07	8.590E-07	8.302E-07	8.111E-07		
2.599	3.109	4.692	5.256	5.605	5.739	6.356	9.443	10.651	10.704		
0.22637	0.27079	0.40874	0.45784	0.48823	0.49992	0.55369	0.82257	0.92778	0.93246		
6.935E-07	6.887E-07	6.774E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	5.089E-07	4.876E-07	4.321E-07		
11.107	15.401	15.616	16.341	18.541	23.802	24.285	24.688	27.801	42.375		
0.96753	1.34161	1.36032	1.42344	1.61516	2.07342	2.11550	2.15057	2.42178	3.69133		
4.097E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.719E-07	2.656E-07	2.453E-07	2.130E-07	2.065E-07		
42.697	47.018	48.065	58.586	64.813	65.699	67.014	78.850	80.836	80.917		
3.71939	4.09581	4.18700	5.10351	5.64593	5.72308	5.83765	6.86872	7.04174	7.04875		
1.975E-07	1.779E-07	1.667E-07	1.655E-07	1.415E-07	1.382E-07	1.336E-07	1.076E-07	1.039E-07	9.605E-08		
84.245	85.721	85.990	86.070	92.163	92.351	95.142	95.759	95.894	96.108		
7.33867	7.46726	7.49064	7.49765	8.02839	8.04475	8.28791	8.34168	8.35337	8.37208		

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   8.362E-08   8.032E-08   6.505E-08   4.918E-08   3.401E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      96.162      96.484      96.645      96.860      96.994      97.584
98.282      98.819      99.087      99.946
     8.37675     8.40481     8.41884     8.43754     8.44923     8.50067
8.56146     8.60822     8.63160     8.70642

   1.009E-08
     100.000
     8.71109

 BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.046
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.408
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.927
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.613
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.688
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.642
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   6.865

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1     -11.07050 -16.99068  -1.32021
 14  2     -12.61806 -17.90938  -1.59758
 14  3     -13.68351 -15.88096  -0.83075
 14  4     -13.71559 -16.67666  -1.13601
 14  5     -14.00160 -16.73627  -1.16133
 14  6     -14.24977 -16.70510  -1.14677
 14  7     -14.65458 -17.12867  -1.38365
 14  8     -14.93482 -19.48735  -2.87127
 14  9     -15.22084     NUMXQ(K)=  9
    2.481E-06              0.087              1.000
    1.445E-06              0.261              3.000
    1.121E-06              0.436              5.000
    8.525E-07              0.871             10.000
    7.138E-07              1.307             15.000
    6.255E-07              1.742             20.000
```

5.630E-07	2.178	25.000
5.152E-07	2.613	30.000
4.769E-07	3.049	35.000
4.453E-07	3.484	40.000
4.159E-07	3.920	45.000
3.885E-07	4.356	50.000
3.649E-07	4.791	55.000
3.442E-07	5.227	60.000
3.252E-07	5.662	65.000
2.922E-07	6.098	70.000
2.642E-07	6.533	75.000
1.068E-06	0.5	5.74

ANNUAL AVERAGE = 7.60E-09

K= 14 FIVEXQ(K)= 1.068E-06 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.671	2.093	6.039	16.516	63.462	96.403	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	6.5	0.06	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.04	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	26.5	0.02	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	3.401E-08
B	2.2	0.02	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.997E-06
B	3.3	0.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.02	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.02	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.06	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.13	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.11	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
C	3.3	0.06	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.17	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.19	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.38	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	0.56	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07
C	10.8	0.47	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	6.684E-07
C	26.5	0.26	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.719E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.17	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	5.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	7.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	17.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.45	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	5.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F         9.3       1.30    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G         1.2       0.15    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.24    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.94    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       1.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.88    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.36    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.11    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 2.192E-06 1.997E-06 1.880E-06 1.696E-06 1.650E-06
0.001 0.011 0.018 0.189 0.787 0.851 0.873 1.364 2.219 2.390
0.00015 0.00118 0.00198 0.02068 0.08615 0.09316 0.09550 0.14927 0.24279 0.26150

1.344E-06 1.323E-06 1.273E-06 1.141E-06 1.105E-06 1.024E-06 1.012E-06 9.624E-07 8.590E-07 8.302E-07
2.433 2.625 2.967 5.488 5.873 6.151 6.172 6.813 10.788 11.343
0.26617 0.28722 0.32462 0.60051 0.64260 0.67299 0.67533 0.74547 1.18034 1.24113

8.111E-07 6.935E-07 6.887E-07 6.774E-07 6.684E-07 6.477E-07 5.752E-07 5.243E-07 5.089E-07 4.876E-07
11.365 11.642 16.664 16.728 17.198 19.591 26.686 27.070 27.198 30.489
1.24347 1.27387 1.82330 1.83032 1.88175 2.14361 2.91984 2.96193 2.97595 3.33601

4.321E-07 4.097E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07
48.032 48.139 53.588 54.870 65.319 71.238 71.495 72.969 83.504 85.363
5.25554 5.26723 5.86342 6.00371 7.14700 7.79464 7.82270 7.98402 9.13667 9.34008

1.975E-07 1.779E-07 1.415E-07 1.382E-07 1.336E-07 1.039E-07 9.605E-08 8.032E-08 6.505E-08 4.918E-08
87.521 88.953 94.423 94.487 95.790 95.833 95.983 96.196 96.325 96.560
9.57622 9.73287 10.33141 10.33842 10.48104 10.48572 10.50208 10.52546 10.53949 10.56521

3.401E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08	1.253E-08
96.581	97.521	98.654	99.530	99.893	100.000
10.56755	10.67042	10.79434	10.89020	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.261
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.179
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.917
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   5.252
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.791
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.07050	-16.66167	-1.19845
15	2	-13.31455	-16.76212	-1.23441
15	3	-13.96752	-16.41619	-1.08161
15	4	-14.36856	-16.35769	-1.05071
15	5	-14.65458	-16.90743	-1.38986
15	6	-14.93482		

NUMXQ(K)= 6

2.283E-06	0.109	1.000
1.506E-06	0.328	3.000
1.215E-06	0.547	5.000
8.902E-07	1.094	10.000
7.469E-07	1.641	15.000
6.575E-07	2.188	20.000
5.932E-07	2.735	25.000
5.447E-07	3.282	30.000
5.060E-07	3.830	35.000
4.740E-07	4.377	40.000
4.468E-07	4.924	45.000
4.204E-07	5.471	50.000
3.935E-07	6.018	55.000
3.700E-07	6.565	60.000
3.493E-07	7.112	65.000
3.308E-07	7.659	70.000
1.263E-06	0.5	4.57

ANNUAL AVERAGE = 8.80E-09

K= 15 FIVEXQ(K)= 1.263E-06 FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.128	0.534	2.628	10.926	64.626	96.068
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.02	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.743E-07
A	5.4	0.11	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.09	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.30	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	10.8	0.02	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	8.362E-08
A	26.5	0.02	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	3.401E-08
B	3.3	0.06	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.15	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.26	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.32	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.43	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.13	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
C	2.2	0.02	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	3.257E-06
C	3.3	0.35	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	2.192E-06
C	4.4	0.76	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.650E-06
C	5.4	0.97	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.323E-06
C	6.5	0.93	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	1.105E-06
C	8.7	1.60	2000.	0.	131.	200.0	114.9	0.0	0.000E+00	0.000E+00	8.302E-07

C	10.8	0.30	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	6.684E-07						
C	26.5	0.09	2000.	0.	131.	200.0	114.9	0.0
0.000E+00	0.000E+00	2.719E-07						
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	0.22	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	0.86	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	1.08	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	4.99	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	8.43	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	9.47	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	8.78	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	15.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	4.97	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	2.03	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.00	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.24	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	0.50	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	0.78	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	2.49	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	4.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	4.60	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	5.97	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	7.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	1.04	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.00	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.15	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.32	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.43	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	5.243E-07						
F	3.5	1.28	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.41	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.22	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.73	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.63	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 2000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	3.257E-06	2.243E-06	2.192E-06	1.880E-06	1.696E-06	1.650E-06		
0.002	0.006	0.010	0.226	0.248	1.113	1.458	1.696	2.777	3.533		
0.00019	0.00069	0.00111	0.02449	0.02683	0.12035	0.15776	0.18348	0.30038	0.38221		
1.344E-06	1.323E-06	1.273E-06	1.141E-06	1.105E-06	1.024E-06	1.012E-06	9.624E-07	8.590E-07	8.302E-07		
3.598	4.571	5.068	10.061	10.991	11.142	11.293	12.071	20.501	22.101		
0.38923	0.49444	0.54821	1.08830	1.18883	1.20520	1.22156	1.30573	2.21757	2.39058		
8.111E-07	6.935E-07	6.887E-07	6.774E-07	6.684E-07	6.477E-07	5.752E-07	5.243E-07	5.089E-07	4.876E-07		
22.360	22.684	32.151	32.476	32.778	35.264	44.039	44.472	44.904	49.227		
2.41864	2.45371	3.47777	3.51284	3.54557	3.81444	4.76368	4.81045	4.85721	5.32481		
4.321E-07	4.097E-07	3.909E-07	3.528E-07	3.479E-07	3.265E-07	2.743E-07	2.719E-07	2.656E-07	2.453E-07		
64.228	64.357	68.961	70.237	75.208	81.174	81.195	81.282	82.427	89.690		
6.94741	6.96143	7.45944	7.59738	8.13513	8.78043	8.78276	8.79211	8.91603	9.70161		
2.130E-07	1.975E-07	1.779E-07	1.655E-07	1.415E-07	1.382E-07	1.336E-07	1.076E-07	1.039E-07	9.605E-08		
90.922	91.959	92.975	93.083	95.115	95.202	95.612	95.720	96.023	96.239		
9.83488	9.94710	10.05699	10.06868	10.28846	10.29781	10.34223	10.35392	10.38665	10.41003		

8.362E-08 8.032E-08 6.505E-08 4.918E-08 3.401E-08 3.310E-08
2.491E-08 1.998E-08 1.668E-08 1.253E-08
96.261 96.563 96.758 97.017 97.039 97.774
99.114 99.741 99.914 100.000
10.41237 10.44510 10.46615 10.49420 10.49654 10.57603
10.72099 10.78879 10.80750 10.81685

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= HANDCHECK 0.382
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= HANDCHECK 2.215
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= HANDCHECK 2.388
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= HANDCHECK 3.475
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= HANDCHECK 4.760
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= HANDCHECK 6.944
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(9)= HANDCHECK 8.777

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
16	1	-11.07050	-16.38229	-1.14992
16	2	-13.31455	-15.94570	-0.98627
16	3	-13.71559	-15.99450	-1.00785
16	4	-13.96752	-16.12873	-1.07459
16	5	-14.00160	-16.25315	-1.13745
16	6	-14.18845	-16.41817	-1.22836
16	7	-14.36856	-16.89943	-1.51678
16	8	-14.65458	-17.96250	-2.23507
16	9	-14.93482	NUMXQ(K)= 9	

2.612E-06	0.108	1.000
1.757E-06	0.325	3.000
1.468E-06	0.541	5.000
1.145E-06	1.082	10.000
9.773E-07	1.623	15.000
8.680E-07	2.163	20.000
7.817E-07	2.704	25.000
7.135E-07	3.245	30.000
6.567E-07	3.786	35.000
6.085E-07	4.327	40.000

5.662E-07	4.868	45.000
5.238E-07	5.408	50.000
4.874E-07	5.949	55.000
4.558E-07	6.490	60.000
4.261E-07	7.031	65.000
3.905E-07	7.572	70.000
3.596E-07	8.113	75.000
3.324E-07	8.653	80.000
1.508E-06	0.5	4.62

ANNUAL AVERAGE = 1.45E-08

K= 16 FIVEXQ(K)= 1.508E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.562	1.924	6.938	13.038	68.870	96.369
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					
	AT 131.4 METERS									
CA=1292.SQ.METERS										
A	1.7	0.01	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	5.390E-07
A	2.2	0.09	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	4.075E-07
A	3.3	0.31	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.743E-07
A	4.4	0.33	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	2.065E-07
A	5.4	0.22	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.655E-07
A	6.5	0.18	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.382E-07
A	8.7	0.20	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	1.039E-07
A	10.8	0.05	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	8.362E-08
A	26.5	0.04	2000.	0.	131.	350.3	1000.0	0.0	0.000E+00	0.000E+00	3.401E-08
B	1.1	0.00	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	3.900E-06
B	1.7	0.04	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	2.641E-06
B	2.2	0.12	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.997E-06
B	3.3	0.29	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.344E-06
B	4.4	0.26	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	1.012E-06
B	5.4	0.26	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	8.111E-07
B	6.5	0.22	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	6.774E-07
B	8.7	0.30	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	5.089E-07
B	10.8	0.12	2000.	0.	131.	263.4	233.7	0.0	0.000E+00	0.000E+00	4.097E-07
B	26.5	0.05	2000.	0.	131.	263.4					

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233.7      0.0      0.000E+00   0.000E+00   1.667E-07

   C        1.1       0.01      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   6.362E-06
   C        1.7       0.07      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   4.309E-06
   C        2.2       0.21      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   3.257E-06
   C        3.3       0.42      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   2.192E-06
   C        4.4       0.56      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   1.650E-06
   C        5.4       0.63      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   1.323E-06
   C        6.5       0.52      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   1.105E-06
   C        8.7       0.79      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   8.302E-07
   C       10.8       0.27      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   6.684E-07
   C       26.5       0.17      2000.        0.        131.       200.0
114.9      0.0      0.000E+00   0.000E+00   2.719E-07

   D        0.2       0.00      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   1.556E-05
   D        1.1       0.57      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   3.312E-06
   D        1.7       1.50      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   2.243E-06
   D        2.2       2.03      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   1.696E-06
   D        3.3       5.42      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   1.141E-06
   D        4.4       7.33      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   8.590E-07
   D        5.4       7.08      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   6.887E-07
   D        6.5       6.11      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   5.752E-07
   D        8.7       9.08      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   4.321E-07
   D       10.8       3.90      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   3.479E-07
   D       26.5       1.98      4000.        0.        131.       263.4
78.0       0.0      0.000E+00   0.000E+00   1.415E-07

   E        0.3       0.01      9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   8.835E-06
   E        1.2       0.73      9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   1.880E-06
   E        1.8       1.24      9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   1.273E-06
   E        2.4       1.88      9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   9.624E-07
   E        3.5       5.25      9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   6.477E-07
   E        4.7       6.52      9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   4.876E-07
   E        5.9       6.35      9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   3.909E-07
```

E	7.0	5.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	6.91	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.44	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	1.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.18	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.25	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.69	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.01	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 2000.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 6.362E-06 4.813E-06 4.309E-06 3.900E-06 3.312E-06 3.257E-06 2.641E-06 2.243E-06
0.005 0.019 0.030 0.042 0.108 0.112 0.680 0.891 0.933 2.436
0.00468 0.01870 0.03039 0.04208 0.10755 0.11223 0.68037 0.89079 0.93288 2.43623

2.192E-06 1.997E-06 1.880E-06 1.696E-06 1.650E-06 1.344E-06 1.323E-06 1.273E-06 1.141E-06 1.105E-06
2.855 2.972 3.703 5.735 6.292 6.584 7.210 8.450 13.874 14.398
2.85474 2.97164 3.70344 5.73519 6.29165 6.58390 7.21049 8.44965 13.87389 14.39761

1.024E-06 1.012E-06 9.624E-07 8.590E-07 8.302E-07 8.111E-07 6.935E-07 6.887E-07 6.774E-07 6.684E-07
14.847 15.111 16.995 24.320 25.110 25.368 25.931 33.013 33.230 33.504
14.84651 15.11071 16.99516 24.32022 25.11047 25.36765 25.93112 33.01302 33.23046 33.50401

6.477E-07 5.752E-07 5.390E-07 5.243E-07 5.089E-07 4.876E-07 4.321E-07 4.097E-07 4.075E-07 3.909E-07
38.755 44.862 44.869 45.706 46.003 52.522 61.605 61.724 61.818 68.165
38.75523 44.86217 44.86918 45.70620 46.00313 52.52156 61.60482 61.72406 61.81758 68.16534

3.528E-07 3.479E-07 3.265E-07 2.743E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 2.065E-07 1.975E-07
69.954 73.854 79.030 79.343 79.516 81.389 88.300 89.867 90.194 91.634
69.95393 73.85377 79.03017 79.34347 79.51648 81.38924 88.30047 89.86695 90.19427 91.63451

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   1.779E-07   1.667E-07   1.655E-07   1.415E-07   1.382E-07   1.336E-07
1.076E-07   1.039E-07   9.605E-08   8.362E-08
      92.673      92.722      92.939      94.915      95.092      96.196
96.376      96.572      96.820      96.867
    92.67259    92.72169    92.93913    94.91476    95.09245    96.19601
96.37605    96.57244    96.82027    96.86703

   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.401E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      97.127      97.314      97.575      97.592      97.629      98.347
99.039      99.518      99.785      99.988
    97.12656    97.31360    97.57545    97.59182    97.62923    98.34700
99.03905    99.51835    99.78488    99.98829

   1.009E-08
     100.000
    99.99998

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   2.434
    3.201E-06              1.000              1.000
    2.156E-06              3.000              3.000
    1.801E-06              5.000              5.000
    1.358E-06             10.000             10.000
    1.121E-06             15.000             15.000
    9.626E-07             20.000             20.000
    8.463E-07             25.000             25.000
    7.633E-07             30.000             30.000
    6.937E-07             35.000             35.000
    6.339E-07             40.000             40.000
    5.822E-07             45.000             45.000
    5.355E-07             50.000             50.000
    4.926E-07             55.000             55.000
    4.524E-07             60.000             60.000
    4.143E-07             65.000             65.000
    3.802E-07             70.000             70.000
    3.507E-07             75.000             75.000

    1.801E-06              5.0                5.00

K= 17     FIVEXQ(K)= 1.801E-06     FIVEPR(K)= 5.000
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FUMIGATION X/Q AT THE BOUNDARY: 2.20E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	8.538E-01	5.200E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.417	3.077	6.727	16.153	61.158	96.932	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 6.362E-06 4.813E-06 4.309E-06 3.900E-06 3.312E-06 3.257E-06 2.641E-06 2.243E-06
0.005 0.019 0.030 0.042 0.108 0.112 0.680 0.891 0.933 2.436
0.00468 0.01870 0.03039 0.04208 0.10755 0.11223 0.68037 0.89079 0.93288 2.43623

2.192E-06 1.997E-06 1.880E-06 1.696E-06 1.650E-06 1.344E-06 1.323E-06 1.273E-06 1.141E-06 1.105E-06
2.855 2.972 3.703 5.735 6.292 6.584 7.210 8.450 13.874 14.398
2.85474 2.97164 3.70344 5.73519 6.29165 6.58390 7.21049 8.44965 13.87388 14.39760

1.024E-06 1.012E-06 9.624E-07 8.590E-07 8.302E-07 8.111E-07 6.935E-07 6.887E-07 6.774E-07 6.684E-07
14.846 15.111 16.995 24.320 25.110 25.368 25.931 33.013 33.230 33.504
14.84650 15.11070 16.99516 24.32021 25.11047 25.36765 25.93112 33.01302 33.23046 33.50401

6.477E-07 5.752E-07 5.390E-07 5.243E-07 5.089E-07 4.876E-07 4.321E-07 4.097E-07 4.075E-07 3.909E-07
38.755 44.862 44.869 45.706 46.003 52.522 61.605 61.724 61.818 68.165
38.75524 44.86218 44.86919 45.70621 46.00315 52.52159 61.60484 61.72408 61.81761 68.16537

3.528E-07 3.479E-07 3.265E-07 2.743E-07 2.719E-07 2.656E-07 2.453E-07 2.130E-07 2.065E-07 1.975E-07
69.954 73.854 79.030 79.344 79.517 81.389 88.301 89.867 90.194 91.635
69.95398 73.85383 79.03024 79.34354 79.51654 81.38931 88.30054 89.86703 90.19434 91.63458

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   1.779E-07   1.667E-07   1.655E-07   1.415E-07   1.382E-07   1.336E-07
1.076E-07   1.039E-07   9.605E-08   8.362E-08
      92.673      92.722      92.939      94.915      95.092      96.196
96.376      96.572      96.820      96.867
    92.67267    92.72176    92.93919    94.91483    95.09251    96.19607
96.37608    96.57246    96.82031    96.86707

   8.032E-08   6.505E-08   4.918E-08   4.375E-08   3.401E-08   3.310E-08
2.491E-08   1.998E-08   1.668E-08   1.253E-08
      97.127      97.314      97.575      97.592      97.629      98.347
99.039      99.518      99.785      99.988
    97.12658    97.31361    97.57548    97.59184    97.62923    98.34701
99.03906    99.51835    99.78489    99.98828

   1.009E-08
    100.000
    99.99997

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                          HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   2.434

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1     -11.07050 -14.98113  -1.00096
 18  2     -13.00780 -13.66280  -0.33225
 18  3     -13.03054 -14.48361  -0.76357
 18  4     -13.31455 -14.51140  -0.78172
 18  5     -13.96752 -14.44593  -0.68762
 18  6     -14.24977 -14.44001  -0.66687
 18  7     -14.75472 -14.50129  -0.53703
 18  8     -14.93482     NUMXQ(K)=  8
    3.201E-06              1.000              1.000
    2.156E-06              3.000              3.000
    1.801E-06              5.000              5.000
    1.358E-06             10.000             10.000
    1.121E-06             15.000             15.000
    9.626E-07             20.000             20.000
    8.463E-07             25.000             25.000
    7.633E-07             30.000             30.000
    6.937E-07             35.000             35.000
    6.339E-07             40.000             40.000
    5.822E-07             45.000             45.000
    5.355E-07             50.000             50.000
```

4.926E-07	55.000	55.000
4.524E-07	60.000	60.000
4.143E-07	65.000	65.000
3.802E-07	70.000	70.000
3.507E-07	75.000	75.000
1.801E-06	5.0	5.00

K= 18 FIVEXQ(K)= 1.801E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-2.81243	0.24585	6.22377
2	-1.81808	3.45258	3.53187
3	-2.65548	0.39598	3.10925
4	-2.59358	0.47491	3.53945
5	-2.57624	0.49942	4.77421
6	-2.66314	0.38708	4.27580
7	-2.95835	0.15465	5.37250
8	-2.94843	0.15970	5.06821
9	-2.90362	0.18444	10.01358
10	-3.05176	0.11376	5.86067
11	-3.02434	0.12460	4.97718
12	-3.13000	0.08741	4.96786
13	-2.98829	0.14028	7.81606
14	-3.01330	0.12922	8.71109
15	-2.97576	0.14614	10.94163
16	-2.85837	0.21291	10.81685

K	HOURS(K)	TOTHRS
1	21.53605	21.53605
2	302.44560	323.98160
3	34.68763	358.66930
4	41.60228	400.27150
5	43.74879	444.02030
6	33.90808	477.92840
7	13.54736	491.47580
8	13.98961	505.46540
9	16.15700	521.62240
10	9.96498	531.58730
11	10.91475	542.50210
12	7.65713	550.15920
13	12.28849	562.44770
14	11.31992	573.76760
15	12.80175	586.56940
16	18.65125	605.22060

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.597E-06	9.065E-09	-0.6168	-12.9197			
					1	8.0	-14.20224
					2	16.0	-14.62975
					3	72.0	-15.55742
					4	624.0	-16.88932
2	1.485E-06	7.575E-09	-0.6295	-12.9835			
					1	8.0	-14.29258
					2	16.0	-14.72892
					3	72.0	-15.67576
					4	624.0	-17.03519
3	1.826E-06	8.364E-09	-0.6423	-12.7679			
					1	8.0	-14.10367
					2	16.0	-14.54891

					3	72.0	-15.51505
					4	624.0	-16.90219
4	2.007E-06	1.075E-08	-0.6237	-12.6867			
					1	8.0	-13.98361
					2	16.0	-14.41592
					3	72.0	-15.35401
					4	624.0	-16.70086
5	2.055E-06	1.270E-08	-0.6066	-12.6749			
					1	8.0	-13.93630
					2	16.0	-14.35676
					3	72.0	-15.26913
					4	624.0	-16.57906
6	1.825E-06	1.025E-08	-0.6180	-12.7858			
					1	8.0	-14.07092
					2	16.0	-14.49929
					3	72.0	-15.42883
					4	624.0	-16.76341
7	1.493E-06	8.249E-09	-0.6200	-12.9850			
					1	8.0	-14.27417
					2	16.0	-14.70390
					3	72.0	-15.63637
					4	624.0	-16.97517
8	1.332E-06	5.514E-09	-0.6544	-13.0754			
					1	8.0	-14.43617
					2	16.0	-14.88975
					3	72.0	-15.87398
					4	624.0	-17.28708
9	1.427E-06	1.069E-08	-0.5836	-13.0555			
					1	8.0	-14.26907
					2	16.0	-14.67359
					3	72.0	-15.55137
					4	624.0	-16.81163
10	1.225E-06	5.485E-09	-0.6450	-13.1658			
					1	8.0	-14.50708
					2	16.0	-14.95416
					3	72.0	-15.92431
					4	624.0	-17.31719
11	1.216E-06	4.662E-09	-0.6636	-13.1599			
					1	8.0	-14.53972
					2	16.0	-14.99967
					3	72.0	-15.99771
					4	624.0	-17.43066
12	1.121E-06	4.007E-09	-0.6719	-13.2352			
					1	8.0	-14.63248
					2	16.0	-15.09823
					3	72.0	-16.10888
					4	624.0	-17.55992
13	1.214E-06	7.133E-09	-0.6127	-13.1967			
					1	8.0	-14.47071
					2	16.0	-14.89537
					3	72.0	-15.81685
					4	624.0	-17.13988
14	1.068E-06	7.599E-09	-0.5898	-13.3412			
					1	8.0	-14.56761
					2	16.0	-14.97641
					3	72.0	-15.86347
					4	624.0	-17.13706
15	1.263E-06	8.800E-09	-0.5923	-13.1714			
					1	8.0	-14.40310
					2	16.0	-14.81366

```
                                                3   72.0   -15.70455
                                                4  624.0   -16.98364
16 1.508E-06 1.446E-08   -0.5542  -13.0207
                                                1    8.0   -14.17317
                                                2   16.0   -14.55733
                                                3   72.0   -15.39094
                                                4  624.0   -16.58780
17 1.801E-06 1.446E-08   -0.5754  -12.8285
                                                1    8.0   -14.02505
                                                2   16.0   -14.42389
                                                3   72.0   -15.28933
                                                4  624.0   -16.53189
18 1.801E-06 1.446E-08   -0.5754  -12.8285
                                                1    8.0   -14.02505
                                                2   16.0   -14.42388
                                                3   72.0   -15.28933
                                                4  624.0   -16.53189
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

0-2 HR X/Q IS

SECTOR	DOWNWIND DISTANCE EXCEEDED (METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS	1-4 DAYS	4-30 DAYS	ANNUAL AVERAGE	IN SECTOR	SECTOR
S	2000.	1.60E-06	6.79E-07	4.43E-07	1.75E-07	4.62E-08	9.06E-09	21.5	S
SSW	2000.	1.49E-06	6.21E-07	4.01E-07	1.56E-07	4.00E-08	7.58E-09	302.4	SSW
SW	2000.	1.83E-06	7.50E-07	4.80E-07	1.83E-07	4.57E-08	8.36E-09	34.7	SW
WSW	2000.	2.01E-06	8.45E-07	5.49E-07	2.15E-07	5.58E-08	1.07E-08	41.6	WSW
W	2000.	2.05E-06	8.86E-07	5.82E-07	2.34E-07	6.31E-08	1.27E-08	43.7	W
WNW	2000.	1.82E-06	7.75E-07	5.05E-07	1.99E-07	5.24E-08	1.02E-08	33.9	WNW
NW	2000.	1.49E-06	6.32E-07	4.11E-07	1.62E-07	4.24E-08	8.25E-09	13.5	NW
NNW	2000.	1.33E-06	5.38E-07	3.42E-07	1.28E-07	3.11E-08	5.51E-09	14.0	NNW
N	2000.	1.43E-06	6.35E-07	4.24E-07	1.76E-07	5.00E-08	1.07E-08	16.2	N
NNE	2000.	1.22E-06	5.01E-07	3.20E-07	1.21E-07	3.01E-08	5.48E-09	10.0	NNE
NE	2000.	1.22E-06	4.85E-07	3.06E-07	1.13E-07	2.69E-08	4.66E-09	10.9	NE
ENE	2000.	1.12E-06	4.42E-07	2.77E-07	1.01E-07	2.36E-08	4.01E-09	7.7	ENE
E	2000.	1.21E-06	5.19E-07	3.40E-07	1.35E-07	3.60E-08	7.13E-09	12.3	E
ESE	2000.	1.07E-06	4.71E-07	3.13E-07	1.29E-07	3.61E-08	7.60E-09	11.3	ESE
SE	2000.	1.26E-06	5.56E-07	3.69E-07	1.51E-07	4.21E-08	8.80E-09	12.8	SE
SSE	2000.	1.51E-06	6.99E-07	4.76E-07	2.07E-07	6.25E-08	1.45E-08	18.7	SSE
MAX X/Q		2.05E-06							
TOTAL HOURS AROUND SITE:		605.2							
SRP 2.3.4	2000.	1.80E-06	8.11E-07	5.44E-07					

2.29E-07	6.61E-08	1.45E-08			
SITE LIMIT		1.80E-06	8.11E-07	5.44E-07	
2.29E-07	6.61E-08	1.45E-08			

THE FIVE-PERCENT-FOR-THE-ENTIRE-SITE X/Q IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

SECTOR	DOWNWIND DISTANCE (METERS)	FUMIGATION X/Q
S	2000.	2.20E-05
SSW	2000.	2.20E-05
SW	2000.	2.20E-05
WSW	2000.	2.20E-05
W	2000.	2.20E-05
WNW	2000.	2.20E-05
NW	2000.	2.20E-05
NNW	2000.	2.20E-05
N	2000.	2.20E-05
NNE	2000.	2.20E-05
NE	2000.	2.20E-05
ENE	2000.	2.20E-05
E	2000.	2.20E-05
ESE	2000.	2.20E-05
SE	2000.	2.20E-05
SSE	2000.	2.20E-05

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY.
CHECK THE REASONABLENESS OF THE ENVELOPES
COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY
FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

```
   1  1111
Peach Bottom                                    Stack Release
97.5 meters          10.1-96.3 meters

Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
   11    1
2584. 54.3131.4 97.5
    0    0    0    2    6    5    0
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   3.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   2.  10.  10.  15.   3.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   5.   6.  10.  23.  59.  25.   2.   0.   0.   1.   2.   0.   0.   0.
0.   1.
   1.   3.  11.  18.  43.  40.  10.   4.   2.   2.   2.   0.   1.   3.
0.   0.
   0.   6.  10.  11.  13.  17.   9.   0.   7.   4.   3.   3.   2.   3.
0.   5.
   0.   1.   2.  13.   8.   3.   9.   0.   4.   3.   0.   6.  13.   7.
3.   4.
   2.   4.   9.  11.   2.   3.   7.   0.   6.   2.   2.   1.  14.   5.
2.  14.
   1.   2.   0.   1.   0.   1.   0.   0.   0.   0.   0.   2.  10.   2.
0.   1.
   1.   0.   0.   0.   0.   1.   0.   0.   0.   0.   0.   1.   6.   5.
1.   1.
   0.   1.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   1.   1.   9.   5.   0.   2.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   1.   7.   5.   8.  21.   5.   1.   0.   0.   0.   0.   0.   1.   0.
1.   0.
  12.  15.   9.  11.  34.  19.   6.   1.   1.   4.   3.   1.   3.   1.
2.   3.
   1.  11.  11.  18.   6.  21.  11.   4.   4.   4.   4.   2.   3.   5.
1.   7.
   2.   5.   4.   2.   5.   9.  13.   5.  17.   9.   6.   5.  13.   2.
1.  12.
   3.   0.   3.   1.   3.   0.   9.   6.  14.   5.   6.   7.  10.   8.
3.  15.
   8.   2.   1.   1.   0.   2.   5.   3.  22.   5.   3.  13.  21.  15.
6.  20.
   1.   3.   0.   0.   0.   1.   1.   1.   6.   1.   1.   2.  11.  12.
5.   6.
   0.   0.   1.   0.   0.   0.   0.   0.   1.   1.   0.   1.   7.  10.
0.   0.
   0.   2.   2.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   3.  10.  14.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   4.   7.  11.  16.  31.  17.   2.   0.   1.   0.   0.   0.   0.   0.
0.   1.
  18.  14.  15.  17.  17.  40.   6.   4.  11.   4.   7.   3.   2.   2.
3.  16.
  26.  12.   8.  11.  10.  21.  26.  13.  20.  13.   9.   4.  16.   6.
8.  35.
  21.   6.   3.   8.   5.  11.  31.  10.  40.  14.  15.  14.  23.  13.
9.  45.
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14. 2. 4. 2. 2. 3. 7. 5. 48. 18. 16. 24. 48. 45.
26. 74.
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209. 119. 120. 174. 227. 179. 192. 134. 171. 110. 98. 90. 89. 59.
118. 231.
216. 175. 125. 187. 215. 168. 282. 234. 320. 203. 128. 80. 109. 115.
186. 390.
237. 151. 118. 123. 134. 129. 212. 204. 330. 193. 142. 89. 134. 160.
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21. 15. 15. 20. 24. 17. 26. 16. 26. 16. 17. 19. 30. 17.
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00.0000.

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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PRINTOUT OF INPUT CARDS

```
   1     00010 01111 00000 00000 00000 00000 00000 00000 00000 00000
00000 00000 00000 00000 00000 00000   2     Peach Bottom
Stack Release
   3     97.5 meters         10.1-96.3 meters
   4
   5     Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316
ft Delta T           6         11 42771     1
   7          0.500  2584.000    54.300   131.400    97.500
   8        0.000  0.000  0.000  2.000  6.000  5.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  3.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  2.000 10.000 10.000 15.000  3.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        5.000  6.000 10.000 23.000 59.000 25.000  2.000  0.000  0.000
1.000  2.000  0.000  0.000  0.000  0.000  1.000
   9        1.000  3.000 11.000 18.000 43.000 40.000 10.000  4.000  2.000
2.000  2.000  0.000  1.000  3.000  0.000  0.000
   9        0.000  6.000 10.000 11.000 13.000 17.000  9.000  0.000  7.000
4.000  3.000  3.000  2.000  3.000  0.000  5.000
   9        0.000  1.000  2.000 13.000  8.000  3.000  9.000  0.000  4.000
3.000  0.000  6.000 13.000  7.000  3.000  4.000
   9        2.000  4.000  9.000 11.000  2.000  3.000  7.000  0.000  6.000
2.000  2.000  1.000 14.000  5.000  2.000 14.000
   9        1.000  2.000  0.000  1.000  0.000  1.000  0.000  0.000  0.000
0.000  0.000  2.000 10.000  2.000  0.000  1.000
   9        1.000  0.000  0.000  0.000  0.000  1.000  0.000  0.000  0.000
0.000  0.000  1.000  6.000  5.000  1.000  1.000
   9        0.000  1.000  1.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  1.000  1.000  9.000  5.000  0.000  2.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        1.000  7.000  5.000  8.000 21.000  5.000  1.000  0.000  0.000
0.000  0.000  0.000  1.000  0.000  1.000  0.000
   9       12.000 15.000  9.000 11.000 34.000 19.000  6.000  1.000  1.000
4.000  3.000  1.000  3.000  1.000  2.000  3.000
   9        1.000 11.000 11.000 18.000  6.000 21.000 11.000  4.000  4.000
4.000  4.000  2.000  3.000  5.000  1.000  7.000
   9        2.000  5.000  4.000  2.000  5.000  9.000 13.000  5.000 17.000
9.000  6.000  5.000 13.000  2.000  1.000 12.000
   9        3.000  0.000  3.000  1.000  3.000  0.000  9.000  6.000 14.000
5.000  6.000  7.000 10.000  8.000  3.000 15.000
   9        8.000  2.000  1.000  1.000  0.000  2.000  5.000  3.000 22.000
5.000  3.000 13.000 21.000 15.000  6.000 20.000
   9        1.000  3.000  0.000  0.000  0.000  1.000  1.000  1.000  6.000
1.000  1.000  2.000 11.000 12.000  5.000  6.000
   9        0.000  0.000  1.000  0.000  0.000  0.000  0.000  0.000  1.000
1.000  0.000  1.000  7.000 10.000  0.000  0.000
   9        0.000  2.000  2.000  1.000  0.000  0.000  0.000  0.000  0.000
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   9        0.000  3.000 10.000 14.000  1.000  0.000  0.000  0.000  0.000
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   9        4.000  7.000 11.000 16.000 31.000 17.000  2.000  0.000  1.000
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58.000345.000108.000 91.000139.000311.000543.000821.000694.000
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21.000 15.000 20.000211.000392.000489.000230.000
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS A
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22 0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05 1.13	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.55 1.67	0.000	0.000	0.000	0.000	0.007	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.007
2.05 2.21	0.000	0.005	0.023	0.023	0.035	0.007	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.094
3.05 3.28	0.012	0.014	0.023	0.054	0.138	0.058	0.005	0.000	0.000	0.002	0.005	0.000	0.000	0.000	0.000	0.002	0.313
4.05 4.36	0.002	0.007	0.026	0.042	0.101	0.094	0.023	0.009	0.005	0.005	0.005	0.000	0.002	0.007	0.000	0.000	0.327
5.05 5.44	0.000	0.014	0.023	0.026	0.030	0.040	0.021	0.000	0.016	0.009	0.007	0.007	0.005	0.007	0.000	0.012	0.217
6.05 6.52	0.000	0.002	0.005	0.030	0.019	0.007	0.021	0.000	0.009	0.007	0.000	0.014	0.030	0.016	0.007	0.009	0.178
8.05 8.67	0.005	0.009	0.021	0.026	0.005	0.007	0.016	0.000	0.014	0.005	0.005	0.002	0.033	0.012	0.005	0.033	0.196
10.00 10.77	0.002	0.005	0.000	0.002	0.000	0.002	0.000	0.000	0.000	0.000	0.000	0.005	0.023	0.005	0.000	0.002	0.047
24.59 26.49	0.002	0.000	0.000	0.000	0.000	0.002	0.000	0.000	0.000	0.000	0.000	0.002	0.014	0.012	0.002	0.002	0.037
TOTAL	0.02	0.06	0.12	0.20	0.33	0.22	0.09	0.01	0.04	0.03	0.02	0.03	0.11	0.06	0.01	0.06	1.42

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS B
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22 0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05 1.13	0.000	0.002	0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005
1.55 1.67	0.000	0.002	0.002	0.021	0.012	0.000	0.005	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.042
2.05 2.21	0.002	0.016	0.012	0.019	0.049	0.012	0.002	0.000	0.000	0.000	0.000	0.000	0.002	0.000	0.002	0.000	0.117
3.05 3.28	0.028	0.035	0.021	0.026	0.079	0.044	0.014	0.002	0.002	0.009	0.007	0.002	0.007	0.002	0.005	0.007	0.292

4.05	4.36	0.002	0.026	0.026	0.042	0.014	0.049	0.026	0.009
0.009	0.009	0.009	0.005	0.007	0.012	0.002	0.016	0.264	
5.05	5.44	0.005	0.012	0.009	0.005	0.012	0.021	0.030	0.012
0.040	0.021	0.014	0.012	0.030	0.005	0.002	0.028	0.257	
6.05	6.52	0.007	0.000	0.007	0.002	0.007	0.000	0.021	0.014
0.033	0.012	0.014	0.016	0.023	0.019	0.007	0.035	0.217	
8.05	8.67	0.019	0.005	0.002	0.002	0.000	0.005	0.012	0.007
0.051	0.012	0.007	0.030	0.049	0.035	0.014	0.047	0.297	
10.00	10.77	0.002	0.007	0.000	0.000	0.000	0.002	0.002	0.002
0.014	0.002	0.002	0.005	0.026	0.028	0.012	0.014	0.119	
24.59	26.49	0.000	0.000	0.002	0.000	0.000	0.000	0.000	0.000
0.002	0.002	0.000	0.002	0.016	0.023	0.000	0.000	0.049	
TOTAL		0.07	0.11	0.08	0.12	0.17	0.13	0.11	0.05
0.15	0.07	0.05	0.07	0.16	0.12	0.04	0.15	1.66	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS C
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
1.05	1.13	0.000	0.005	0.005	0.002	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.012	
1.55	1.67	0.000	0.007	0.023	0.033	0.002	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.065	
2.05	2.21	0.009	0.016	0.026	0.037	0.072	0.040	0.005	0.000
0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.002	0.210	
3.05	3.28	0.042	0.033	0.035	0.040	0.040	0.094	0.014	0.009
0.026	0.009	0.016	0.007	0.005	0.005	0.007	0.037	0.419	
4.05	4.36	0.061	0.028	0.019	0.026	0.023	0.049	0.061	0.030
0.047	0.030	0.021	0.009	0.037	0.014	0.019	0.082	0.556	
5.05	5.44	0.049	0.014	0.007	0.019	0.012	0.026	0.072	0.023
0.094	0.033	0.035	0.033	0.054	0.030	0.021	0.105	0.627	
6.05	6.52	0.019	0.019	0.000	0.007	0.005	0.007	0.035	0.028
0.087	0.040	0.026	0.035	0.026	0.049	0.042	0.101	0.524	
8.05	8.67	0.033	0.005	0.009	0.005	0.005	0.007	0.016	0.012
0.112	0.042	0.037	0.056	0.112	0.105	0.061	0.173	0.790	
10.00	10.77	0.009	0.002	0.000	0.000	0.002	0.005	0.000	0.002
0.023	0.000	0.007	0.007	0.068	0.063	0.051	0.033	0.274	
24.59	26.49	0.002	0.007	0.000	0.000	0.000	0.000	0.000	0.000
0.002	0.000	0.005	0.005	0.037	0.077	0.028	0.009	0.173	
TOTAL		0.22	0.14	0.12	0.17	0.16	0.23	0.20	0.11
0.39	0.15	0.15	0.15	0.34	0.34	0.23	0.54	3.65	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS D
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.24	0.000	0.000	0.001	0.001	0.001	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005	
1.05	1.13	0.042	0.042	0.065	0.061	0.065	0.047	0.033	0.030
0.028	0.014	0.021	0.014	0.019	0.044	0.019	0.023	0.568	
1.55	1.67	0.096	0.094	0.187	0.217	0.203	0.154	0.072	0.051
0.068	0.040	0.054	0.021	0.042	0.044	0.065	0.094	1.503	
2.05	2.21	0.157	0.124	0.182	0.231	0.304	0.180	0.126	0.117
0.091	0.072	0.065	0.056	0.070	0.044	0.094	0.117	2.032	

3.05	3.28	0.489	0.278	0.281	0.407	0.531	0.419	0.449	0.313
0.400	0.257	0.229	0.210	0.208	0.138	0.276	0.540	5.424	
4.05	4.36	0.505	0.409	0.292	0.437	0.503	0.393	0.659	0.547
0.748	0.475	0.299	0.187	0.255	0.269	0.435	0.912	7.325	
5.05	5.44	0.554	0.353	0.276	0.288	0.313	0.302	0.496	0.477
0.772	0.451	0.332	0.208	0.313	0.374	0.549	1.024	7.082	
6.05	6.52	0.545	0.231	0.187	0.126	0.241	0.238	0.302	0.344
0.641	0.309	0.187	0.241	0.332	0.458	0.776	0.949	6.107	
8.05	8.67	0.650	0.264	0.122	0.103	0.203	0.220	0.250	0.136
0.807	0.253	0.213	0.325	0.727	1.270	1.920	1.623	9.083	
10.00	10.77	0.161	0.065	0.030	0.026	0.056	0.056	0.035	0.023
0.224	0.049	0.035	0.047	0.493	0.917	1.143	0.538	3.900	
24.59	26.49	0.058	0.023	0.023	0.005	0.042	0.016	0.019	0.002
0.094	0.014	0.012	0.028	0.290	0.531	0.599	0.220	1.976	
TOTAL		3.26	1.88	1.65	1.90	2.46	2.03	2.44	2.04
3.87	1.93	1.45	1.34	2.75	4.09	5.88	6.04	45.00	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS E
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.26	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001
0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.000	0.014	
1.05	1.22	0.049	0.035	0.035	0.047	0.056	0.040	0.061	0.037
0.061	0.037	0.040	0.044	0.070	0.040	0.054	0.026	0.732	
1.55	1.80	0.091	0.068	0.049	0.096	0.084	0.101	0.082	0.101
0.103	0.094	0.098	0.082	0.056	0.044	0.037	0.054	1.239	
2.05	2.38	0.117	0.101	0.082	0.119	0.152	0.112	0.210	0.161
0.140	0.152	0.147	0.084	0.098	0.054	0.070	0.084	1.884	
3.05	3.54	0.320	0.215	0.213	0.323	0.393	0.264	0.435	0.411
0.615	0.458	0.383	0.260	0.238	0.192	0.262	0.269	5.251	
4.05	4.70	0.414	0.306	0.222	0.203	0.288	0.313	0.479	0.547
1.010	0.638	0.447	0.271	0.281	0.271	0.360	0.468	6.518	
5.05	5.86	0.421	0.185	0.161	0.094	0.159	0.271	0.355	0.456
0.989	0.601	0.386	0.348	0.451	0.376	0.596	0.498	6.348	
6.05	7.02	0.238	0.070	0.058	0.021	0.087	0.143	0.206	0.332
0.664	0.426	0.231	0.367	0.498	0.542	0.648	0.645	5.176	
8.05	9.35	0.257	0.061	0.040	0.014	0.091	0.108	0.161	0.241
0.858	0.351	0.372	0.414	0.975	1.031	1.153	0.786	6.911	
10.00	11.61	0.056	0.023	0.007	0.009	0.026	0.047	0.037	0.026
0.168	0.044	0.063	0.089	0.206	0.290	0.236	0.112	1.440	
24.59	28.54	0.019	0.002	0.014	0.002	0.049	0.007	0.021	0.002
0.021	0.005	0.005	0.005	0.023	0.028	0.023	0.033	0.260	
TOTAL		1.98	1.07	0.88	0.93	1.39	1.41	2.05	2.32
4.63	2.81	2.17	1.96	2.90	2.87	3.44	2.97	35.77	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS F
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.26	0.001	0.000	0.001	0.001	0.001	0.001	0.001	0.001
0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.000	0.012	
1.05	1.22	0.037	0.016	0.030	0.023	0.026	0.028	0.023	0.028
0.028	0.028	0.035	0.035	0.033	0.030	0.030	0.016	0.449	
1.55	1.80	0.023	0.028	0.021	0.037	0.047	0.026	0.042	0.047
0.026	0.047	0.040	0.042	0.037	0.035	0.030	0.035	0.563	

2.05	2.38	0.061	0.030	0.033	0.023	0.030	0.042	0.063	0.079	0.077	0.068	0.063	0.084	0.051	0.042	0.042	0.047	0.837
3.05	3.54	0.124	0.044	0.042	0.040	0.035	0.065	0.101	0.103	0.175	0.208	0.231	0.150	0.101	0.091	0.140	0.138	1.789
4.05	4.70	0.145	0.044	0.016	0.023	0.033	0.042	0.087	0.075	0.208	0.168	0.245	0.180	0.206	0.115	0.161	0.124	1.873
5.05	5.86	0.068	0.021	0.014	0.000	0.012	0.026	0.042	0.108	0.108	0.108	0.154	0.199	0.199	0.173	0.203	0.133	1.566
6.05	7.02	0.028	0.009	0.007	0.000	0.000	0.005	0.016	0.035	0.094	0.044	0.072	0.133	0.199	0.129	0.157	0.110	1.038
8.05	9.35	0.005	0.000	0.000	0.000	0.000	0.002	0.009	0.014	0.056	0.047	0.054	0.187	0.299	0.243	0.143	0.044	1.104
10.00	11.61	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.002	0.007	0.002	0.049	0.054	0.054	0.000	0.012	0.180
24.59	28.54	0.002	0.000	0.000	0.000	0.009	0.000	0.000	0.000	0.000	0.000	0.000	0.002	0.002	0.000	0.000	0.000	0.016
TOTAL		0.49	0.19	0.16	0.15	0.19	0.24	0.38	0.49	0.77	0.73	0.90	1.06	1.18	0.91	0.91	0.66	9.43

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS G
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22	0.26	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05	1.22	0.016	0.021	0.014	0.014	0.019	0.005	0.002	0.016	0.019	0.019	0.002	0.023	0.019	0.019	0.016	0.023	0.248
1.55	1.80	0.009	0.012	0.012	0.009	0.012	0.007	0.007	0.005	0.021	0.002	0.012	0.019	0.012	0.014	0.014	0.021	0.187
2.05	2.38	0.009	0.021	0.012	0.009	0.012	0.002	0.026	0.009	0.019	0.021	0.014	0.019	0.016	0.019	0.026	0.028	0.262
3.05	3.54	0.082	0.019	0.035	0.030	0.016	0.012	0.028	0.012	0.051	0.044	0.051	0.044	0.058	0.051	0.103	0.079	0.718
4.05	4.70	0.040	0.007	0.012	0.009	0.007	0.002	0.019	0.007	0.014	0.037	0.084	0.058	0.065	0.061	0.124	0.145	0.692
5.05	5.86	0.016	0.009	0.002	0.000	0.000	0.002	0.009	0.007	0.019	0.009	0.037	0.094	0.063	0.047	0.096	0.068	0.479
6.05	7.02	0.000	0.000	0.000	0.000	0.000	0.000	0.005	0.002	0.002	0.012	0.023	0.054	0.087	0.023	0.040	0.019	0.267
8.05	9.35	0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.002	0.002	0.000	0.012	0.033	0.056	0.075	0.012	0.009	0.203
10.00	11.61	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005	0.002	0.005	0.000	0.000	0.012
24.59	28.54	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
TOTAL		0.18	0.09	0.09	0.07	0.07	0.03	0.10	0.06	0.15	0.14	0.24	0.35	0.38	0.31	0.43	0.39	3.07

WIND MEASURED AT 97.5 METERS.
WIND SPEED CORRECTED TO THE RELEASE HEIGHT OF 131.4 METERS.

OVERALL WIND DIRECTION FREQUENCY

WIND DIRECTION:	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW
FREQUENCY:	6.2	3.5	3.1	3.5	4.8	4.3	5.4	5.1	10.0	5.9	5.0	5.0	7.8	8.7	10.9	10.8

OVERALL WIND SPEED FREQUENCY AS MEASURED ON THE TOWER:
MAX.WIND SPEED (M/S): 0.224 1.051 1.551 2.052 3.049 4.050
5.052 6.048 8.051 10.000 24.587
WIND SPEED FREQUENCY: 0.03 2.01 3.61 5.44 14.21 17.56 16.58
13.51 18.59 5.97 2.51

BUILDING AND RELEASE CHARACTERISTICS:
RELEASE HEIGHT: 131.40 METERS
MIXING VOLUME COEFFICIENT: 0.50
BUILDING CROSS-SECTIONAL AREA: 2584.00 SQUARE METERS

BOUNDARY DISTANCES (METERS) FROM THE SOURCE FOR EACH DOWNWIND SECTOR:

DOWNWIND SECTOR	S	SSW	SW	WSW	W	WNW	NW	NNW	N	NNE	NE	ENE	E	ESE	SE	SSE
BOUNDARY 1	3000.	3000.	3000.	3000.	3000.	3000.	3000.	3000.	3000.	3000.	3000.	3000.	3000.	3000.	3000.	3000.
BOUNDARY 2	4000.	4000.	4000.	4000.	4000.	4000.	4000.	4000.	4000.	4000.	4000.	4000.	4000.	4000.	4000.	4000.

DISTANCES AND TERRAIN HEIGHTS (IN METERS) AS A FUNCTION OF THE DOWNWIND SECTOR:

SECTOR	S	SSW	SW	WSW	W	WNW	NW	NNW	N	NNE	NE	ENE	E	ESE	SE	SSE
DISTANCE	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.
ELEVATION	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.

THE CONVERSION FACTOR APPLIED TO THE WIND SPEED CLASSES IS 0.447

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

WINDSPEEDS ADJUSTED TO 131.4 METERS.

PERCENT OF THE TIME A GIVEN WINDSPEED IS LOWER:

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.24	0.00
0.26	0.03
1.13	0.61
1.22	2.04
1.67	3.66
1.80	5.65
2.21	8.10
2.38	11.09
3.28	17.54
3.54	25.29
4.36	33.77
4.70	42.85
5.44	51.03
5.86	59.43
6.52	66.45
7.02	72.93
8.67	83.30
9.35	91.52
10.77	95.86
11.61	97.49
26.49	99.72
28.54	100.00

WINDSPEED (INTERPOLATED) (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.26	0.03
1.19	2.04
1.74	5.65
2.30	11.09
3.42	25.29
4.54	42.85
5.66	59.43
6.76	72.93
8.97	91.52
11.00	97.49
26.72	100.00

LOG-NORMAL INTERPOLATION PERCENTILES

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.87	1.00
1.37	3.00
1.66	5.00
2.20	10.00
2.63	15.00
3.02	20.00
3.40	25.00
3.72	30.00
4.03	35.00
4.35	40.00
4.67	45.00
4.99	50.00
5.33	55.00
5.70	60.00
6.07	65.00
6.49	70.00
6.92	75.00
7.36	80.00
8.05	85.00
8.67	90.00

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.19	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	0.04	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	8.7	0.08	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
A	10.8	0.04	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	5.798E-08
A	26.5	0.04	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.358E-08
B	2.2	0.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	0.45	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.08	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.11	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.30	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
C	2.2	0.15	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.197E-06
C	3.3	0.68	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.98	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.79	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.30	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07
C	8.7	0.53	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	5.598E-07

C	10.8	0.15	3000.	0.	131.	288.5		
166.2	0.0	0.000E+00	0.000E+00	4.507E-07				
C	26.5	0.04	3000.	0.	131.	288.5		
166.2	0.0	0.000E+00	0.000E+00	1.833E-07				
D	0.2	0.01	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.556E-05				
D	1.1	0.68	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.312E-06				
D	1.7	1.54	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	2.243E-06				
D	2.2	2.52	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.696E-06				
D	3.3	7.85	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.141E-06				
D	4.4	8.11	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	8.590E-07				
D	5.4	8.90	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	6.887E-07				
D	6.5	8.75	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	5.752E-07				
D	8.7	10.44	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	4.321E-07				
D	10.8	2.59	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	3.479E-07				
D	26.5	0.94	4000.	0.	131.	263.4		
78.0	0.0	0.000E+00	0.000E+00	1.415E-07				
E	0.3	0.02	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.835E-06				
E	1.2	0.79	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.880E-06				
E	1.8	1.47	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.273E-06				
E	2.4	1.88	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	9.624E-07				
E	3.5	5.15	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	6.477E-07				
E	4.7	6.65	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	4.876E-07				
E	5.9	6.76	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.909E-07				
E	7.0	3.83	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.265E-07				
E	9.3	4.13	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	2.453E-07				
E	11.6	0.90	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.975E-07				
E	28.5	0.30	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.032E-08				
F	0.3	0.02	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	4.813E-06				
F	1.2	0.60	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	1.024E-06				
F	1.8	0.38	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	6.935E-07				
F	2.4	0.98	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	5.243E-07				
F	3.5	1.99	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.33	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.09	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.08	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	28.5	0.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.31	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.64	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	9.3	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	2.197E-06	1.880E-06	1.696E-06	1.478E-06	1.273E-06	
0.006	0.021	0.036	0.713	2.253	2.403	3.192	5.709	6.385	7.850	
0.00035	0.00129	0.00226	0.04435	0.14021	0.14956	0.19866	0.35530	0.39739	0.48857	

1.141E-06	1.113E-06	1.024E-06	9.764E-07	9.624E-07	8.923E-07	8.590E-07	7.452E-07	6.935E-07	6.887E-07	
15.701	16.678	17.279	17.317	19.195	19.984	28.098	28.399	28.774	37.678	
0.97722	1.03801	1.07542	1.07776	1.19466	1.24376	1.74877	1.76748	1.79086	2.34497	

6.571E-07	6.477E-07	5.752E-07	5.598E-07	5.243E-07	4.947E-07	4.876E-07	4.507E-07	4.321E-07	3.966E-07	
38.128	43.275	52.028	52.554	53.531	53.568	60.217	60.368	70.811	70.886	
2.37303	2.69334	3.23810	3.27083	3.33162	3.33396	3.74779	3.75714	4.40712	4.41179	

3.909E-07	3.528E-07	3.479E-07	3.312E-07	3.265E-07	2.656E-07	2.488E-07	2.453E-07	2.130E-07	2.003E-07	
77.648	79.639	82.231	82.344	86.176	88.505	88.805	92.938	94.027	94.065	
4.83264	4.95655	5.11788	5.12489	5.36337	5.50833	5.52703	5.78422	5.85202	5.85436	

1.975E-07	1.902E-07	1.833E-07	1.779E-07	1.432E-07	1.415E-07	1.336E-07	9.605E-08	8.032E-08	7.201E-08	
94.966	95.154	95.192	95.642	95.680	96.619	96.694	96.957	97.258	97.333	
5.91047	5.92216	5.92450	5.95256	5.95490	6.01335	6.01802	6.03439	6.05309	6.05777	

```
   6.505E-08   5.798E-08   4.918E-08   4.375E-08   3.310E-08   2.491E-08
2.358E-08   1.998E-08   1.253E-08
      97.483      97.521      97.671      97.709      99.023      99.662
99.700      99.962     100.000
     6.06712     6.06946     6.07881     6.08115     6.16298     6.20273
6.20507     6.22143     6.22377

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.355
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.037
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.747
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.235
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.404
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.829
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.360

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  1  1     -11.07050 -16.59690  -1.22924
  1  2     -13.28753 -16.27468  -1.10955
  1  3     -13.70856 -16.64913  -1.27145
  1  4     -13.96752 -17.19866  -1.53201
  1  5     -14.36856 -18.09853  -2.01913
  1  6     -14.65458 -18.53725  -2.27635
  1  7     -14.75472 -20.65498  -3.55082
  1  8     -14.93482     NUMXQ(K)=  8
    3.279E-06              0.062              1.000
    2.189E-06              0.187              3.000
    1.790E-06              0.311              5.000
    1.369E-06              0.622             10.000
    1.163E-06              0.934             15.000
    1.019E-06              1.245             20.000
    9.118E-07              1.556             25.000
    8.246E-07              1.867             30.000
    7.479E-07              2.178             35.000
    6.859E-07              2.490             40.000
    6.345E-07              2.801             45.000
```

5.910E-07	3.112	50.000
5.469E-07	3.423	55.000
5.049E-07	3.734	60.000
4.686E-07	4.045	65.000
4.369E-07	4.357	70.000
4.060E-07	4.668	75.000
3.714E-07	4.979	80.000
3.344E-07	5.290	85.000
1.491E-06	0.5	8.03

ANNUAL AVERAGE = 1.43E-08

K= 1 FIVEXQ(K)= 1.491E-06 FIVEPR(K)= 8.034

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.376	1.428	5.034	12.976	65.311	97.183
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	2.2	0.13	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.826E-07
A	3.3	0.40	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	0.20	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.40	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.07	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.26	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
A	10.8	0.13	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	5.798E-08
B	1.1	0.07	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	1.907E-06
B	1.7	0.07	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	1.292E-06
B	2.2	0.46	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	0.99	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.73	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.33	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	8.7	0.13	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.20	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
C	1.1	0.13	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	4.291E-06
C	1.7	0.20	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.906E-06
C	2.2	0.46	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.197E-06

AT 131.4 METERS
CA=1292.SQ.METERS

C	3.3	0.93	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	1.478E-06						
C	4.4	0.79	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	1.113E-06						
C	5.4	0.40	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	8.923E-07						
C	6.5	0.53	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	7.452E-07						
C	8.7	0.13	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	5.598E-07						
C	10.8	0.07	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	4.507E-07						
C	26.5	0.20	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	1.833E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.19	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	2.65	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	3.51	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	7.88	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	11.58	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	10.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.55	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	7.48	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.85	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.66	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.92	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.85	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	8.67	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.66	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						

```
   F          0.3        0.01     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   4.813E-06
   F          1.2        0.46     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   1.024E-06
   F          1.8        0.79     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   6.935E-07
   F          2.4        0.86     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   5.243E-07
   F          3.5        1.26     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   3.528E-07
   F          4.7        1.26     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   2.656E-07
   F          5.9        0.60     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   2.130E-07
   F          7.0        0.26     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   1.779E-07

   G          1.2        0.60     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   9.605E-08
   G          1.8        0.33     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   6.505E-08
   G          2.4        0.60     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   4.918E-08
   G          3.5        0.53     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   3.310E-08
   G          4.7        0.20     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   2.491E-08
   G          5.9        0.26     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.291E-06 3.312E-06 2.906E-06 2.243E-06 2.197E-06 1.907E-06 1.880E-06
0.010 0.029 0.041 0.173 1.365 1.563 4.211 4.675 4.741 5.734
0.00035 0.00102 0.00144 0.00612 0.04821 0.05522 0.14874 0.16511 0.16745 0.20252

1.696E-06 1.478E-06 1.292E-06 1.273E-06 1.141E-06 1.113E-06 1.024E-06 9.764E-07 9.624E-07 8.923E-07
9.242 10.169 10.235 12.155 20.033 20.827 21.290 21.754 24.600 24.998
0.32643 0.35916 0.36150 0.42930 0.70753 0.73559 0.75195 0.76832 0.86886 0.88288

8.590E-07 7.452E-07 6.935E-07 6.887E-07 6.571E-07 6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07
36.582 37.112 37.906 47.902 48.895 54.985 61.539 61.671 62.532 63.260
1.29204 1.31074 1.33880 1.69184 1.72691 1.94201 2.17348 2.17815 2.20855 2.23427

4.876E-07 4.507E-07 4.321E-07 3.966E-07 3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.826E-07 2.656E-07
71.932 71.998 79.479 79.810 85.039 86.297 88.151 90.136 90.269 91.527
2.54055 2.54289 2.80708 2.81877 3.00348 3.04790 3.11337 3.18351 3.18818 3.23261

2.488E-07 2.453E-07 2.130E-07 2.003E-07 1.975E-07 1.902E-07 1.833E-07 1.779E-07 1.432E-07 1.415E-07
91.659 93.380 93.976 94.175 94.837 95.234 95.432 95.697 95.896 96.558
3.23728 3.29807 3.31911 3.32613 3.34951 3.36354 3.37055 3.37990 3.38692 3.41030

```
   1.148E-07   9.605E-08   9.586E-08   8.032E-08   7.201E-08   6.505E-08
5.798E-08   4.918E-08   3.310E-08   2.491E-08
      96.955      97.551      97.617      97.683      97.948      98.279
98.411      99.007      99.537      99.735
     3.42432     3.44537     3.44770     3.45004     3.45940     3.47109
3.47576     3.49680     3.51551     3.52252

   1.998E-08
     100.000
     3.53187

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.165
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.326
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.707
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.291
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.940
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.538
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.804

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1     -11.07050 -16.72309  -1.25731
  2  2     -13.02857 -16.51770  -1.18741
  2  3     -13.28753 -17.32934  -1.48577
  2  4     -13.68351 -16.78361  -1.26337
  2  5     -13.96752 -17.83394  -1.73457
  2  6     -14.24977 -19.45178  -2.51753
  2  7     -14.53378 -20.00311  -2.79976
  2  8     -14.65458     NUMXQ(K)=  8
    3.862E-06              0.035              1.000
    2.603E-06              0.106              3.000
    2.143E-06              0.177              5.000
    1.631E-06              0.353             10.000
    1.328E-06              0.530             15.000
    1.142E-06              0.706             20.000
    1.030E-06              0.883             25.000
```

9.455E-07	1.060	30.000
8.777E-07	1.236	35.000
8.086E-07	1.413	40.000
7.457E-07	1.589	45.000
6.929E-07	1.766	50.000
6.476E-07	1.943	55.000
5.914E-07	2.119	60.000
5.435E-07	2.296	65.000
5.021E-07	2.472	70.000
4.637E-07	2.649	75.000
1.369E-06	0.5	14.16

ANNUAL AVERAGE = 1.04E-08

K= 2 FIVEXQ(K)= 1.369E-06 FIVEPR(K)=14.157

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 9.368E-01 7.317E-01 3.613E-01 2.419E-01 2.081E-01
1.693E-02
1.589 4.568 8.407 13.914 67.279 97.484
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.75	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.826E-07
A	3.3	0.75	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	0.83	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.75	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.15	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.68	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
B	1.1	0.08	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	1.907E-06
B	1.7	0.08	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	1.292E-06
B	2.2	0.38	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	0.68	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.83	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.30	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.23	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.08	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	26.5	0.08	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	8.148E-08
C	1.1	0.15	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	4.291E-06
C	1.7	0.75	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.906E-06
C	2.2	0.83	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.197E-06

C	3.3	1.13	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	1.478E-06						
C	4.4	0.60	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	1.113E-06						
C	5.4	0.23	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	8.923E-07						
C	8.7	0.30	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	5.598E-07						
D	0.2	0.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	2.11	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	6.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	5.87	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	9.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	9.40	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	8.87	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	3.91	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	0.98	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.75	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.58	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.84	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.14	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.19	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.88	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.28	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.45	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.03	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.68	90000.	0.	131.	1000.0		

```
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F        2.4       1.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       1.35     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.53     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.45     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.23     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07

   G        1.2       0.45     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.08     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.291E-06 3.312E-06 2.906E-06 2.243E-06 2.197E-06 1.907E-06 1.880E-06
0.017 0.039 0.064 0.215 2.320 3.072 9.088 9.915 9.990 11.118
0.00054 0.00121 0.00200 0.00668 0.07214 0.09552 0.28257 0.30828 0.31062 0.34569

1.696E-06 1.478E-06 1.292E-06 1.273E-06 1.141E-06 1.113E-06 1.024E-06 9.764E-07 9.624E-07 8.923E-07
16.984 18.111 18.187 19.766 28.789 29.391 30.368 30.744 33.376 33.602
0.52806 0.56313 0.56547 0.61457 0.89513 0.91384 0.94423 0.95592 1.03775 1.04477

8.590E-07 6.935E-07 6.887E-07 6.571E-07 6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07 4.876E-07
43.001 43.678 52.551 53.228 60.071 66.087 66.387 67.440 68.267 75.411
1.33702 1.35806 1.63395 1.65499 1.86775 2.05480 2.06415 2.09688 2.12260 2.34471

4.321E-07 3.966E-07 3.909E-07 3.528E-07 3.479E-07 3.312E-07 3.265E-07 2.826E-07 2.656E-07 2.488E-07
79.321 79.622 84.810 86.164 87.141 87.367 89.247 89.999 90.525 90.601
2.46629 2.47564 2.63697 2.67905 2.70944 2.71646 2.77491 2.79829 2.81466 2.81699

2.453E-07 2.130E-07 1.975E-07 1.902E-07 1.779E-07 1.432E-07 1.415E-07 1.148E-07 9.605E-08 9.586E-08
91.879 92.330 92.556 93.308 93.533 94.360 95.112 95.864 96.315 96.466
2.85674 2.87077 2.87778 2.90116 2.90818 2.93390 2.95728 2.98066 2.99468 2.99936

8.148E-08 8.032E-08 7.201E-08 6.505E-08 4.918E-08 3.310E-08
2.491E-08 1.998E-08
96.541 96.992 97.669 98.045 98.421 99.549
99.925 100.000
3.00170 3.01573 3.03677 3.04846 3.06015 3.09522
3.10691 3.10925

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.308
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(3)= 0.527
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 0.894
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 1.335
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 1.866
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 2.342
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= 2.634

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
3	1	-11.07050	-16.25635	-1.17836
3	2	-13.02857	-16.92796	-1.42354
3	3	-13.28753	-18.63857	-2.09245
3	4	-13.68351	-18.09859	-1.86443
3	5	-13.96752	-18.65475	-2.11543
3	6	-14.24977	-20.50029	-3.00173
3	7	-14.53378	-23.27986	-4.40012
3	8	-14.75472	NUMXQ(K)= 8	

4.912E-06	0.031	1.000
3.405E-06	0.093	3.000
2.840E-06	0.155	5.000
2.188E-06	0.311	10.000
1.802E-06	0.466	15.000
1.504E-06	0.622	20.000
1.272E-06	0.777	25.000
1.109E-06	0.933	30.000
9.956E-07	1.088	35.000
9.051E-07	1.244	40.000
8.273E-07	1.399	45.000

7.576E-07	1.555	50.000
6.987E-07	1.710	55.000
6.484E-07	1.866	60.000
5.876E-07	2.021	65.000
5.357E-07	2.176	70.000
4.910E-07	2.332	75.000
4.365E-07	2.487	80.000
1.742E-06	0.5	16.08

ANNUAL AVERAGE = 1.14E-08

K= 3 FIVEXQ(K)= 1.742E-06 FIVEPR(K)=16.081

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
3.910	6.617	10.603	15.892	68.847	97.218
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.66	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.826E-07
A	3.3	1.52	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	1.19	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.73	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.86	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.73	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
A	10.8	0.07	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	5.798E-08
B	1.7	0.59	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	1.292E-06
B	2.2	0.53	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	0.73	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	1.19	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.13	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.07	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.07	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
C	1.1	0.07	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	4.291E-06
C	1.7	0.92	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.906E-06
C	2.2	1.06	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.197E-06
C	3.3	1.12	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06

C	4.4	0.73	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	1.113E-06						
C	5.4	0.53	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	8.923E-07						
C	6.5	0.20	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	7.452E-07						
C	8.7	0.13	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	5.598E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.72	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	6.14	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	6.54	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	11.49	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	12.35	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	8.12	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	3.57	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	2.91	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	0.73	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.13	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.71	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	9.12	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	5.75	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	2.64	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	0.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	0.40	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	1.06	90000.	0.	131.	1000.0		

```
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.66    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.12    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       0.66    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07

   G         1.2       0.40    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.86    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.291E-06 3.312E-06 2.906E-06 2.243E-06 2.197E-06 1.880E-06 1.696E-06
0.014 0.039 0.057 0.123 1.840 2.765 8.908 9.965 11.286 17.826
0.00050 0.00140 0.00201 0.00434 0.06513 0.09786 0.31530 0.35271 0.39947 0.63094

1.478E-06 1.292E-06 1.273E-06 1.141E-06 1.113E-06 1.024E-06 9.764E-07 9.624E-07 8.923E-07 8.590E-07
18.949 19.543 22.252 33.745 34.472 35.133 35.661 39.030 39.558 51.911
0.67068 0.69173 0.78758 1.19440 1.22012 1.24350 1.26221 1.38144 1.40015 1.83736

7.452E-07 6.935E-07 6.887E-07 6.571E-07 6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07 4.876E-07
52.109 53.166 61.291 62.018 71.133 74.700 74.833 75.493 76.682 82.429
1.84438 1.88178 2.16936 2.19508 2.51773 2.64398 2.64866 2.67204 2.71412 2.91753

4.321E-07 3.966E-07 3.909E-07 3.528E-07 3.479E-07 3.312E-07 3.265E-07 2.826E-07 2.656E-07 2.488E-07
85.335 85.468 88.110 89.233 89.959 90.025 90.620 91.281 91.941 92.007
3.02041 3.02508 3.11860 3.15835 3.18407 3.18641 3.20745 3.23083 3.25421 3.25655

2.453E-07 1.975E-07 1.902E-07 1.432E-07 1.415E-07 1.148E-07 9.605E-08 9.586E-08 8.032E-08 7.201E-08
92.403 92.668 94.187 95.376 95.508 96.235 96.631 97.490 97.556 98.283
3.27057 3.27993 3.33370 3.37579 3.38046 3.40618 3.42021 3.45060 3.45294 3.47866

6.505E-08	5.798E-08	4.918E-08	3.310E-08	2.491E-08
98.547	98.613	98.877	99.736	100.000
3.48801	3.49035	3.49970	3.53010	3.53945

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.352
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.630
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.193
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.835
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.515
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.915
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.116
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
4	1	-11.07050	-16.09213	-1.13690
4	2	-13.02857	-16.51955	-1.29552
4	3	-13.28753	-17.48404	-1.68212
4	4	-13.68351	-17.45005	-1.66708
4	5	-13.96752	-18.44687	-2.14425
4	6	-14.24977	-22.95025	-4.44498
4	7	-14.53378	-28.75409	-7.51016
4	8	-14.75472		

NUMXQ(K)= 8

4.825E-06	0.035	1.000
3.376E-06	0.106	3.000
2.828E-06	0.177	5.000
2.193E-06	0.354	10.000
1.834E-06	0.531	15.000
1.582E-06	0.708	20.000
1.380E-06	0.885	25.000
1.230E-06	1.062	30.000
1.115E-06	1.239	35.000
1.022E-06	1.416	40.000
9.457E-07	1.593	45.000
8.811E-07	1.770	50.000
8.165E-07	1.947	55.000
7.557E-07	2.124	60.000

7.032E-07	2.301	65.000
6.574E-07	2.478	70.000
5.854E-07	2.655	75.000
5.168E-07	2.832	80.000
4.405E-07	3.009	85.000
1.884E-06	0.5	14.13

ANNUAL AVERAGE = 1.40E-08

K= 4 FIVEXQ(K)= 1.884E-06 FIVEPR(K)=14.126

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
5.747	9.050	13.806	17.985	71.703	97.952	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.15	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	3.738E-07
A	2.2	0.73	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.826E-07
A	3.3	2.89	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	2.11	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.64	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.39	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.10	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
B	1.7	0.24	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	1.292E-06
B	2.2	1.03	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	1.67	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.29	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.24	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.15	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
C	1.7	0.05	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.906E-06
C	2.2	1.52	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.197E-06
C	3.3	0.83	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.49	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.24	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07

C	6.5	0.10	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	7.452E-07		
C	8.7	0.10	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	5.598E-07		
C	10.8	0.05	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	4.507E-07		
D	0.2	0.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	1.37	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	4.26	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	6.37	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	11.12	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	10.53	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	6.56	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.04	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.26	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	1.18	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.88	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	1.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.23	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	3.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	1.81	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	1.91	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.54	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	1.03	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.64	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	0.73	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.24	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	28.5	0.20	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.39	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.906E-06	2.243E-06	2.197E-06	1.880E-06	1.696E-06	1.478E-06	
0.011	0.034	0.048	1.419	1.468	5.729	7.247	8.422	14.788	15.621	
0.00054	0.00161	0.00228	0.06775	0.07009	0.27350	0.34598	0.40209	0.70603	0.74578	

1.292E-06	1.273E-06	1.141E-06	1.113E-06	1.024E-06	9.764E-07	9.624E-07	8.923E-07	8.590E-07	7.452E-07	
15.866	17.629	28.746	29.235	29.774	30.802	33.986	34.230	44.759	44.857	
0.75747	0.84164	1.37237	1.39575	1.42147	1.47057	1.62254	1.63423	2.13691	2.14158	

6.935E-07	6.887E-07	6.571E-07	6.477E-07	5.752E-07	5.598E-07	5.243E-07	4.947E-07	4.876E-07	4.507E-07	
45.837	52.399	54.064	62.291	67.336	67.434	68.070	68.364	74.388	74.437	
2.18834	2.50164	2.58113	2.97392	3.21474	3.21942	3.24981	3.26384	3.55142	3.55376	

4.321E-07	3.966E-07	3.909E-07	3.738E-07	3.528E-07	3.479E-07	3.312E-07	3.265E-07	2.826E-07	2.656E-07	
78.697	78.942	82.272	82.419	83.154	84.329	84.476	86.288	87.022	87.708	
3.75716	3.76885	3.92784	3.93486	3.96993	4.02604	4.03305	4.11956	4.15463	4.18736	

2.453E-07	2.130E-07	1.975E-07	1.902E-07	1.432E-07	1.415E-07	1.148E-07	9.605E-08	9.586E-08	8.032E-08	
89.618	89.863	90.401	93.291	95.397	96.278	96.915	97.307	97.698	98.727	
4.27855	4.29024	4.31595	4.45390	4.55443	4.59652	4.62691	4.64562	4.66432	4.71342	

7.201E-08	6.505E-08	4.918E-08	4.375E-08	3.310E-08	2.491E-08
98.825	99.070	99.314	99.510	99.853	100.000
4.71810	4.72979	4.74148	4.75083	4.76719	4.77421

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE ORDERED X/Q-FREQUENCY VALUES, AND AS PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

```
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.705
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.371
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.135
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.971
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.212
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.548
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.754
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
5	1	-11.07050	-16.08357	-1.13910
5	2	-13.28753	-17.19000	-1.58986
5	3	-13.68351	-17.18603	-1.58806
5	4	-13.96752	-18.00630	-1.99279
5	5	-14.24977	-20.73714	-3.44147
5	6	-14.36856	-21.18682	-3.68446
5	7	-14.53378	-23.01640	-4.69769
5	8	-14.65458		

NUMXQ(K)= 8

4.460E-06	0.048	1.000
3.093E-06	0.143	3.000
2.577E-06	0.239	5.000
1.983E-06	0.477	10.000
1.682E-06	0.716	15.000
1.422E-06	0.955	20.000
1.244E-06	1.194	25.000
1.111E-06	1.432	30.000
1.008E-06	1.671	35.000
9.248E-07	1.910	40.000
8.552E-07	2.148	45.000
7.828E-07	2.387	50.000
7.217E-07	2.626	55.000
6.693E-07	2.865	60.000

6.071E-07	3.103	65.000
5.395E-07	3.342	70.000
4.791E-07	3.581	75.000
1.947E-06	0.5	10.47

ANNUAL AVERAGE = 1.65E-08

K= 5 FIVEXQ(K)= 1.947E-06 FIVEPR(K)=10.473

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
7.003	10.627	14.006	18.036	69.615	98.629
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.16	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.826E-07
A	3.3	1.37	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	2.19	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.93	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.16	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.16	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
A	10.8	0.05	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	5.798E-08
A	26.5	0.05	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.358E-08
B	2.2	0.27	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	1.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	1.15	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.49	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	8.7	0.11	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.05	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
C	2.2	0.93	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.197E-06
C	3.3	2.19	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	1.15	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.60	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07

C	6.5	0.16	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	7.452E-07						
C	8.7	0.16	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	5.598E-07						
C	10.8	0.11	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	4.507E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.09	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	3.61	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	4.21	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	9.79	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	9.19	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	7.05	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	5.58	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	5.14	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.31	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.38	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.93	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.35	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.62	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	6.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	3.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	2.52	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	1.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.16	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.60	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.98	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.53	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 2.197E-06 1.880E-06 1.696E-06 1.478E-06 1.273E-06
0.009 0.027 0.044 1.138 4.746 5.676 6.606 10.816 13.003 15.354
0.00038 0.00115 0.00188 0.04864 0.20295 0.24269 0.28244 0.46247 0.55599 0.65653

1.141E-06 1.113E-06 1.024E-06 9.764E-07 9.624E-07 8.923E-07 8.590E-07 7.452E-07 6.935E-07 6.887E-07
25.142 26.291 26.947 27.220 29.845 30.446 39.633 39.797 40.398 47.452
1.07503 1.12413 1.15219 1.16388 1.27611 1.30182 1.69461 1.70163 1.72735 2.02895

6.571E-07 6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07 4.876E-07 4.507E-07 4.321E-07 3.966E-07
48.491 54.670 60.247 60.411 61.396 62.544 69.871 69.980 75.120 75.612
2.07337 2.33757 2.57605 2.58307 2.62515 2.67425 2.98755 2.99222 3.21200 3.23304

3.909E-07 3.528E-07 3.479E-07 3.265E-07 2.826E-07 2.656E-07 2.488E-07 2.453E-07 2.130E-07 2.003E-07
81.955 83.486 84.799 88.134 88.298 89.283 89.392 91.907 92.509 92.563
3.50425 3.56972 3.62583 3.76845 3.77546 3.81755 3.82222 3.92977 3.95549 3.95783

1.975E-07 1.902E-07 1.779E-07 1.432E-07 1.415E-07 1.336E-07 1.148E-07 9.605E-08 9.586E-08 8.032E-08
93.657 95.024 95.133 97.321 97.703 97.758 98.688 98.797 98.961 99.125
4.00459 4.06304 4.06772 4.16124 4.17760 4.17994 4.21969 4.22436 4.23138 4.23839

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   7.201E-08   6.505E-08   5.798E-08   4.918E-08   3.310E-08   2.491E-08
2.358E-08   1.998E-08
      99.289      99.453      99.508      99.563      99.836      99.891
99.945     100.000
     4.24541     4.25242     4.25476     4.25710     4.26879     4.27112
4.27346     4.27580

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.242
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.462
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.074
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.123
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.693
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.335
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.985
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.501
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   3.765

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  6  1     -11.07050 -16.35852  -1.18212
  6  2     -13.02857 -16.43994  -1.21102
  6  3     -13.28753 -16.68288  -1.30435
  6  4     -13.68351 -17.07988  -1.47700
  6  5     -13.70856 -17.38539  -1.61084
  6  6     -13.96752 -18.47670  -2.12517
  6  7     -14.24977 -19.58232  -2.68105
  6  8     -14.53378 -20.37030  -3.09951
  6  9     -14.75472 -24.59627  -5.43202
  6 10     -14.93482     NUMXQ(K)= 10
    4.050E-06              0.043              1.000
    2.779E-06              0.128              3.000
    2.304E-06              0.214              5.000
    1.751E-06              0.428             10.000
    1.461E-06              0.641             15.000
```

1.276E-06	0.855	20.000
1.144E-06	1.069	25.000
1.026E-06	1.283	30.000
9.305E-07	1.497	35.000
8.522E-07	1.710	40.000
7.696E-07	1.924	45.000
7.015E-07	2.138	50.000
6.433E-07	2.352	55.000
5.824E-07	2.565	60.000
5.308E-07	2.779	65.000
4.864E-07	2.993	70.000
4.424E-07	3.207	75.000
4.044E-07	3.421	80.000
3.573E-07	3.634	85.000
1.637E-06	0.5	11.69

ANNUAL AVERAGE = 1.32E-08

K= 6 FIVEXQ(K)= 1.637E-06 FIVEPR(K)=11.694

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 9.368E-01 7.317E-01 3.613E-01 2.419E-01 2.081E-01
1.693E-02
5.085 8.202 13.506 19.046 66.408 99.289
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	0.44	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.39	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.39	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.30	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
B	1.7	0.09	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	1.292E-06
B	2.2	0.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	0.26	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.48	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.57	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.39	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.22	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
C	2.2	0.09	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.197E-06
C	3.3	0.26	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	1.13	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	1.35	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.65	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07

C	8.7	0.30	3000.	0.	131.	288.5	
166.2	0.0	0.000E+00	0.000E+00	5.598E-07			
D	0.2	0.01	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	0.61	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	1.35	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	2.35	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	8.36	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	12.27	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	9.23	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	5.61	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	4.66	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	0.65	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	0.35	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.02	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	1.13	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	1.52	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	3.92	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	8.09	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	8.92	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	6.61	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			
E	7.0	3.83	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	3.00	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	0.70	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	0.39	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			
F	0.3	0.01	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.813E-06			
F	1.2	0.44	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.024E-06			
F	1.8	0.78	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	6.935E-07			
F	2.4	1.17	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	5.243E-07			
F	3.5	1.87	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	3.528E-07			
F	4.7	1.61	90000.	0.	131.	1000.0	

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.30	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.52	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.35	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NW SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 2.197E-06 1.880E-06 1.696E-06 1.478E-06 1.292E-06
0.005 0.027 0.038 0.647 1.996 2.083 3.215 5.565 5.826 5.913
0.00027 0.00143 0.00204 0.03478 0.10726 0.11193 0.17272 0.29897 0.31300 0.31768

1.273E-06 1.141E-06 1.113E-06 1.024E-06 9.764E-07 9.624E-07 8.923E-07 8.590E-07 7.452E-07 6.935E-07
7.436 15.792 16.923 17.358 17.402 21.319 22.668 34.940 35.593 36.376
0.39951 0.84841 0.90920 0.93258 0.93492 1.14534 1.21782 1.87715 1.91222 1.95430

6.887E-07 6.571E-07 6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07 4.876E-07 4.321E-07 3.966E-07
45.602 45.863 53.957 59.571 59.876 61.051 61.530 70.451 75.107 75.673
2.44996 2.46399 2.89887 3.20047 3.21684 3.27997 3.30568 3.78498 4.03515 4.06554

3.909E-07 3.528E-07 3.479E-07 3.312E-07 3.265E-07 2.656E-07 2.488E-07 2.453E-07 2.130E-07 2.003E-07
82.288 84.159 84.812 85.204 89.033 90.644 90.861 93.864 94.647 94.691
4.42093 4.52146 4.55653 4.57757 4.78332 4.86983 4.88152 5.04284 5.08493 5.08727

1.975E-07 1.902E-07 1.779E-07 1.432E-07 1.415E-07 1.336E-07 1.148E-07 9.605E-08 9.586E-08 8.032E-08
95.387 95.474 95.779 96.214 96.562 96.736 97.128 97.171 97.563 97.955
5.12467 5.12935 5.14572 5.16910 5.18780 5.19715 5.21819 5.22053 5.24158 5.26262

```
   7.201E-08   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08
1.668E-08
      98.259      98.390      98.869      99.391      99.739      99.913
100.000
     5.27898     5.28600     5.31172     5.33977     5.35848     5.36783
5.37251

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.299
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.908
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.896
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.782
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.417
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.780

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  7  1     -11.07050 -16.67436  -1.23190
  7  2     -13.28753 -16.27861  -1.08795
  7  3     -13.70856 -15.87757  -0.91818
  7  4     -13.96752 -17.15929  -1.53432
  7  5     -14.24977 -18.74937  -2.37284
  7  6     -14.53378 -19.95352  -3.05063
  7  7     -14.75472 -22.92312  -4.79317
  7  8     -14.93482     NUMXQ(K)=  8
    3.222E-06              0.054              1.000
    2.160E-06              0.161              3.000
    1.770E-06              0.269              5.000
    1.367E-06              0.537             10.000
    1.168E-06              0.806             15.000
    1.051E-06              1.075             20.000
    9.712E-07              1.343             25.000
    9.090E-07              1.612             30.000
    8.581E-07              1.880             35.000
    7.884E-07              2.149             40.000
    7.305E-07              2.418             45.000
    6.816E-07              2.686             50.000
    6.350E-07              2.955             55.000
```

5.794E-07	3.224	60.000
5.320E-07	3.492	65.000
4.910E-07	3.761	70.000
4.464E-07	4.029	75.000
4.071E-07	4.298	80.000
3.631E-07	4.567	85.000
1.405E-06	0.5	9.31

ANNUAL AVERAGE = 1.25E-08

K= 7 FIVEXQ(K)= 1.405E-06 FIVEPR(K)= 9.307

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.610	3.699	7.485	14.634	60.072	98.216	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.18	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
B	3.3	0.05	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.18	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.23	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.28	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.14	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.05	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
C	3.3	0.18	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.60	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.46	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.55	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07
C	8.7	0.23	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	5.598E-07
C	10.8	0.05	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	4.507E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.60	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	6.18	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	10.79	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.41	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.78	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.46	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.05	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.74	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.55	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.92	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	2.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		

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   G          2.4        0.18    90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   4.918E-08
   G          3.5        0.23    90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   3.310E-08
   G          4.7        0.14    90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   2.491E-08
   G          5.9        0.14    90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.998E-08
   G          7.0        0.05    90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.668E-08
   G          9.3        0.05    90000.         0.        131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.478E-06	1.273E-06	1.141E-06	
0.005	0.019	0.034	0.633	1.648	2.386	4.693	4.877	6.861	13.043	
0.00025	0.00097	0.00170	0.03209	0.08353	0.12094	0.23784	0.24719	0.34773	0.66102	

1.113E-06	1.024E-06	9.624E-07	8.923E-07	8.590E-07	7.452E-07	6.935E-07	6.887E-07	6.571E-07	6.477E-07	
13.642	14.196	17.379	17.840	28.635	29.188	30.111	39.522	39.568	47.687	
0.69142	0.71947	0.88080	0.90418	1.45128	1.47933	1.52610	2.00305	2.00539	2.41689	

5.752E-07	5.598E-07	5.243E-07	4.947E-07	4.876E-07	4.507E-07	4.321E-07	3.966E-07	3.909E-07	3.528E-07	
54.468	54.699	56.268	56.452	67.247	67.293	69.969	70.199	79.195	81.225	
2.76058	2.77227	2.85176	2.86111	3.40821	3.41055	3.54615	3.55785	4.01376	4.11663	

3.479E-07	3.312E-07	3.265E-07	2.656E-07	2.488E-07	2.453E-07	2.130E-07	2.003E-07	1.975E-07	1.779E-07	
81.686	81.963	88.513	89.990	90.128	94.879	97.001	97.048	97.555	98.247	
4.14002	4.15404	4.48604	4.56086	4.56788	4.80869	4.91624	4.91858	4.94430	4.97937	

1.432E-07	1.415E-07	1.336E-07	9.605E-08	8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	
98.432	98.478	98.754	99.077	99.124	99.216	99.400	99.631	99.769	99.908	
4.98872	4.99106	5.00509	5.02145	5.02379	5.02847	5.03782	5.04951	5.05653	5.06354	

```
   1.668E-08   1.253E-08
      99.954     100.000
     5.06588     5.06822

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.660
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.414
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.405
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.010
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.482

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1     -11.07050 -16.78730  -1.25244
  8  2     -13.68351 -16.07250  -0.96400
  8  3     -13.96752 -16.91979  -1.35203
  8  4     -14.24977 -17.97667  -1.88721
  8  5     -14.53378 -19.91889  -2.95183
  8  6     -14.75472 -20.78698  -3.44803
  8  7     -14.93482     NUMXQ(K)=  7
    3.142E-06              0.051              1.000
    2.097E-06              0.152              3.000
    1.714E-06              0.253              5.000
    1.283E-06              0.507             10.000
    1.087E-06              0.760             15.000
    9.813E-07              1.014             20.000
    9.040E-07              1.267             25.000
    8.379E-07              1.520             30.000
    7.706E-07              1.774             35.000
    7.157E-07              2.027             40.000
    6.696E-07              2.281             45.000
    6.235E-07              2.534             50.000
    5.769E-07              2.788             55.000
    5.368E-07              3.041             60.000
    5.019E-07              3.294             65.000
    4.621E-07              3.548             70.000
    4.211E-07              3.801             75.000
    3.846E-07              4.055             80.000
    3.488E-07              4.308             85.000
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    1.290E-06              0.5                 9.87

ANNUAL AVERAGE =   9.80E-09

K=  8     FIVEXQ(K)= 1.290E-06     FIVEPR(K)= 9.865

FUMIGATION X/Q AT THE BOUNDARY:   1.52E-05

 EXPONENTIAL TERM AND FREQUENCIES

   9.914E-01   9.368E-01   7.317E-01   3.613E-01   2.419E-01   2.081E-01
1.693E-02
       0.185       1.107       3.183      12.839      53.116      98.801
100.000
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS

AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.05	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.16	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.09	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.14	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
B	3.3	0.02	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.09	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.40	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.33	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.51	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.14	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
B	26.5	0.02	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	8.148E-08
C	2.2	0.02	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.197E-06
C	3.3	0.26	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.47	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.93	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.86	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07
C	8.7	1.12	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	5.598E-07
C	10.8	0.23	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	4.507E-07

C	26.5	0.02	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.833E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.28	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	0.68	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	0.91	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	3.99	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	7.47	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	7.71	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	6.40	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	8.06	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	2.24	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.93	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.01	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.61	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.03	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	1.40	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	6.14	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	10.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	9.88	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	6.63	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	8.57	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.68	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.21	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.28	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.26	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.77	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.75	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	2.08	90000.	0.	131.	1000.0					

```
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.07    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.93    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.56    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.02    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.19    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.21    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.19    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.51    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.19    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.02    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.02    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 2.197E-06 1.880E-06 1.696E-06 1.478E-06 1.273E-06
0.002 0.014 0.021 0.301 0.979 1.002 1.609 2.520 2.776 3.804
0.00023 0.00140 0.00213 0.03018 0.09799 0.10032 0.16111 0.25230 0.27801 0.38089

1.141E-06 1.113E-06 1.024E-06 9.624E-07 8.923E-07 8.590E-07 7.452E-07 6.935E-07 6.887E-07 6.571E-07
7.796 8.263 8.543 9.944 10.878 18.350 19.214 19.471 27.176 27.199
0.78069 0.82745 0.85551 0.99579 1.08931 1.83748 1.92399 1.94971 2.72126 2.72360

6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07 4.876E-07 4.507E-07 4.321E-07 3.966E-07 3.909E-07
33.340 39.737 40.858 41.628 41.722 51.808 52.042 60.097 60.494 70.371
3.33850 3.97912 4.09135 4.16850 4.17785 5.18788 5.21126 6.01788 6.05763 7.04662

3.528E-07 3.479E-07 3.312E-07 3.265E-07 2.656E-07 2.488E-07 2.453E-07 2.130E-07 2.003E-07 1.975E-07
72.122 74.363 74.690 81.321 83.399 83.913 92.482 93.556 93.696 95.377
7.22197 7.44642 7.47915 8.14316 8.35124 8.40268 9.26074 9.36829 9.38231 9.55065

1.833E-07 1.779E-07 1.432E-07 1.415E-07 1.336E-07 1.148E-07 1.076E-07 9.605E-08 9.586E-08 8.148E-08
95.400 96.334 96.381 97.315 97.875 98.039 98.062 98.249 98.342 98.366
9.55299 9.64651 9.65119 9.74471 9.80082 9.81719 9.81952 9.83823 9.84758 9.84992

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   8.032E-08   7.201E-08   6.505E-08   4.918E-08   3.310E-08   2.491E-08
1.998E-08   1.668E-08   1.253E-08
      98.576      98.716      98.926      99.113      99.626      99.766
99.953      99.977     100.000
     9.87096     9.88499     9.90603     9.92474     9.97617     9.99020
10.00890    10.01124    10.01358

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


         X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.252
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   3.335
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   5.184
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.043
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   8.139

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  9  1     -11.07050 -16.78674  -1.24773
  9  2     -13.28753 -15.95289  -0.95041
  9  3     -13.96752 -16.27662  -1.10538
  9  4     -14.24977 -16.77319  -1.37619
  9  5     -14.53378 -16.85862  -1.42869
  9  6     -14.75472 -18.20545  -2.34327
  9  7     -14.93482     NUMXQ(K)=  7
    2.422E-06              0.100              1.000
    1.606E-06              0.300              3.000
    1.364E-06              0.501              5.000
    1.076E-06              1.001             10.000
    9.277E-07              1.502             15.000
    8.261E-07              2.003             20.000
    7.447E-07              2.503             25.000
    6.823E-07              3.004             30.000
    6.285E-07              3.505             35.000
    5.777E-07              4.005             40.000
    5.353E-07              4.506             45.000
    4.993E-07              5.007             50.000
    4.675E-07              5.507             55.000
    4.394E-07              6.008             60.000
    4.146E-07              6.509             65.000
    3.925E-07              7.010             70.000
```

3.614E-07	7.510	75.000
3.333E-07	8.011	80.000
1.365E-06	0.5	4.99

ANNUAL AVERAGE = 1.65E-08

K= 9 FIVEXQ(K)= 1.365E-06 FIVEPR(K)= 4.993

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.444	1.961	5.884	13.620	52.287	98.529
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.04	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	0.08	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.16	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.12	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.08	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
B	3.3	0.16	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.16	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.36	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.20	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.20	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
B	26.5	0.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	8.148E-08
C	3.3	0.16	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.52	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.56	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.68	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07
C	8.7	0.72	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	5.598E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.39	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.10	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.31	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.84	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.82	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	10.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	5.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.08	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.16	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.76	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.80    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.12    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.32    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.04    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.36    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.76    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.64    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.16    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.20    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NNE SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 1.880E-06 1.696E-06 1.478E-06 1.273E-06 1.141E-06
0.002 0.014 0.027 0.266 0.944 1.583 2.819 2.979 4.575 8.963
0.00012 0.00083 0.00156 0.01559 0.05534 0.09275 0.16523 0.17458 0.26810 0.52528

1.113E-06 1.024E-06 9.624E-07 8.923E-07 8.590E-07 7.452E-07 6.935E-07 6.887E-07 6.571E-07 6.477E-07
9.481 9.960 12.553 13.112 21.210 21.888 22.686 30.386 30.545 38.364
0.55568 0.58373 0.73571 0.76844 1.24306 1.28280 1.32957 1.78081 1.79016 2.24841

5.752E-07 5.598E-07 5.243E-07 4.947E-07 4.876E-07 4.321E-07 3.966E-07 3.909E-07 3.528E-07 3.479E-07
43.630 44.348 45.505 45.665 56.556 60.864 61.223 71.476 75.027 75.864
2.55703 2.59912 2.66692 2.67627 3.31456 3.56706 3.58810 4.18898 4.39706 4.44616

3.312E-07 3.265E-07 2.656E-07 2.488E-07 2.453E-07 2.130E-07 2.003E-07 1.975E-07 1.902E-07 1.779E-07
76.064 83.324 86.197 86.396 92.380 94.215 94.255 95.013 95.053 95.811
4.45785 4.88338 5.05171 5.06340 5.41411 5.52166 5.52400 5.56842 5.57076 5.61518

1.432E-07 1.415E-07 1.336E-07 1.148E-07 1.076E-07 9.605E-08 9.586E-08 8.148E-08 8.032E-08 7.201E-08
95.891 96.130 96.928 97.088 97.207 97.527 97.646 97.686 97.766 97.846
5.61986 5.63388 5.68065 5.69000 5.69701 5.71572 5.72273 5.72507 5.72974 5.73442

6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08
97.886	98.245	99.003	99.641	99.801	100.000
5.73676	5.75780	5.80222	5.83963	5.84898	5.86067

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.525
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.246
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.312
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.186
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.880
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.410
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
10	1	-11.07050	-16.77221	-1.20693
10	2	-13.68351	-15.98984	-0.90121
10	3	-13.96752	-16.62198	-1.18292
10	4	-14.24977	-17.62937	-1.68526
10	5	-14.53378	-18.31553	-2.05881
10	6	-14.75472	-19.02658	-2.46993
10	7	-14.93482	-24.35039	-5.68357
10	8	-15.22084		

NUMXQ(K)= 8

2.614E-06	0.059	1.000
1.762E-06	0.176	3.000
1.447E-06	0.293	5.000
1.102E-06	0.586	10.000
9.664E-07	0.879	15.000
8.766E-07	1.172	20.000
7.962E-07	1.465	25.000
7.304E-07	1.758	30.000
6.778E-07	2.051	35.000
6.288E-07	2.344	40.000
5.776E-07	2.637	45.000
5.347E-07	2.930	50.000
4.980E-07	3.223	55.000
4.615E-07	3.516	60.000
4.281E-07	3.809	65.000
3.989E-07	4.102	70.000

3.697E-07	4.396	75.000
3.427E-07	4.689	80.000
3.091E-07	4.982	85.000
2.638E-07	5.275	90.000
1.165E-06	0.5	8.53

ANNUAL AVERAGE = 9.06E-09

K= 10 FIVEXQ(K)= 1.165E-06 FIVEPR(K)= 8.531

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.479	1.636	4.269	16.648	49.642	97.527
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	0.09	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.14	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	8.7	0.09	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
B	3.3	0.14	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.19	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.28	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.28	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.14	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.05	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
C	3.3	0.33	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.42	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.70	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.52	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07
C	8.7	0.75	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	5.598E-07
C	10.8	0.14	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	4.507E-07
C	26.5	0.09	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.833E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.32	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	6.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	6.67	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.76	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.80	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.96	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	4.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.27	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.70	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.27	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	4.65	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	4.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	3.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.46	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.08     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.28     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.03     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.69     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.75     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.478E-06	1.273E-06	1.141E-06
0.003	0.019	0.037	0.460	1.540	2.339	3.654	3.983	5.956	10.560
0.00017	0.00094	0.00185	0.02289	0.07667	0.11641	0.18188	0.19824	0.29644	0.52557

1.113E-06	1.024E-06	9.624E-07	8.923E-07	8.590E-07	7.452E-07	6.935E-07	6.887E-07	6.571E-07	6.477E-07
10.982	11.687	14.646	15.351	21.364	21.881	22.679	29.350	29.490	37.194
0.54661	0.58168	0.72898	0.76405	1.06332	1.08903	1.12878	1.46078	1.46779	1.85123

5.752E-07	5.598E-07	5.243E-07	4.947E-07	4.876E-07	4.507E-07	4.321E-07	3.966E-07	3.909E-07	3.528E-07
40.952	41.704	42.972	43.160	52.132	52.273	56.548	56.830	64.581	69.231
2.03828	2.07568	2.13881	2.14816	2.59473	2.60174	2.81450	2.82853	3.21431	3.44577

3.479E-07	3.312E-07	3.265E-07	2.656E-07	2.488E-07	2.453E-07	2.130E-07	2.003E-07	1.975E-07	1.902E-07
69.936	70.218	74.868	79.801	79.942	87.411	90.511	90.558	91.826	91.920
3.48084	3.49487	3.72633	3.97183	3.97884	4.35059	4.50490	4.50724	4.57036	4.57504

1.833E-07	1.779E-07	1.432E-07	1.415E-07	1.336E-07	1.148E-07	1.076E-07	9.605E-08	8.032E-08	7.201E-08
92.014	93.470	93.564	93.799	94.880	95.021	95.068	95.115	95.209	95.302
4.57972	4.65219	4.65687	4.66856	4.72234	4.72935	4.73169	4.73403	4.73870	4.74338

```
   6.505E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.537      95.819      96.853      98.544      99.295      99.765
100.000
     4.75507     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.525
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.062
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.849
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.592
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.211
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.723

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.07050 -16.89492  -1.25497
 11  2     -13.68351 -16.53038  -1.11252
 11  3     -13.96752 -16.95389  -1.29636
 11  4     -14.24977 -18.43661  -2.00718
 11  5     -14.53378 -19.11206  -2.35455
 11  6     -14.75472 -19.74142  -2.69464
 11  7     -14.93482     NUMXQ(K)=  7
    2.863E-06              0.050              1.000
    1.910E-06              0.149              3.000
    1.561E-06              0.249              5.000
    1.168E-06              0.498             10.000
    9.935E-07              0.747             15.000
    8.830E-07              0.995             20.000
    7.946E-07              1.244             25.000
    7.245E-07              1.493             30.000
    6.688E-07              1.742             35.000
    6.101E-07              1.991             40.000
    5.528E-07              2.240             45.000
    5.054E-07              2.489             50.000
    4.617E-07              2.737             55.000
    4.222E-07              2.986             60.000
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3.879E-07	3.235	65.000
3.546E-07	3.484	70.000
1.166E-06	0.5	10.05

ANNUAL AVERAGE = 7.51E-09

K= 11 FIVEXQ(K)= 1.166E-06 FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.423	1.503	4.463	22.519	51.600	95.256
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	5.4	0.14	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00
0.000E+00	1.148E-07								
A	6.5	0.28	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00
0.000E+00	9.586E-08								
A	8.7	0.05	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00
0.000E+00	7.201E-08								
A	10.8	0.09	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00
0.000E+00	5.798E-08								
A	26.5	0.05	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00
0.000E+00	2.358E-08								
B	3.3	0.05	3000.	0.	131.	379.9	363.6	0.0	0.000E+00
0.000E+00	6.571E-07								
B	4.4	0.09	3000.	0.	131.	379.9	363.6	0.0	0.000E+00
0.000E+00	4.947E-07								
B	5.4	0.24	3000.	0.	131.	379.9	363.6	0.0	0.000E+00
0.000E+00	3.966E-07								
B	6.5	0.33	3000.	0.	131.	379.9	363.6	0.0	0.000E+00
0.000E+00	3.312E-07								
B	8.7	0.61	3000.	0.	131.	379.9	363.6	0.0	0.000E+00
0.000E+00	2.488E-07								
B	10.8	0.09	3000.	0.	131.	379.9	363.6	0.0	0.000E+00
0.000E+00	2.003E-07								
B	26.5	0.05	3000.	0.	131.	379.9	363.6	0.0	0.000E+00
0.000E+00	8.148E-08								
C	3.3	0.14	3000.	0.	131.	288.5	166.2	0.0	0.000E+00
0.000E+00	1.478E-06								
C	4.4	0.19	3000.	0.	131.	288.5	166.2	0.0	0.000E+00
0.000E+00	1.113E-06								
C	5.4	0.66	3000.	0.	131.	288.5	166.2	0.0	0.000E+00
0.000E+00	8.923E-07								
C	6.5	0.71	3000.	0.	131.	288.5	166.2	0.0	0.000E+00
0.000E+00	7.452E-07								
C	8.7	1.13	3000.	0.	131.	288.5	166.2	0.0	0.000E+00
0.000E+00	5.598E-07								
C	10.8	0.14	3000.	0.	131.	288.5	166.2	0.0	0.000E+00
0.000E+00	4.507E-07								

```
   C        26.5       0.09     3000.        0.        131.       288.5
166.2      0.0      0.000E+00   0.000E+00   1.833E-07

   D         0.2       0.00     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.556E-05
   D         1.1       0.28     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   3.312E-06
   D         1.7       0.42     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   2.243E-06
   D         2.2       1.13     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.696E-06
   D         3.3       4.24     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.141E-06
   D         4.4       3.77     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   8.590E-07
   D         5.4       4.19     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   6.887E-07
   D         6.5       4.85     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   5.752E-07
   D         8.7       6.54     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   4.321E-07
   D        10.8       0.94     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   3.479E-07
   D        26.5       0.56     4000.        0.        131.       263.4
78.0      0.0      0.000E+00   0.000E+00   1.415E-07

   E         0.3       0.02     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   8.835E-06
   E         1.2       0.89     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.880E-06
   E         1.8       1.65     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.273E-06
   E         2.4       1.69     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   9.624E-07
   E         3.5       5.22     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   6.477E-07
   E         4.7       5.46     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   4.876E-07
   E         5.9       7.01     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   3.909E-07
   E         7.0       7.39     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   3.265E-07
   E         9.3       8.33     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   2.453E-07
   E        11.6       1.79     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   1.975E-07
   E        28.5       0.09     9000.        0.        131.       389.6
74.2      0.0      0.000E+00   0.000E+00   8.032E-08

   F         0.3       0.02    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.813E-06
   F         1.2       0.71    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.024E-06
   F         1.8       0.85    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       1.69    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       3.01    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       3.62    90000.        0.        131.      1000.0
```

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	4.00	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.68	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.77	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.47	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.89	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.18	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	1.88	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.66	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
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THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.478E-06	1.273E-06	1.141E-06
0.002	0.019	0.038	0.320	0.744	1.638	2.768	2.909	4.556	8.792
0.00012	0.00097	0.00188	0.01591	0.03695	0.08137	0.13749	0.14450	0.22633	0.43675

1.113E-06	1.024E-06	9.624E-07	8.923E-07	8.590E-07	7.452E-07	6.935E-07	6.887E-07	6.571E-07	6.477E-07
8.980	9.686	11.380	12.039	15.804	16.510	17.357	21.546	21.593	26.817
0.44611	0.48118	0.56535	0.59808	0.78512	0.82019	0.86228	1.07036	1.07270	1.33222

5.752E-07	5.598E-07	5.243E-07	4.947E-07	4.876E-07	4.507E-07	4.321E-07	3.966E-07	3.909E-07	3.528E-07
31.664	32.794	34.488	34.582	40.042	40.183	46.725	46.960	53.972	56.984
1.57304	1.62915	1.71332	1.71800	1.98921	1.99622	2.32121	2.33290	2.68127	2.83090

3.479E-07	3.312E-07	3.265E-07	2.656E-07	2.488E-07	2.453E-07	2.130E-07	2.003E-07	1.975E-07	1.833E-07
57.926	58.255	65.644	69.268	69.880	78.210	82.210	82.304	84.093	84.187
2.87766	2.89403	3.26110	3.44113	3.47152	3.88535	4.08409	4.08876	4.17761	4.18228

1.779E-07	1.415E-07	1.336E-07	1.148E-07	1.076E-07	9.605E-08	9.586E-08	8.148E-08	8.032E-08	7.201E-08
86.869	87.434	91.199	91.340	92.329	92.799	93.082	93.129	93.223	93.270
4.31555	4.34361	4.53065	4.53766	4.58676	4.61014	4.62417	4.62651	4.63119	4.63352

```
   6.505E-08   5.798E-08   4.918E-08   4.375E-08   3.310E-08   2.491E-08
2.358E-08   1.998E-08   1.668E-08   1.253E-08
      93.646      93.741      94.117      94.164      95.058      96.235
96.282      98.165      99.247      99.906
     4.65223     4.65690     4.67561     4.67795     4.72237     4.78082
4.78316     4.87668     4.93045     4.96319

   1.009E-08
     100.000
     4.96786

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.436
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.784
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.331
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.679
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.258
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.882

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 12  1     -11.07050 -16.94454  -1.24341
 12  2     -13.68351 -17.29123  -1.37560
 12  3     -13.96752 -17.39356  -1.41795
 12  4     -14.24977 -18.15256  -1.76029
 12  5     -14.75472 -18.79103  -2.09106
 12  6     -14.93482 -21.56087  -3.59301
 12  7     -15.22084     NUMXQ(K)=  7
    2.625E-06              0.050              1.000
    1.758E-06              0.149              3.000
    1.439E-06              0.248              5.000
    1.074E-06              0.497             10.000
    8.817E-07              0.745             15.000
    7.593E-07              0.994             20.000
    6.732E-07              1.242             25.000
    5.994E-07              1.490             30.000
    5.378E-07              1.739             35.000
    4.885E-07              1.987             40.000
```

4.481E-07	2.236	45.000
4.142E-07	2.484	50.000
3.843E-07	2.732	55.000
3.549E-07	2.981	60.000
3.295E-07	3.229	65.000
2.943E-07	3.478	70.000
2.629E-07	3.726	75.000
1.071E-06	0.5	10.06

ANNUAL AVERAGE = 6.25E-09

K= 12 FIVEXQ(K)= 1.071E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.612	2.071	5.130	26.515	53.437	92.988
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.03	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.06	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.39	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.42	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
A	10.8	0.30	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	5.798E-08
A	26.5	0.18	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.358E-08
B	2.2	0.03	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	0.09	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.09	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.39	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.30	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.63	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.33	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
B	26.5	0.21	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	8.148E-08
C	3.3	0.06	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.48	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.69	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.33	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07

C	8.7	1.44	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	5.598E-07						
C	10.8	0.87	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	4.507E-07						
C	26.5	0.48	3000.	0.	131.	288.5	166.2	0.0
0.000E+00	0.000E+00	1.833E-07						
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	0.24	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	0.54	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	0.90	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	2.66	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	3.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	4.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	4.25	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	9.30	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	6.31	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	3.71	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.90	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	0.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	1.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	3.05	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	3.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.77	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	6.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	12.47	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.42	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.48	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.66	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.29	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.63	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.83	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.84	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.81	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 1.880E-06 1.696E-06 1.478E-06 1.273E-06 1.141E-06
0.002 0.019 0.030 0.269 0.808 1.705 2.603 2.662 3.380 6.043
0.00015 0.00150 0.00235 0.02106 0.06314 0.13328 0.20342 0.20810 0.26421 0.47230

1.113E-06 1.024E-06 9.764E-07 9.624E-07 8.923E-07 8.590E-07 7.452E-07 6.935E-07 6.887E-07 6.571E-07
6.521 6.940 6.970 8.226 8.914 12.175 12.504 12.982 16.991 17.081
0.50970 0.54244 0.54477 0.64297 0.69675 0.95159 0.97731 1.01472 1.32802 1.33503

6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07 4.876E-07 4.507E-07 4.321E-07 3.966E-07 3.909E-07
20.132 24.379 25.815 26.473 26.563 30.153 31.020 40.323 40.712 46.485
1.57351 1.90551 2.01774 2.06917 2.07619 2.35675 2.42455 3.15168 3.18208 3.63332

3.528E-07 3.479E-07 3.312E-07 3.265E-07 2.656E-07 2.488E-07 2.453E-07 2.130E-07 2.003E-07 1.975E-07
47.772 54.083 54.382 60.754 63.386 64.014 76.488 79.031 79.360 81.992
3.73385 4.22718 4.25056 4.74856 4.95430 5.00340 5.97836 6.17709 6.20281 6.40856

1.833E-07 1.779E-07 1.432E-07 1.415E-07 1.336E-07 1.148E-07 1.076E-07 9.605E-08 9.586E-08 8.148E-08
82.471 85.014 85.043 88.753 92.582 92.641 93.329 93.569 93.958 94.167
6.44597 6.64470 6.64704 6.93696 7.23622 7.24090 7.29467 7.31338 7.34377 7.36014

```
   8.032E-08   7.201E-08   6.505E-08   5.798E-08   4.918E-08   4.375E-08
3.310E-08   2.491E-08   2.358E-08   1.998E-08
      94.466      94.885      95.034      95.334      95.543      95.573
96.321      97.158      97.338      98.145
     7.38352     7.41625     7.42794     7.45132     7.46769     7.47003
7.52848     7.59394     7.60797     7.67110

   1.668E-08   1.253E-08   1.009E-08
      99.252      99.970     100.000
     7.75761     7.81372     7.81606
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

```
 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.203
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.950
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.016
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.149
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.745
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.975

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1     -11.07050 -16.44367  -1.15172
 13  2     -11.63677 -16.93445  -1.26931
 13  3     -13.28753 -16.98908  -1.28832
 13  4     -13.96752 -17.37332  -1.45216
 13  5     -14.39562 -17.17328  -1.35460
 13  6     -14.65458 -17.40776  -1.48071
 13  7     -14.93482 -19.15505  -2.52693
 13  8     -15.22084     NUMXQ(K)=  8
    2.449E-06            0.078             1.000
    1.600E-06            0.234             3.000
    1.289E-06            0.391             5.000
    9.431E-07            0.782            10.000
    7.660E-07            1.172            15.000
    6.507E-07            1.563            20.000
    5.707E-07            1.954            25.000
```

5.141E-07	2.345	30.000
4.701E-07	2.736	35.000
4.342E-07	3.126	40.000
4.017E-07	3.517	45.000
3.740E-07	3.908	50.000
3.502E-07	4.299	55.000
3.294E-07	4.690	60.000
3.007E-07	5.080	65.000
2.743E-07	5.471	70.000
2.515E-07	5.862	75.000
1.157E-06	0.5	6.40

ANNUAL AVERAGE = 1.02E-08

K= 13 FIVEXQ(K)= 1.157E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.376	3.440	7.777	22.895	58.074	95.154	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.08	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.08	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.19	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.13	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
A	10.8	0.05	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	5.798E-08
A	26.5	0.13	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.358E-08
B	3.3	0.03	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.13	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.05	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.21	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.40	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.32	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
B	26.5	0.27	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	8.148E-08
C	3.3	0.05	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.16	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.35	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.56	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07
C	8.7	1.21	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	5.598E-07

C	10.8	0.72	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	4.507E-07		
C	26.5	0.89	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	1.833E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.51	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	1.58	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	4.29	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.26	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	14.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	6.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.46	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.62	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.20	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.11	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	4.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.23	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	11.84	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	3.33	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.32	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.35	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.40	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.05	90000.	0.	131.	1000.0

```
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       1.32     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.99     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       1.48     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       2.79     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.62     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.21     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.16     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.21     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.59     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.70     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.54     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.27     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.86     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
   G       11.6       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.009E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.478E-06	1.273E-06	1.141E-06
0.004	0.013	0.022	0.532	1.042	1.498	2.008	2.062	2.572	4.155
0.00037	0.00113	0.00192	0.04634	0.09076	0.13051	0.17493	0.17961	0.22403	0.36198

1.113E-06	1.024E-06	9.624E-07	8.923E-07	8.590E-07	7.452E-07	6.935E-07	6.887E-07	6.571E-07	6.477E-07
4.316	4.665	5.283	5.632	8.718	9.282	9.684	13.979	14.006	16.206
0.37600	0.40640	0.46017	0.49057	0.75944	0.80854	0.84361	1.21770	1.22003	1.41175

5.752E-07	5.598E-07	5.243E-07	4.947E-07	4.876E-07	4.507E-07	4.321E-07	3.966E-07	3.909E-07	3.528E-07
21.467	22.675	23.158	23.292	26.405	27.130	41.704	41.758	46.079	47.126
1.87001	1.97522	2.01730	2.02899	2.30021	2.36333	3.63288	3.63756	4.01398	4.10517

3.479E-07	3.312E-07	3.265E-07	2.656E-07	2.488E-07	2.453E-07	2.130E-07	2.003E-07	1.975E-07	1.833E-07
57.647	57.862	64.088	65.404	65.806	77.643	79.629	79.951	83.279	84.165
5.02168	5.04038	5.58280	5.69737	5.73244	6.76351	6.93652	6.96458	7.25450	7.33165

1.779E-07	1.432E-07	1.415E-07	1.336E-07	1.148E-07	1.076E-07	9.605E-08	9.586E-08	8.148E-08	8.032E-08
85.641	85.721	91.814	94.605	94.686	95.303	95.518	95.706	95.974	96.296
7.46024	7.46726	7.99799	8.24115	8.24816	8.30194	8.32064	8.33701	8.36039	8.38844

```
   7.201E-08   6.505E-08   5.798E-08   4.918E-08   3.310E-08   2.491E-08
2.358E-08   1.998E-08   1.668E-08   1.253E-08
      96.430      96.591      96.645      96.860      97.450      98.148
98.282      98.819      99.087      99.946
     8.40013     8.41416     8.41884     8.43754     8.48898     8.54977
8.56146     8.60822     8.63160     8.70642

   1.009E-08
     100.000
     8.71109
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

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 CHI/Q =  1.556E-05      DISTANCE =   4000.000
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X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

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 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.046
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.362
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.759
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.868
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   5.579
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   6.760

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1     -11.07050 -16.99068  -1.32021
 14  2     -12.61806 -18.25460  -1.70182
 14  3     -13.68351 -16.64334  -1.10194
 14  4     -13.96752 -16.77832  -1.15753
 14  5     -14.36856 -16.44734  -0.99855
 14  6     -14.65458 -17.11802  -1.37210
 14  7     -14.93482 -19.61697  -2.94265
 14  8     -15.22084     NUMXQ(K)=  8
    2.435E-06              0.087              1.000
    1.369E-06              0.261              3.000
    1.065E-06              0.436              5.000
    8.105E-07              0.871             10.000
    6.786E-07              1.307             15.000
    5.947E-07              1.742             20.000
    5.401E-07              2.178             25.000
    4.999E-07              2.613             30.000
    4.674E-07              3.049             35.000
```

4.404E-07	3.484	40.000
4.119E-07	3.920	45.000
3.850E-07	4.356	50.000
3.617E-07	4.791	55.000
3.414E-07	5.227	60.000
3.198E-07	5.662	65.000
2.867E-07	6.098	70.000
2.585E-07	6.533	75.000
1.011E-06	0.5	5.74

ANNUAL AVERAGE = 1.20E-08

K= 14 FIVEXQ(K)= 1.011E-06 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.671	2.093	6.039	16.516	63.462	96.403
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	6.5	0.06	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.04	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
A	26.5	0.02	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.358E-08
B	2.2	0.02	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	0.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.02	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.02	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.06	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.13	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.11	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
C	3.3	0.06	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.17	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.19	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.38	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07
C	8.7	0.56	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	5.598E-07
C	10.8	0.47	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	4.507E-07
C	26.5	0.26	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.833E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.17	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	5.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	7.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	17.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.45	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	5.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

```
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F         9.3       1.30    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G         1.2       0.15    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.24    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.94    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       1.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.88    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.36    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.11    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 1.880E-06 1.696E-06 1.478E-06 1.273E-06 1.141E-06
0.001 0.011 0.018 0.189 0.787 1.279 2.134 2.198 2.540 5.061
0.00015 0.00118 0.00198 0.02068 0.08615 0.13992 0.23344 0.24046 0.27786 0.55375

1.113E-06 1.024E-06 9.764E-07 9.624E-07 8.923E-07 8.590E-07 7.452E-07 6.935E-07 6.887E-07 6.571E-07
5.232 5.510 5.531 6.172 6.364 10.339 10.724 11.001 16.023 16.066
0.57246 0.60285 0.60519 0.67533 0.69637 1.13125 1.17333 1.20373 1.75316 1.75784

6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07 4.876E-07 4.507E-07 4.321E-07 3.966E-07 3.909E-07
18.459 25.553 26.109 26.493 26.515 29.805 30.275 47.819 47.840 53.289
2.01970 2.79593 2.85671 2.89880 2.90114 3.26119 3.31263 5.23216 5.23449 5.83069

3.528E-07 3.479E-07 3.312E-07 3.265E-07 2.656E-07 2.488E-07 2.453E-07 2.130E-07 2.003E-07 1.975E-07
54.571 65.020 65.084 71.003 72.478 72.606 83.140 85.000 85.106 87.265
5.97097 7.11427 7.12129 7.76892 7.93025 7.94427 9.09692 9.30033 9.31202 9.54816

1.833E-07 1.779E-07 1.415E-07 1.336E-07 9.605E-08 9.586E-08 8.032E-08 7.201E-08 6.505E-08 4.918E-08
87.521 88.953 94.423 95.726 95.876 95.940 96.154 96.196 96.325 96.560
9.57622 9.73287 10.33141 10.47402 10.49039 10.49741 10.52079 10.52546 10.53949 10.56521

3.310E-08	2.491E-08	2.358E-08	1.998E-08	1.668E-08	1.253E-08
97.500	98.632	98.654	99.530	99.893	100.000
10.66808	10.79200	10.79434	10.89020	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.233
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.130
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.793
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.765
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   9.093
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.07050	-16.70421	-1.20757
15	2	-13.28753	-16.79045	-1.23805
15	3	-13.96752	-16.45202	-1.08962
15	4	-14.36856	-16.26095	-0.98969
15	5	-14.65458	-16.90582	-1.38700
15	6	-14.93482	-19.65948	-3.32477
15	7	-15.22084	NUMXQ(K)=	7

2.250E-06	0.109	1.000
1.478E-06	0.328	3.000
1.192E-06	0.547	5.000
8.726E-07	1.094	10.000
7.331E-07	1.641	15.000
6.447E-07	2.188	20.000
5.812E-07	2.735	25.000
5.362E-07	3.282	30.000
5.003E-07	3.830	35.000
4.704E-07	4.377	40.000
4.449E-07	4.924	45.000
4.192E-07	5.471	50.000
3.924E-07	6.018	55.000
3.690E-07	6.565	60.000
3.484E-07	7.112	65.000
3.300E-07	7.659	70.000
2.960E-07	8.206	75.000
2.633E-07	8.753	80.000

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    1.239E-06              0.5                 4.57

ANNUAL AVERAGE =   1.58E-08

K= 15     FIVEXQ(K)= 1.239E-06     FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY:   1.52E-05

 EXPONENTIAL TERM AND FREQUENCIES

   9.914E-01   9.368E-01   7.317E-01   3.613E-01   2.419E-01   2.081E-01
1.693E-02
       0.128       0.534       2.628      10.926      64.626      96.068
100.000
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.02	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	5.4	0.11	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.09	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.30	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
A	10.8	0.02	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	5.798E-08
A	26.5	0.02	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.358E-08
B	3.3	0.06	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.15	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.26	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.32	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.43	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.13	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
C	2.2	0.02	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	2.197E-06
C	3.3	0.35	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.478E-06
C	4.4	0.76	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.113E-06
C	5.4	0.97	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	8.923E-07
C	6.5	0.93	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	7.452E-07
C	8.7	1.60	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	5.598E-07

AT 131.4 METERS
CA=1292.SQ.METERS

C	10.8	0.30	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	4.507E-07
C	26.5	0.09	3000.	0.	131.	288.5	166.2	0.0	0.000E+00	0.000E+00	1.833E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.22	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	0.86	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	1.08	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	4.99	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	8.43	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	9.47	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	8.78	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	15.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	4.97	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	2.03	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.00	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.24	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	0.50	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	0.78	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	2.49	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	4.32	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	4.60	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	5.97	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	7.26	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.04	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.00	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.15	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.32	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.43	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.28	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.41	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.22	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.73	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.63	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 3000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	2.197E-06	1.880E-06	1.696E-06	1.478E-06	1.273E-06		
0.002	0.006	0.010	0.226	1.091	1.113	1.350	2.431	2.777	3.274		
0.00019	0.00069	0.00111	0.02449	0.11801	0.12035	0.14607	0.26297	0.30038	0.35415		
1.141E-06	1.113E-06	1.024E-06	9.624E-07	8.923E-07	8.590E-07	7.452E-07	6.935E-07	6.887E-07	6.571E-07		
8.267	9.024	9.175	9.953	10.926	19.355	20.285	20.609	30.076	30.141		
0.89424	0.97607	0.99244	1.07661	1.18182	2.09365	2.19419	2.22926	3.25332	3.26033		
6.477E-07	5.752E-07	5.598E-07	5.243E-07	4.947E-07	4.876E-07	4.507E-07	4.321E-07	3.966E-07	3.909E-07		
32.627	41.402	43.002	43.434	43.586	47.909	48.211	63.212	63.471	68.075		
3.52920	4.47844	4.65146	4.69822	4.71459	5.18219	5.21492	6.83752	6.86558	7.36358		
3.528E-07	3.479E-07	3.312E-07	3.265E-07	2.656E-07	2.488E-07	2.453E-07	2.130E-07	2.003E-07	1.975E-07		
69.350	74.322	74.646	80.612	81.757	82.189	89.452	90.684	90.814	91.851		
7.50152	8.03927	8.07434	8.71964	8.84355	8.89031	9.67589	9.80916	9.82319	9.93541		
1.902E-07	1.833E-07	1.779E-07	1.415E-07	1.336E-07	1.148E-07	1.076E-07	9.605E-08	9.586E-08	8.032E-08		
91.873	91.959	92.975	95.007	95.418	95.526	95.634	95.850	95.936	96.239		
9.93775	9.94710	10.05699	10.27677	10.32119	10.33288	10.34457	10.36795	10.37730	10.41003		

7.201E-08 6.505E-08 5.798E-08 4.918E-08 3.310E-08 2.491E-08
2.358E-08 1.998E-08 1.668E-08 1.253E-08
96.542 96.736 96.758 97.017 97.752 99.092
99.114 99.741 99.914 100.000
10.44277 10.46381 10.46615 10.49420 10.57370 10.71865
10.72099 10.78879 10.80750 10.81685

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.263 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 3.250 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 4.475 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 6.834 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 8.716 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= 9.673 HANDCHECK

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
16	1	-11.07050	-16.67221	-1.21269
16	2	-13.28753	-15.79848	-0.89964
16	3	-13.96752	-16.33405	-1.16279
16	4	-14.18845	-16.44674	-1.22386
16	5	-14.36856	-16.68397	-1.36357
16	6	-14.65458	-17.86673	-2.15828
16	7	-14.93482	-21.63194	-4.92998
16	8	-15.22084	NUMXQ(K)= 8	

2.370E-06	0.108	1.000
1.594E-06	0.325	3.000
1.364E-06	0.541	5.000
1.087E-06	1.082	10.000
9.433E-07	1.623	15.000
8.454E-07	2.163	20.000
7.571E-07	2.704	25.000
6.896E-07	3.245	30.000
6.331E-07	3.786	35.000
5.868E-07	4.327	40.000
5.448E-07	4.868	45.000
5.079E-07	5.408	50.000
4.761E-07	5.949	55.000

4.483E-07	6.490	60.000
4.188E-07	7.031	65.000
3.849E-07	7.572	70.000
3.554E-07	8.113	75.000
3.295E-07	8.653	80.000
2.825E-07	9.194	85.000
1.398E-06	0.5	4.62

ANNUAL AVERAGE = 2.17E-08

K= 16 FIVEXQ(K)= 1.398E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.562	1.924	6.938	13.038	68.870	96.369
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.01	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	3.738E-07
A	2.2	0.09	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.826E-07
A	3.3	0.31	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.902E-07
A	4.4	0.33	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.432E-07
A	5.4	0.22	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	1.148E-07
A	6.5	0.18	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	9.586E-08
A	8.7	0.20	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	7.201E-08
A	10.8	0.05	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	5.798E-08
A	26.5	0.04	3000.	0.	131.	505.2	1000.0	0.0	0.000E+00	0.000E+00	2.358E-08
B	1.1	0.00	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	1.907E-06
B	1.7	0.04	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	1.292E-06
B	2.2	0.12	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	9.764E-07
B	3.3	0.29	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	6.571E-07
B	4.4	0.26	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	4.947E-07
B	5.4	0.26	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.966E-07
B	6.5	0.22	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	3.312E-07
B	8.7	0.30	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.488E-07
B	10.8	0.12	3000.	0.	131.	379.9	363.6	0.0	0.000E+00	0.000E+00	2.003E-07
B	26.5	0.05	3000.	0.	131.	379.9					

363.6	0.0	0.000E+00	0.000E+00	8.148E-08		
C	1.1	0.01	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	4.291E-06		
C	1.7	0.07	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	2.906E-06		
C	2.2	0.21	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	2.197E-06		
C	3.3	0.42	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	1.478E-06		
C	4.4	0.56	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	1.113E-06		
C	5.4	0.63	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	8.923E-07		
C	6.5	0.52	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	7.452E-07		
C	8.7	0.79	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	5.598E-07		
C	10.8	0.27	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	4.507E-07		
C	26.5	0.17	3000.	0.	131.	288.5
166.2	0.0	0.000E+00	0.000E+00	1.833E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.50	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.03	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	5.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	7.33	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.11	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	9.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	3.90	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	1.98	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.73	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.24	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.35	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		

E	7.0	5.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	6.91	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	1.44	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.45	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.56	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.84	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	5.243E-07						
F	3.5	1.79	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	3.528E-07						
F	4.7	1.87	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	2.656E-07						
F	5.9	1.57	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	2.130E-07						
F	7.0	1.04	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.779E-07						
F	9.3	1.10	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.336E-07						
F	11.6	0.18	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.076E-07						
F	28.5	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.375E-08						
G	1.2	0.25	90000.	0.	131.	1000.0	46.0	0.0
0.000E+00	0.000E+00	9.605E-08						
G	1.8	0.19	90000.	0.	131.	1000.0	46.0	0.0
0.000E+00	0.000E+00	6.505E-08						
G	2.4	0.26	90000.	0.	131.	1000.0	46.0	0.0
0.000E+00	0.000E+00	4.918E-08						
G	3.5	0.72	90000.	0.	131.	1000.0	46.0	0.0
0.000E+00	0.000E+00	3.310E-08						
G	4.7	0.69	90000.	0.	131.	1000.0	46.0	0.0
0.000E+00	0.000E+00	2.491E-08						
G	5.9	0.48	90000.	0.	131.	1000.0	46.0	0.0
0.000E+00	0.000E+00	1.998E-08						
G	7.0	0.27	90000.	0.	131.	1000.0	46.0	0.0
0.000E+00	0.000E+00	1.668E-08						
G	9.3	0.20	90000.	0.	131.	1000.0	46.0	0.0
0.000E+00	0.000E+00	1.253E-08						
G	11.6	0.01	90000.	0.	131.	1000.0	46.0	0.0
0.000E+00	0.000E+00	1.009E-08						

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 3000.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.291E-06 3.312E-06 2.906E-06 2.243E-06 2.197E-06 1.907E-06 1.880E-06
0.005 0.019 0.030 0.042 0.610 0.676 2.179 2.389 2.394 3.126
0.00468 0.01870 0.03039 0.04208 0.61023 0.67569 2.17905 2.38947 2.39415 3.12595

1.696E-06 1.478E-06 1.292E-06 1.273E-06 1.141E-06 1.113E-06 1.024E-06 9.764E-07 9.624E-07 8.923E-07
5.158 5.576 5.618 6.857 12.282 12.838 13.287 13.404 15.288 15.915
5.15770 5.57621 5.61829 6.85745 12.28169 12.83814 13.28704 13.40394 15.28840 15.91499

8.590E-07 7.452E-07 6.935E-07 6.887E-07 6.571E-07 6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07
23.240 23.764 24.327 31.409 31.701 36.953 43.060 43.850 44.687 44.951
23.24005 23.76377 24.32723 31.40913 31.70139 36.95261 43.05955 43.84980 44.68682 44.95102

4.876E-07 4.507E-07 4.321E-07 3.966E-07 3.909E-07 3.738E-07 3.528E-07 3.479E-07 3.312E-07 3.265E-07
51.469 51.743 60.826 61.083 67.431 67.438 69.227 73.127 73.344 78.520
51.46946 51.74300 60.82626 61.08345 67.43121 67.43822 69.22681 73.12665 73.34409 78.52049

2.826E-07 2.656E-07 2.488E-07 2.453E-07 2.130E-07 2.003E-07 1.975E-07 1.902E-07 1.833E-07 1.779E-07
78.614 80.487 80.784 87.695 89.261 89.381 90.821 91.134 91.307 92.345
78.61401 80.48678 80.78371 87.69493 89.26141 89.38065 90.82088 91.13418 91.30719 92.34528

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   1.432E-07   1.415E-07   1.336E-07   1.148E-07   1.076E-07   9.605E-08
9.586E-08   8.148E-08   8.032E-08   7.201E-08
      92.673      94.648      95.752      95.969      96.149      96.397
96.575      96.624      96.883      97.080
    92.67260    94.64824    95.75179    95.96923    96.14927    96.39710
96.57479    96.62389    96.88341    97.07980

   6.505E-08   5.798E-08   4.918E-08   4.375E-08   3.310E-08   2.491E-08
2.358E-08   1.998E-08   1.668E-08   1.253E-08
      97.267      97.314      97.575      97.592      98.310      99.002
99.039      99.518      99.785      99.988
    97.26685    97.31361    97.57546    97.59183    98.30960    99.00166
99.03906    99.51836    99.78489    99.98830

   1.009E-08
    100.000
    99.99998

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   2.387
    3.126E-06              1.000              1.000
    2.042E-06              3.000              3.000
    1.715E-06              5.000              5.000
    1.263E-06             10.000             10.000
    1.051E-06             15.000             15.000
    9.241E-07             20.000             20.000
    8.252E-07             25.000             25.000
    7.419E-07             30.000             30.000
    6.722E-07             35.000             35.000
    6.153E-07             40.000             40.000
    5.668E-07             45.000             45.000
    5.228E-07             50.000             50.000
    4.823E-07             55.000             55.000
    4.442E-07             60.000             60.000
    4.081E-07             65.000             65.000
    3.761E-07             70.000             70.000
    3.472E-07             75.000             75.000
    3.137E-07             80.000             80.000
    2.698E-07             85.000             85.000

    1.715E-06              5.0                5.00
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K= 17 FIVEXQ(K)= 1.715E-06 FIVEPR(K)= 5.000

FUMIGATION X/Q AT THE BOUNDARY: 1.52E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.368E-01	7.317E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.417	3.077	6.727	16.153	61.158	96.932
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 4.291E-06 3.312E-06 2.906E-06 2.243E-06 2.197E-06 1.907E-06 1.880E-06
0.005 0.019 0.030 0.042 0.610 0.676 2.179 2.389 2.394 3.126
0.00468 0.01870 0.03039 0.04208 0.61023 0.67569 2.17905 2.38947 2.39415 3.12595

1.696E-06 1.478E-06 1.292E-06 1.273E-06 1.141E-06 1.113E-06 1.024E-06 9.764E-07 9.624E-07 8.923E-07
5.158 5.576 5.618 6.857 12.282 12.838 13.287 13.404 15.288 15.915
5.15770 5.57621 5.61829 6.85745 12.28168 12.83814 13.28704 13.40394 15.28839 15.91499

8.590E-07 7.452E-07 6.935E-07 6.887E-07 6.571E-07 6.477E-07 5.752E-07 5.598E-07 5.243E-07 4.947E-07
23.240 23.764 24.327 31.409 31.701 36.953 43.060 43.850 44.687 44.951
23.24004 23.76376 24.32722 31.40913 31.70138 36.95261 43.05955 43.84981 44.68682 44.95103

4.876E-07 4.507E-07 4.321E-07 3.966E-07 3.909E-07 3.738E-07 3.528E-07 3.479E-07 3.312E-07 3.265E-07
51.469 51.743 60.826 61.083 67.431 67.438 69.227 73.127 73.344 78.521
51.46947 51.74302 60.82627 61.08347 67.43123 67.43824 69.22685 73.12670 73.34413 78.52055

2.826E-07 2.656E-07 2.488E-07 2.453E-07 2.130E-07 2.003E-07 1.975E-07 1.902E-07 1.833E-07 1.779E-07
78.614 80.487 80.784 87.695 89.261 89.381 90.821 91.134 91.307 92.345
78.61407 80.48684 80.78376 87.69500 89.26148 89.38070 90.82094 91.13423 91.30724 92.34532

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   1.432E-07   1.415E-07   1.336E-07   1.148E-07   1.076E-07   9.605E-08
9.586E-08   8.148E-08   8.032E-08   7.201E-08
      92.673      94.648      95.752      95.969      96.149      96.397
96.575      96.624      96.883      97.080
    92.67264    94.64827    95.75182    95.96926    96.14927    96.39712
96.57481    96.62389    96.88341    97.07980

   6.505E-08   5.798E-08   4.918E-08   4.375E-08   3.310E-08   2.491E-08
2.358E-08   1.998E-08   1.668E-08   1.253E-08
      97.267      97.314      97.575      97.592      98.310      99.002
99.039      99.518      99.785      99.988
    97.26683    97.31358    97.57545    97.59180    98.30959    99.00164
99.03903    99.51832    99.78486    99.98825

   1.009E-08
     100.000
    99.99994

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   2.387

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1     -11.07050 -15.03996  -1.01602
 18  2     -13.02857 -14.49511  -0.74080
 18  3     -13.28753 -14.66387  -0.84433
 18  4     -13.68351 -14.44969  -0.65986
 18  5     -13.96752 -14.48567  -0.70911
 18  6     -14.24977 -14.46401  -0.64399
 18  7     -14.75472 -14.51436  -0.53244
 18  8     -14.93482 -14.32484  -0.77244
 18  9     -15.22084     NUMXQ(K)=  9
    3.126E-06              1.000              1.000
    2.042E-06              3.000              3.000
    1.715E-06              5.000              5.000
    1.263E-06             10.000             10.000
    1.051E-06             15.000             15.000
    9.241E-07             20.000             20.000
    8.252E-07             25.000             25.000
    7.419E-07             30.000             30.000
    6.722E-07             35.000             35.000
    6.153E-07             40.000             40.000
    5.668E-07             45.000             45.000
```

5.228E-07	50.000	50.000
4.823E-07	55.000	55.000
4.442E-07	60.000	60.000
4.081E-07	65.000	65.000
3.761E-07	70.000	70.000
3.472E-07	75.000	75.000
3.137E-07	80.000	80.000
2.698E-07	85.000	85.000
1.715E-06	5.0	5.00

K= 18 FIVEXQ(K)= 1.715E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-2.80493	0.25164	6.22377
2	-1.81713	3.45982	3.53187
3	-2.65463	0.39698	3.10925
4	-2.60172	0.46380	3.53945
5	-2.57624	0.49942	4.77421
6	-2.71751	0.32888	4.27580
7	-2.86175	0.21066	5.37250
8	-2.90499	0.18364	5.06821
9	-2.91549	0.17757	10.01358
10	-3.00202	0.13410	5.86067
11	-2.98488	0.14185	4.97718
12	-3.05254	0.11346	4.96786
13	-2.98231	0.14305	7.81606
14	-3.00010	0.13495	8.71109
15	-2.94413	0.16194	10.94163
16	-2.90532	0.18345	10.81685

K	HOURS(K)	TOTHRS
1	22.04409	22.04409
2	303.08050	325.12460
3	34.77535	359.90000
4	40.62850	400.52850
5	43.74879	444.27730
6	28.80993	473.08720
7	18.45388	491.54110
8	16.08703	507.62810
9	15.55497	523.18310
10	11.74755	534.93070
11	12.42633	547.35700
12	9.93939	557.29640
13	12.53128	569.82760
14	11.82170	581.64940
15	14.18593	595.83530
16	16.07032	611.90560

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.491E-06	1.432E-08	-0.5540	-13.0322			
					1	8.0	-14.18426
					2	16.0	-14.56829
					3	72.0	-15.40159
					4	624.0	-16.59801
2	1.369E-06	1.035E-08	-0.5825	-13.0979			
					1	8.0	-14.30915
					2	16.0	-14.71290
					3	72.0	-15.58900
					4	624.0	-16.84686

3	1.742E-06	1.138E-08	-0.6000	-12.8447			
					1	8.0	-14.09235
					2	16.0	-14.50824
					3	72.0	-15.41069
					4	624.0	-16.70638
4	1.884E-06	1.396E-08	-0.5850	-12.7765			
					1	8.0	-13.99291
					2	16.0	-14.39837
					3	72.0	-15.27819
					4	624.0	-16.54140
5	1.947E-06	1.653E-08	-0.5688	-12.7547			
					1	8.0	-13.93744
					2	16.0	-14.33167
					3	72.0	-15.18712
					4	624.0	-16.41534
6	1.637E-06	1.322E-08	-0.5747	-12.9242			
					1	8.0	-14.11925
					2	16.0	-14.51760
					3	72.0	-15.38198
					4	624.0	-16.62301
7	1.405E-06	1.252E-08	-0.5629	-13.0856			
					1	8.0	-14.25614
					2	16.0	-14.64632
					3	72.0	-15.49298
					4	624.0	-16.70856
8	1.290E-06	9.803E-09	-0.5820	-13.1573			
					1	8.0	-14.36751
					2	16.0	-14.77090
					3	72.0	-15.64624
					4	624.0	-16.90301
9	1.365E-06	1.653E-08	-0.5264	-13.1396			
					1	8.0	-14.23417
					2	16.0	-14.59904
					3	72.0	-15.39078
					4	624.0	-16.52753
10	1.165E-06	9.059E-09	-0.5792	-13.2614			
					1	8.0	-14.46581
					2	16.0	-14.86728
					3	72.0	-15.73844
					4	624.0	-16.98922
11	1.166E-06	7.507E-09	-0.6017	-13.2447			
					1	8.0	-14.49600
					2	16.0	-14.91309
					3	72.0	-15.81815
					4	624.0	-17.11759
12	1.071E-06	6.246E-09	-0.6135	-13.3221			
					1	8.0	-14.59780
					2	16.0	-15.02303
					3	72.0	-15.94573
					4	624.0	-17.27050
13	1.157E-06	1.021E-08	-0.5640	-13.2791			
					1	8.0	-14.45197
					2	16.0	-14.84292
					3	72.0	-15.69127
					4	624.0	-16.90929
14	1.011E-06	1.201E-08	-0.5287	-13.4380			
					1	8.0	-14.53744
					2	16.0	-14.90393
					3	72.0	-15.69918
					4	624.0	-16.84096

15	1.239E-06	1.579E-08	-0.5203	-13.2403			
					1	8.0	-14.32223
					2	16.0	-14.68287
					3	72.0	-15.46544
					4	624.0	-16.58901
16	1.398E-06	2.170E-08	-0.4967	-13.1365			
					1	8.0	-14.16944
					2	16.0	-14.51375
					3	72.0	-15.26090
					4	624.0	-16.33362
17	1.715E-06	2.170E-08	-0.5211	-12.9151			
					1	8.0	-13.99878
					2	16.0	-14.36000
					3	72.0	-15.14382
					4	624.0	-16.26920
18	1.715E-06	2.170E-08	-0.5211	-12.9151			
					1	8.0	-13.99878
					2	16.0	-14.36000
					3	72.0	-15.14382
					4	624.0	-16.26920

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

0-2 HR X/Q IS DOWNWIND DISTANCE EXCEEDED DOWNWIND

SECTOR	(METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS	1-4 DAYS	4-30 DAYS	ANNUAL AVERAGE	IN SECTOR	SECTOR
S	3000.	1.49E-06	6.92E-07	4.71E-07	2.05E-07	6.19E-08	1.43E-08	22.0	S
SSW	3000.	1.37E-06	6.10E-07	4.08E-07	1.70E-07	4.83E-08	1.04E-08	303.1	SSW
SW	3000.	1.74E-06	7.58E-07	5.00E-07	2.03E-07	5.55E-08	1.14E-08	34.8	SW
WSW	3000.	1.88E-06	8.37E-07	5.58E-07	2.32E-07	6.55E-08	1.40E-08	40.6	WSW
W	3000.	1.95E-06	8.85E-07	5.97E-07	2.54E-07	7.43E-08	1.65E-08	43.7	W
WNW	3000.	1.64E-06	7.38E-07	4.96E-07	2.09E-07	6.04E-08	1.32E-08	28.8	WNW
NW	3000.	1.40E-06	6.44E-07	4.36E-07	1.87E-07	5.54E-08	1.25E-08	18.5	NW
NNW	3000.	1.29E-06	5.76E-07	3.85E-07	1.60E-07	4.56E-08	9.80E-09	16.1	NNW
N	3000.	1.36E-06	6.58E-07	4.57E-07	2.07E-07	6.64E-08	1.65E-08	15.6	N
NNE	3000.	1.16E-06	5.22E-07	3.49E-07	1.46E-07	4.18E-08	9.06E-09	11.7	NNE
NE	3000.	1.17E-06	5.06E-07	3.34E-07	1.35E-07	3.68E-08	7.51E-09	12.4	NE
ENE	3000.	1.07E-06	4.57E-07	2.99E-07	1.19E-07	3.16E-08	6.25E-09	9.9	ENE
E	3000.	1.16E-06	5.29E-07	3.58E-07	1.53E-07	4.53E-08	1.02E-08	12.5	E
ESE	3000.	1.01E-06	4.86E-07	3.37E-07	1.52E-07	4.85E-08	1.20E-08	11.8	ESE
SE	3000.	1.24E-06	6.02E-07	4.20E-07	1.92E-07	6.24E-08	1.58E-08	14.2	SE
SSE	3000.	1.40E-06	7.02E-07	4.97E-07	2.36E-07	8.06E-08	2.17E-08	16.1	SSE
MAX X/Q		1.95E-06							
TOTAL HOURS AROUND SITE:		611.9							
SRP 2.3.4	3000.	1.71E-06	8.33E-07	5.80E-07					

2.65E-07	8.60E-08	2.17E-08		
SITE LIMIT		1.71E-06	8.33E-07	5.80E-07
2.65E-07	8.60E-08	2.17E-08		

THE FIVE-PERCENT-FOR-THE-ENTIRE-SITE X/Q IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

DOWNWIND SECTOR	DISTANCE (METERS)	FUMIGATION X/Q
S	3000.	1.52E-05
SSW	3000.	1.52E-05
SW	3000.	1.52E-05
WSW	3000.	1.52E-05
W	3000.	1.52E-05
WNW	3000.	1.52E-05
NW	3000.	1.52E-05
NNW	3000.	1.52E-05
N	3000.	1.52E-05
NNE	3000.	1.52E-05
NE	3000.	1.52E-05
ENE	3000.	1.52E-05
E	3000.	1.52E-05
ESE	3000.	1.52E-05
SE	3000.	1.52E-05
SSE	3000.	1.52E-05

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY.
CHECK THE REASONABLENESS OF THE ENVELOPES
COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY
FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
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TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.19	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	0.04	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	8.7	0.08	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	10.8	0.04	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	4.471E-08
A	26.5	0.04	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.819E-08
B	2.2	0.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	0.45	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.08	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.11	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.30	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
C	2.2	0.15	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.481E-06
C	3.3	0.68	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.98	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.79	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.30	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	0.53	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07

C	10.8	0.15	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.038E-07
C	26.5	0.04	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.236E-07
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.68	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.54	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.52	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	7.85	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	8.11	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	8.90	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	8.75	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	10.44	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	2.59	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.94	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.79	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.47	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	1.88	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	5.15	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	6.65	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	6.76	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	3.83	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	4.13	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	0.90	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.60	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.38	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.98	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.99	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.33	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.09	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.08	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	28.5	0.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.31	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.64	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	9.3	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.481E-06	1.273E-06	1.141E-06	
0.006	0.021	0.036	0.713	2.253	3.042	5.559	5.709	7.174	15.025	
0.00035	0.00129	0.00226	0.04435	0.14021	0.18930	0.34595	0.35530	0.44649	0.93514	

1.024E-06	9.965E-07	9.624E-07	8.590E-07	7.501E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	5.752E-07	
15.626	16.303	18.181	26.295	27.272	27.647	36.551	41.697	42.486	51.239	
0.97255	1.01463	1.13153	1.63655	1.69734	1.72072	2.27483	2.59514	2.64424	3.18900	

5.669E-07	5.243E-07	5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	3.479E-07	
51.277	52.253	52.554	59.203	69.647	76.408	76.859	77.385	79.376	81.968	
3.19134	3.25213	3.27083	3.68466	4.33464	4.75548	4.78354	4.81627	4.94019	5.10151	

3.265E-07	3.038E-07	2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.130E-07	1.975E-07	1.923E-07	1.779E-07	
85.800	85.950	85.988	88.317	92.449	92.524	93.614	94.515	94.628	95.079	
5.33999	5.34934	5.35168	5.49664	5.75382	5.75850	5.82630	5.88241	5.88943	5.91749	

1.467E-07	1.445E-07	1.415E-07	1.336E-07	1.236E-07	1.163E-07	1.104E-07	9.605E-08	8.032E-08	6.505E-08	
95.267	95.567	96.506	96.581	96.619	96.657	96.694	96.957	97.258	97.408	
5.92918	5.94788	6.00633	6.01101	6.01334	6.01568	6.01802	6.03439	6.05309	6.06244	

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   5.554E-08   4.918E-08   4.471E-08   4.375E-08   3.310E-08   2.491E-08
1.998E-08   1.819E-08   1.253E-08
      97.483      97.633      97.671      97.708      99.023      99.662
99.925      99.962     100.000
     6.06712     6.07647     6.07881     6.08115     6.16298     6.20273
6.21909     6.22143     6.22377

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.934
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.635
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   3.186
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   4.331
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.752
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   5.336
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.750

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  1  1     -11.07050 -16.54988  -1.21878
  1  2     -13.68351 -16.77545  -1.31469
  1  3     -13.96752 -17.00834  -1.42373
  1  4     -14.36856 -18.13924  -2.03367
  1  5     -14.65458 -18.54700  -2.27164
  1  6     -14.75472 -20.09396  -3.19829
  1  7     -14.93482 -27.41120  -7.73445
  1  8     -15.22084     NUMXQ(K)=  8
    3.322E-06             0.062             1.000
    2.226E-06             0.187             3.000
    1.823E-06             0.311             5.000
    1.366E-06             0.622            10.000
    1.142E-06             0.934            15.000
    9.896E-07             1.245            20.000
    8.821E-07             1.556            25.000
    7.961E-07             1.867            30.000
    7.270E-07             2.178            35.000
    6.709E-07             2.490            40.000
    6.240E-07             2.801            45.000
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5.842E-07	3.112	50.000
5.392E-07	3.423	55.000
4.975E-07	3.734	60.000
4.615E-07	4.045	65.000
4.298E-07	4.357	70.000
3.989E-07	4.668	75.000
3.642E-07	4.979	80.000
3.313E-07	5.290	85.000
2.720E-07	5.601	90.000
1.500E-06	0.5	8.03

ANNUAL AVERAGE = 1.63E-08

K= 1 FIVEXQ(K)= 1.500E-06 FIVEPR(K)= 8.034

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.376	1.428	5.034	12.976	65.311	97.183
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					

AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.13	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	2.179E-07
A	3.3	0.40	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	0.20	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.40	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.07	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.26	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	10.8	0.13	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	4.471E-08
B	1.1	0.07	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.107E-06
B	1.7	0.07	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	7.498E-07
B	2.2	0.46	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	0.99	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.73	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.33	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	8.7	0.13	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.20	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
C	1.1	0.13	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	2.892E-06
C	1.7	0.20	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.959E-06
C	2.2	0.46	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.481E-06

C	3.3	0.93	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	9.965E-07						
C	4.4	0.79	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	7.501E-07						
C	5.4	0.40	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	6.014E-07						
C	6.5	0.53	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	5.023E-07						
C	8.7	0.13	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	3.774E-07						
C	10.8	0.07	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	3.038E-07						
C	26.5	0.20	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	1.236E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.19	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	2.65	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	3.51	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	7.88	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	11.58	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	10.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.55	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	7.48	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.85	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.66	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.92	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.85	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	8.67	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.66	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						

```
   F          0.3        0.01     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   4.813E-06
   F          1.2        0.46     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   1.024E-06
   F          1.8        0.79     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   6.935E-07
   F          2.4        0.86     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   5.243E-07
   F          3.5        1.26     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   3.528E-07
   F          4.7        1.26     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   2.656E-07
   F          5.9        0.60     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   2.130E-07
   F          7.0        0.26     90000.         0.         131.       1000.0
92.1       0.0       0.000E+00   0.000E+00   1.779E-07

   G          1.2        0.60     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   9.605E-08
   G          1.8        0.33     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   6.505E-08
   G          2.4        0.60     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   4.918E-08
   G          3.5        0.53     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   3.310E-08
   G          4.7        0.20     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   2.491E-08
   G          5.9        0.26     90000.         0.         131.       1000.0
46.0       0.0       0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.892E-06	2.243E-06	1.959E-06	1.880E-06	1.696E-06	1.481E-06		
0.010	0.029	0.041	1.232	1.365	4.013	4.211	5.204	8.713	9.176		
0.00035	0.00102	0.00144	0.04353	0.04821	0.14173	0.14874	0.18381	0.30773	0.32409		

1.273E-06	1.141E-06	1.107E-06	1.024E-06	9.965E-07	9.624E-07	8.590E-07	7.501E-07	7.498E-07	6.935E-07		
11.096	18.974	19.040	19.503	20.430	23.276	34.861	35.655	35.722	36.516		
0.39190	0.67012	0.67246	0.68883	0.72156	0.82209	1.23125	1.25931	1.26164	1.28970		

6.887E-07	6.477E-07	6.014E-07	5.752E-07	5.669E-07	5.243E-07	5.023E-07	4.876E-07	4.321E-07	3.909E-07		
46.512	52.602	52.999	59.553	60.016	60.877	61.407	70.078	77.559	82.788		
1.64274	1.85784	1.87187	2.10334	2.11970	2.15010	2.16880	2.47508	2.73928	2.92399		

3.815E-07	3.774E-07	3.528E-07	3.479E-07	3.265E-07	3.038E-07	2.872E-07	2.656E-07	2.453E-07	2.303E-07		
83.781	83.914	85.172	87.025	89.011	89.077	89.805	91.063	92.784	93.115		
2.95906	2.96373	3.00815	3.07362	3.14376	3.14610	3.17182	3.21624	3.27703	3.28872		

2.179E-07	2.130E-07	1.975E-07	1.779E-07	1.467E-07	1.445E-07	1.415E-07	1.236E-07	1.163E-07	1.104E-07		
93.248	93.844	94.506	94.770	95.168	95.300	95.962	96.161	96.359	96.558		
3.29340	3.31444	3.33782	3.34717	3.36120	3.36587	3.38925	3.39627	3.40328	3.41030		

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   9.605E-08   8.851E-08   8.032E-08   7.393E-08   6.505E-08   5.554E-08
4.918E-08   4.471E-08   3.310E-08   2.491E-08
      97.153      97.551      97.617      97.683      98.014      98.279
98.875      99.007      99.537      99.735
     3.43134     3.44537     3.44770     3.45004     3.46173     3.47109
3.49213     3.49680     3.51551     3.52252

   1.998E-08
     100.000
     3.53187

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.307
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.230
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.856
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.101
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.473
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.737
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.921
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.956
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   3.071

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1     -11.07050 -16.74668  -1.26255
  2  2     -13.28753 -17.07319  -1.38172
  2  3     -13.96752 -17.85489  -1.72950
  2  4     -14.24977 -19.08775  -2.32096
  2  5     -14.36856 -19.26427  -2.40777
  2  6     -14.53378 -19.96714  -2.76552
  2  7     -14.65458 -21.40618  -3.51463
  2  8     -14.75472 -23.56328  -4.65444
  2  9     -14.77911 -25.16475  -5.50301
  2 10     -14.87137     NUMXQ(K)= 10
   3.840E-06              0.035              1.000
```

2.583E-06	0.106	3.000
2.122E-06	0.177	5.000
1.592E-06	0.353	10.000
1.316E-06	0.530	15.000
1.143E-06	0.706	20.000
1.022E-06	0.883	25.000
9.298E-07	1.060	30.000
8.567E-07	1.236	35.000
7.831E-07	1.413	40.000
7.224E-07	1.589	45.000
6.713E-07	1.766	50.000
6.208E-07	1.943	55.000
5.709E-07	2.119	60.000
5.266E-07	2.296	65.000
4.882E-07	2.472	70.000
4.498E-07	2.649	75.000
4.121E-07	2.825	80.000
3.684E-07	3.002	85.000
1.353E-06	0.5	14.16

ANNUAL AVERAGE = 1.13E-08

K= 2 FIVEXQ(K)= 1.353E-06 FIVEPR(K)=14.157

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.589	4.568	8.407	13.914	67.279	97.484
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	2.2	0.75	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	2.179E-07
A	3.3	0.75	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	0.83	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.75	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.15	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.68	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
B	1.1	0.08	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.107E-06
B	1.7	0.08	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	7.498E-07
B	2.2	0.38	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	0.68	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.83	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.30	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.23	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.08	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	26.5	0.08	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	4.731E-08
C	1.1	0.15	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	2.892E-06
C	1.7	0.75	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.959E-06
C	2.2	0.83	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.481E-06

AT 131.4 METERS
CA=1292.SQ.METERS

C	3.3	1.13	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	9.965E-07						
C	4.4	0.60	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	7.501E-07						
C	5.4	0.23	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	6.014E-07						
C	8.7	0.30	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	3.774E-07						
D	0.2	0.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	2.11	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	6.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	5.87	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	9.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	9.40	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	8.87	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	6.02	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	3.91	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	0.98	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.75	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.58	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.84	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.14	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.19	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.88	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.28	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.45	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.03	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.68	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.35	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.53	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
G	1.2	0.45	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.892E-06 2.243E-06 1.959E-06 1.880E-06 1.696E-06 1.481E-06
0.017 0.039 0.064 2.170 2.320 8.336 9.088 10.216 16.081 16.908
0.00054 0.00121 0.00200 0.06747 0.07214 0.25919 0.28257 0.31764 0.50000 0.52572

1.273E-06 1.141E-06 1.107E-06 1.024E-06 9.965E-07 9.624E-07 8.590E-07 7.501E-07 7.498E-07 6.935E-07
18.487 27.511 27.586 28.564 29.692 32.324 41.723 42.325 42.400 43.077
0.57482 0.85538 0.85772 0.88812 0.92319 1.00502 1.29727 1.31598 1.31832 1.33936

6.887E-07 6.477E-07 6.014E-07 5.752E-07 5.669E-07 5.243E-07 4.876E-07 4.321E-07 3.909E-07 3.815E-07
51.950 58.793 59.018 65.034 65.410 66.463 73.606 77.516 82.705 83.382
1.61525 1.82801 1.83502 2.02206 2.03375 2.06649 2.28860 2.41018 2.57150 2.59254

3.774E-07 3.528E-07 3.479E-07 3.265E-07 2.872E-07 2.656E-07 2.453E-07 2.303E-07 2.179E-07 2.130E-07
83.682 85.036 86.014 87.893 88.721 89.247 90.525 90.826 91.578 92.029
2.60190 2.64398 2.67437 2.73283 2.75854 2.77491 2.81466 2.82401 2.84739 2.86142

1.975E-07 1.923E-07 1.779E-07 1.467E-07 1.445E-07 1.415E-07 1.104E-07 9.605E-08 8.851E-08 8.032E-08
92.255 92.480 92.706 93.458 93.533 94.285 95.112 95.563 96.315 96.767
2.86843 2.87544 2.88246 2.90584 2.90818 2.93156 2.95728 2.97130 2.99468 3.00871

```
   7.393E-08   6.505E-08   5.554E-08   4.918E-08   4.731E-08   3.310E-08
2.491E-08   1.998E-08
      96.917      97.293      97.970      98.346      98.421      99.549
99.925     100.000
     3.01339     3.02508     3.04612     3.05781     3.06015     3.09522
3.10691     3.10925

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.259
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.499
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.296
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.826
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.020
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.286
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.569
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.730
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   2.859

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  3  1     -11.07050 -16.38208  -1.20693
  3  2     -13.00780 -16.57033  -1.27426
  3  3     -13.28753 -18.31044  -1.94971
  3  4     -13.96752 -18.57733  -2.06953
  3  5     -14.24977 -20.24502  -2.86705
  3  6     -14.36856 -20.91538  -3.19411
  3  7     -14.53378 -23.42930  -4.45238
  3  8     -14.75472 -28.10669  -6.85313
  3  9     -14.93482 -55.92992 -21.32915
  3 10     -15.36220     NUMXQ(K)= 10
    4.776E-06              0.031              1.000
    3.282E-06              0.093              3.000
    2.725E-06              0.155              5.000
    2.079E-06              0.311             10.000
    1.748E-06              0.466             15.000
```

1.461E-06	0.622	20.000
1.250E-06	0.777	25.000
1.097E-06	0.933	30.000
9.796E-07	1.088	35.000
8.868E-07	1.244	40.000
8.081E-07	1.399	45.000
7.414E-07	1.555	50.000
6.850E-07	1.710	55.000
6.325E-07	1.866	60.000
5.755E-07	2.021	65.000
5.216E-07	2.176	70.000
4.707E-07	2.332	75.000
4.165E-07	2.487	80.000
3.606E-07	2.643	85.000
2.621E-07	2.798	90.000
1.696E-06	0.5	16.08

ANNUAL AVERAGE = 1.23E-08

K= 3 FIVEXQ(K)= 1.696E-06 FIVEPR(K)=16.081

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 9.658E-01 8.311E-01 3.613E-01 2.419E-01 2.081E-01
1.693E-02
3.910 6.617 10.603 15.892 68.847 97.218
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.66	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	2.179E-07
A	3.3	1.52	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	1.19	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.73	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.86	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.73	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	10.8	0.07	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	4.471E-08
B	1.7	0.59	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	7.498E-07
B	2.2	0.53	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	0.73	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	1.19	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.13	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.07	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.07	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
C	1.1	0.07	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	2.892E-06
C	1.7	0.92	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.959E-06
C	2.2	1.06	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.481E-06
C	3.3	1.12	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07

C	4.4	0.73	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	7.501E-07						
C	5.4	0.53	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	6.014E-07						
C	6.5	0.20	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	5.023E-07						
C	8.7	0.13	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	3.774E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.72	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	6.14	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	6.54	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	11.49	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	12.35	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	8.12	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	3.57	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	2.91	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	0.73	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.13	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.71	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	9.12	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	5.75	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	2.64	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	0.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	0.40	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	1.06	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.66    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.12    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       0.66    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07

   G         1.2       0.40    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.86    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.892E-06	2.243E-06	1.959E-06	1.880E-06	1.696E-06	1.481E-06
0.014	0.039	0.057	1.774	1.840	7.983	8.908	10.229	16.769	17.826
0.00050	0.00140	0.00201	0.06279	0.06513	0.28257	0.31530	0.36206	0.59353	0.63094

1.273E-06	1.141E-06	1.024E-06	9.965E-07	9.624E-07	8.590E-07	7.501E-07	7.498E-07	6.935E-07	6.887E-07
20.534	32.028	32.689	33.811	37.180	49.533	50.260	50.854	51.911	60.036
0.72680	1.13361	1.15699	1.19674	1.31598	1.75319	1.77891	1.79995	1.83736	2.12494

6.477E-07	6.014E-07	5.752E-07	5.669E-07	5.243E-07	5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07
69.152	69.680	73.247	73.776	74.436	74.634	80.381	83.288	85.930	86.657
2.44759	2.46629	2.59255	2.61125	2.63463	2.64164	2.84505	2.94793	3.04145	3.06717

3.774E-07	3.528E-07	3.479E-07	3.265E-07	2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.179E-07	1.975E-07
86.789	87.912	88.638	89.233	90.422	91.082	91.479	91.611	92.271	92.536
3.07184	3.11159	3.13731	3.15835	3.20043	3.22381	3.23784	3.24252	3.26590	3.27525

1.923E-07	1.467E-07	1.445E-07	1.415E-07	1.104E-07	9.605E-08	8.851E-08	8.032E-08	7.393E-08	6.505E-08
92.602	94.121	94.187	94.319	95.508	95.904	96.631	96.697	97.556	97.820
3.27759	3.33136	3.33370	3.33838	3.38046	3.39449	3.42021	3.42255	3.45294	3.46229

5.554E-08	4.918E-08	4.471E-08	3.310E-08	2.491E-08
98.547	98.811	98.877	99.736	100.000
3.48801	3.49736	3.49970	3.53010	3.53945

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.593
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.751
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.445
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.842
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.064
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.134
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
4	1	-11.07050	-16.22292	-1.16651
4	2	-13.28753	-17.47812	-1.66532
4	3	-13.96752	-18.25993	-2.03619
4	4	-14.24977	-22.86157	-4.37271
4	5	-14.53378	-28.66501	-7.41994
4	6	-14.77911	-31.99608	-9.19990
4	7	-14.87137	NUMXQ(K)= 7	

4.680E-06	0.035	1.000
3.244E-06	0.106	3.000
2.705E-06	0.177	5.000
2.085E-06	0.354	10.000
1.775E-06	0.531	15.000
1.527E-06	0.708	20.000
1.334E-06	0.885	25.000
1.191E-06	1.062	30.000
1.080E-06	1.239	35.000
9.900E-07	1.416	40.000
9.160E-07	1.593	45.000
8.524E-07	1.770	50.000
7.874E-07	1.947	55.000
7.317E-07	2.124	60.000
6.833E-07	2.301	65.000
6.332E-07	2.478	70.000
5.562E-07	2.655	75.000

4.920E-07	2.832	80.000
4.064E-07	3.009	85.000
1.818E-06	0.5	14.13

ANNUAL AVERAGE = 1.49E-08

K= 4 FIVEXQ(K)= 1.818E-06 FIVEPR(K)=14.126

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
5.747	9.050	13.806	17.985	71.703	97.952
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.15	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	2.882E-07
A	2.2	0.73	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	2.179E-07
A	3.3	2.89	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	2.11	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.64	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.39	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.10	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
B	1.7	0.24	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	7.498E-07
B	2.2	1.03	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	1.67	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.29	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.24	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.15	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
C	1.7	0.05	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.959E-06
C	2.2	1.52	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.481E-06
C	3.3	0.83	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.49	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.24	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07

C	6.5	0.10	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	5.023E-07						
C	8.7	0.10	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	3.774E-07						
C	10.8	0.05	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	3.038E-07						
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	1.37	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	4.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	6.37	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	11.12	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	10.53	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	6.56	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	5.04	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	4.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	1.18	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	0.88	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.76	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	8.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	6.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	3.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.81	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.91	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.54	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	1.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.54	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.64	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	0.73	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.24	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	28.5	0.20	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.39	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.959E-06	1.880E-06	1.696E-06	1.481E-06	1.273E-06		
0.011	0.034	0.048	1.419	5.680	5.729	6.904	13.270	14.788	16.551		
0.00054	0.00161	0.00228	0.06775	0.27116	0.27350	0.32961	0.63355	0.70603	0.79020		

1.141E-06	1.024E-06	9.965E-07	9.624E-07	8.590E-07	7.501E-07	7.498E-07	6.935E-07	6.887E-07	6.477E-07		
27.668	28.207	29.039	32.223	42.752	43.241	43.486	44.466	51.028	59.255		
1.32093	1.34665	1.38640	1.53837	2.04105	2.06443	2.07612	2.12288	2.43618	2.82897		

6.014E-07	5.752E-07	5.669E-07	5.243E-07	5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07		
59.500	64.544	65.573	66.209	66.307	72.331	76.591	79.921	81.586	81.684		
2.84066	3.08147	3.13057	3.16097	3.16564	3.45322	3.65663	3.81562	3.89511	3.89978		

3.528E-07	3.479E-07	3.265E-07	3.038E-07	2.882E-07	2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.179E-07		
82.419	83.594	85.406	85.455	85.602	85.896	86.582	88.492	88.736	89.471		
3.93486	3.99097	4.07748	4.07981	4.08683	4.10086	4.13359	4.22477	4.23646	4.27153		

2.130E-07	1.975E-07	1.923E-07	1.467E-07	1.415E-07	1.104E-07	9.605E-08	8.851E-08	8.032E-08	7.393E-08		
89.716	90.255	90.401	93.291	94.172	96.278	96.670	97.307	98.335	98.727		
4.28322	4.30894	4.31595	4.45390	4.49598	4.59652	4.61522	4.64562	4.69472	4.71342		

6.505E-08	5.554E-08	4.918E-08	4.375E-08	3.310E-08	2.491E-08
98.972	99.070	99.314	99.510	99.853	100.000
4.72511	4.72979	4.74148	4.75083	4.76719	4.77421

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.633
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.319
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.039
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.826
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.128
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.450
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.892
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   4.074
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
5	1	-11.07050	-16.18526	-1.16221
5	2	-13.28753	-16.90588	-1.45123
5	3	-13.68351	-17.29408	-1.62606
5	4	-13.96752	-18.12729	-2.03334
5	5	-14.24977	-19.94991	-2.98911
5	6	-14.38313	-20.76686	-3.42777
5	7	-14.53378	-22.64153	-4.45871
5	8	-14.77911	-27.71281	-7.33459
5	9	-14.93482		

NUMXQ(K)= 9

4.349E-06	0.048	1.000
2.993E-06	0.143	3.000
2.485E-06	0.239	5.000
1.902E-06	0.477	10.000
1.591E-06	0.716	15.000
1.365E-06	0.955	20.000
1.208E-06	1.194	25.000
1.084E-06	1.432	30.000
9.810E-07	1.671	35.000
8.982E-07	1.910	40.000
8.225E-07	2.148	45.000

7.516E-07	2.387	50.000
6.918E-07	2.626	55.000
6.373E-07	2.865	60.000
5.735E-07	3.103	65.000
5.129E-07	3.342	70.000
4.531E-07	3.581	75.000
3.972E-07	3.819	80.000
3.319E-07	4.058	85.000
1.867E-06	0.5	10.47

ANNUAL AVERAGE = 1.77E-08

K= 5 FIVEXQ(K)= 1.867E-06 FIVEPR(K)=10.473

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
7.003	10.627	14.006	18.036	69.615	98.629
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	2.2	0.16	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	2.179E-07
A	3.3	1.37	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	2.19	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.93	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.16	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.16	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	10.8	0.05	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	4.471E-08
A	26.5	0.05	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.819E-08
B	2.2	0.27	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	1.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	1.15	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.49	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	8.7	0.11	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.05	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
C	2.2	0.93	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.481E-06
C	3.3	2.19	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	1.15	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.60	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07

AT 131.4 METERS
CA=1292.SQ.METERS

C	6.5	0.16	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	0.16	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07
C	10.8	0.11	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.038E-07
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	1.09	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	3.61	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	4.21	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	9.79	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	9.19	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	7.05	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	5.58	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	5.14	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	1.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.38	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.93	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	2.35	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	2.62	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	6.18	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	7.33	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	6.34	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	3.34	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	2.52	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.16	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.60	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.98	90000.	0.	131.	1000.0					

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.53    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       0.98    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F         5.9       0.60    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F         7.0       0.11    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F         9.3       0.05    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G         1.2       0.11    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.16    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.27    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.481E-06	1.273E-06	1.141E-06	
0.009	0.027	0.044	1.138	4.746	5.676	9.886	10.816	13.167	22.955	
0.00038	0.00115	0.00188	0.04864	0.20295	0.24269	0.42272	0.46247	0.56301	0.98151	

1.024E-06	9.965E-07	9.624E-07	8.590E-07	7.501E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	5.752E-07	
23.611	25.798	28.423	37.609	38.758	39.359	46.413	52.592	53.193	58.771	
1.00957	1.10309	1.21532	1.60811	1.65720	1.68292	1.98453	2.24873	2.27445	2.51292	

5.669E-07	5.243E-07	5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	3.479E-07	
59.044	60.029	60.193	67.520	72.660	79.003	80.042	80.206	81.737	83.049	
2.52461	2.56670	2.57371	2.88701	3.10678	3.37800	3.42242	3.42943	3.49490	3.55101	

3.265E-07	3.038E-07	2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.179E-07	2.130E-07	1.975E-07	1.779E-07	
86.385	86.494	87.642	88.626	91.142	91.634	91.798	92.399	93.493	93.602	
3.69363	3.69831	3.74741	3.78949	3.89704	3.91808	3.92510	3.95081	3.99758	4.00225	

1.467E-07	1.445E-07	1.415E-07	1.336E-07	1.163E-07	1.104E-07	9.605E-08	8.851E-08	8.032E-08	7.393E-08	
94.969	95.079	95.462	95.516	95.571	97.758	97.867	98.797	98.961	99.125	
4.06070	4.06538	4.08174	4.08408	4.08642	4.17994	4.18462	4.22436	4.23138	4.23839	

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   6.505E-08   5.554E-08   4.918E-08   4.471E-08   3.310E-08   2.491E-08
1.998E-08   1.819E-08
      99.289      99.453      99.508      99.563      99.836      99.891
99.945     100.000
     4.24541     4.25242     4.25476     4.25710     4.26879     4.27112
4.27346     4.27580

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.422
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.980
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.606
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.246
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.510
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.884
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.375
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.419
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   3.690
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(11)=   3.894

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  6  1     -11.07050 -16.46169  -1.20518
  6  2     -13.28753 -16.76416  -1.32003
  6  3     -13.68351 -17.15474  -1.48739
  6  4     -13.96752 -18.36609  -2.05269
  6  5     -14.24977 -19.30291  -2.51985
  6  6     -14.36856 -19.75180  -2.74909
  6  7     -14.53378 -20.54623  -3.16763
  6  8     -14.75472 -22.32761  -4.14195
  6  9     -14.77911 -22.96915  -4.49397
  6 10     -14.93482 -35.68203 -11.60487
  6 11     -15.22084     NUMXQ(K)= 11
    3.945E-06              0.043              1.000
    2.687E-06              0.128              3.000
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2.220E-06	0.214	5.000
1.687E-06	0.428	10.000
1.400E-06	0.641	15.000
1.221E-06	0.855	20.000
1.088E-06	1.069	25.000
9.806E-07	1.283	30.000
8.963E-07	1.497	35.000
8.164E-07	1.710	40.000
7.399E-07	1.924	45.000
6.765E-07	2.138	50.000
6.176E-07	2.352	55.000
5.613E-07	2.565	60.000
5.104E-07	2.779	65.000
4.637E-07	2.993	70.000
4.209E-07	3.207	75.000
3.819E-07	3.421	80.000
3.375E-07	3.634	85.000
2.624E-07	3.848	90.000
1.572E-06	0.5	11.69

ANNUAL AVERAGE = 1.41E-08

K= 6 FIVEXQ(K)= 1.572E-06 FIVEPR(K)=11.694

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
5.085	8.202	13.506	19.046	66.408	99.289
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS

AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	0.44	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.39	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.39	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.30	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
B	1.7	0.09	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	7.498E-07
B	2.2	0.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	0.26	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.48	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.57	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.39	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.22	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
C	2.2	0.09	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.481E-06
C	3.3	0.26	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	1.13	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	1.35	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.65	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07

C	8.7	0.30	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07
D	0.2	0.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.61	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.35	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.35	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	8.36	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	12.27	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	9.23	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	5.61	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	4.66	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	0.65	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	0.35	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.52	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	3.92	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	8.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	8.92	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	6.61	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	3.83	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	3.00	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	0.70	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.39	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.44	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.78	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	1.17	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.87	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	1.61	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.30	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.52	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.35	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NW SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.481E-06	1.273E-06	1.141E-06	
0.005	0.027	0.038	0.647	1.996	3.128	5.478	5.565	7.088	15.444	
0.00027	0.00143	0.00204	0.03478	0.10726	0.16804	0.29430	0.29897	0.38080	0.82971	
1.024E-06	9.965E-07	9.624E-07	8.590E-07	7.501E-07	7.498E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	
15.879	16.140	20.057	32.329	33.460	33.547	34.331	43.557	51.651	53.000	
0.85309	0.86712	1.07754	1.73686	1.79765	1.80233	1.84441	2.34008	2.77495	2.84743	
5.752E-07	5.669E-07	5.243E-07	5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	
58.614	58.657	59.832	60.485	69.407	74.063	80.678	80.939	81.244	83.115	
3.14904	3.15137	3.21450	3.24957	3.72887	3.97904	4.33442	4.34845	4.36481	4.46535	
3.479E-07	3.265E-07	2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.130E-07	1.975E-07	1.923E-07	1.779E-07	
83.768	87.597	88.076	89.686	92.689	93.255	94.038	94.734	95.126	95.431	
4.50042	4.70616	4.73188	4.81839	4.97971	5.01011	5.05219	5.08960	5.11065	5.12701	
1.467E-07	1.445E-07	1.415E-07	1.336E-07	1.163E-07	1.104E-07	9.605E-08	8.851E-08	8.032E-08	7.393E-08	
95.518	95.735	96.083	96.257	96.301	96.736	96.780	97.171	97.563	97.955	
5.13169	5.14338	5.16208	5.17143	5.17377	5.19715	5.19949	5.22053	5.24157	5.26262	

```
   6.505E-08   5.554E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08
1.668E-08
      98.085      98.390      98.869      99.391      99.739      99.913
100.000
     5.26963     5.28600     5.31172     5.33977     5.35848     5.36783
5.37250
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.829
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.772
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.146
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.726
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.331
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.703
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   4.976
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
7	1	-11.07050	-16.59151	-1.21369
7	2	-13.68351	-16.07825	-0.99947
7	3	-13.96752	-17.00136	-1.43658
7	4	-14.24977	-18.33961	-2.13527
7	5	-14.36856	-18.39629	-2.16574
7	6	-14.53378	-20.16735	-3.15879
7	7	-14.75472	-22.64639	-4.60556
7	8	-14.93482	-32.52711	-10.50659
7	9	-15.22084	NUMXQ(K)=	9

3.298E-06	0.054	1.000
2.224E-06	0.161	3.000
1.828E-06	0.269	5.000
1.378E-06	0.537	10.000
1.156E-06	0.806	15.000
1.036E-06	1.075	20.000
9.513E-07	1.343	25.000
8.852E-07	1.612	30.000
8.200E-07	1.880	35.000
7.575E-07	2.149	40.000

7.054E-07	2.418	45.000
6.610E-07	2.686	50.000
6.108E-07	2.955	55.000
5.624E-07	3.224	60.000
5.202E-07	3.492	65.000
4.816E-07	3.761	70.000
4.355E-07	4.029	75.000
3.959E-07	4.298	80.000
3.489E-07	4.567	85.000
2.848E-07	4.835	90.000
1.420E-06	0.5	9.31

ANNUAL AVERAGE = 1.43E-08

K= 7 FIVEXQ(K)= 1.420E-06 FIVEPR(K)= 9.307

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.610	3.699	7.485	14.634	60.072	98.216
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.18	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
B	3.3	0.05	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.18	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.23	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.28	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.14	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.05	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
C	3.3	0.18	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.60	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.46	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.55	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	0.23	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07
C	10.8	0.05	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.038E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.60	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	1.01	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	2.31	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	6.18	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	10.79	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	9.41	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.78	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	2.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.46	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.05	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.74	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.55	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.92	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	2.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		

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   G         2.4       0.18    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.23    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.273E-06	1.141E-06	1.024E-06	
0.005	0.019	0.034	0.633	1.648	2.386	4.693	6.676	12.858	13.412	
0.00025	0.00097	0.00170	0.03209	0.08353	0.12094	0.23784	0.33837	0.65167	0.67973	

9.965E-07	9.624E-07	8.590E-07	7.501E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	5.752E-07	5.243E-07	
13.596	16.779	27.574	28.174	29.096	38.507	46.626	47.087	53.869	55.437	
0.68908	0.85040	1.39750	1.42790	1.47466	1.95162	2.36311	2.38649	2.73018	2.80967	

5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	3.479E-07	3.265E-07	3.038E-07	
55.991	66.785	69.461	78.457	78.503	78.733	80.763	81.225	87.775	87.821	
2.83773	3.38483	3.52044	3.97635	3.97869	3.99038	4.09326	4.11664	4.44864	4.45097	

2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.130E-07	1.975E-07	1.923E-07	1.779E-07	1.445E-07	1.415E-07	
88.006	89.482	94.234	94.464	96.586	97.094	97.371	98.063	98.201	98.247	
4.46033	4.53514	4.77596	4.78765	4.89520	4.92092	4.93495	4.97002	4.97703	4.97937	

1.336E-07	1.163E-07	1.104E-07	9.605E-08	8.032E-08	6.505E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	
98.524	98.570	98.754	99.077	99.124	99.216	99.400	99.631	99.769	99.908	
4.99340	4.99574	5.00509	5.02146	5.02379	5.02847	5.03782	5.04951	5.05653	5.06354	

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   1.668E-08   1.253E-08
      99.954     100.000
     5.06588     5.06822

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.651
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.361
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.382
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.973
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.445
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.772

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1     -11.07050 -16.80125  -1.25550
  8  2     -13.68351 -16.15949  -0.99706
  8  3     -13.96752 -16.86641  -1.31862
  8  4     -14.24977 -17.84069  -1.80959
  8  5     -14.53378 -20.01925  -3.00174
  8  6     -14.75472 -20.75882  -3.42343
  8  7     -14.93482 -29.29799  -8.44287
  8  8     -15.22084     NUMXQ(K)=  8
    3.130E-06              0.051              1.000
    2.086E-06              0.152              3.000
    1.705E-06              0.253              5.000
    1.275E-06              0.507             10.000
    1.080E-06              0.760             15.000
    9.713E-07              1.014             20.000
    8.923E-07              1.267             25.000
    8.221E-07              1.520             30.000
    7.577E-07              1.774             35.000
    7.050E-07              2.027             40.000
    6.607E-07              2.281             45.000
    6.138E-07              2.534             50.000
    5.697E-07              2.788             55.000
    5.316E-07              3.041             60.000
    4.985E-07              3.294             65.000
    4.574E-07              3.548             70.000
```

4.161E-07	3.801	75.000
3.790E-07	4.055	80.000
3.439E-07	4.308	85.000
2.953E-07	4.561	90.000
1.282E-06	0.5	9.87

ANNUAL AVERAGE = 1.18E-08

K= 8 FIVEXQ(K)= 1.282E-06 FIVEPR(K)= 9.865

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.185	1.107	3.183	12.839	53.116	98.801	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.05	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.16	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.09	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.14	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
B	3.3	0.02	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.09	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.40	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.33	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.51	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.14	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
B	26.5	0.02	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	4.731E-08
C	2.2	0.02	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.481E-06
C	3.3	0.26	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.47	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.93	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.86	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	1.12	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07
C	10.8	0.23	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.038E-07

AT 131.4 METERS
CA=1292.SQ.METERS

C	26.5	0.02	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	1.236E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.28	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.91	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	3.99	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	7.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.71	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.40	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	8.06	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	2.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.93	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.61	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.03	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.40	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	6.14	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.63	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	8.57	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.68	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.26	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.77	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.75	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.08	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.07    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.93    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.56    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.02    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.19    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.21    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.19    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.51    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.19    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.02    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.02    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.481E-06	1.273E-06	1.141E-06
0.002	0.014	0.021	0.301	0.979	1.586	2.496	2.520	3.547	7.539
0.00023	0.00140	0.00213	0.03018	0.09799	0.15878	0.24996	0.25230	0.35517	0.75497

1.024E-06	9.965E-07	9.624E-07	8.590E-07	7.501E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	5.752E-07
7.820	8.077	9.477	16.949	17.416	17.673	25.378	31.519	32.452	38.850
0.78303	0.80875	0.94903	1.69720	1.74396	1.76968	2.54123	3.15613	3.24965	3.89027

5.243E-07	5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	3.479E-07	3.265E-07
39.620	40.484	50.571	58.626	68.503	68.526	69.647	71.398	73.639	80.270
3.96743	4.05394	5.06397	5.87059	6.85958	6.86191	6.97414	7.14949	7.37394	8.03794

3.038E-07	2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.130E-07	1.975E-07	1.923E-07	1.779E-07	1.445E-07
80.504	80.597	82.675	91.244	91.641	92.715	94.396	94.723	95.657	96.171
8.06132	8.07068	8.27876	9.13682	9.17657	9.28411	9.45245	9.48519	9.57871	9.63014

1.415E-07	1.336E-07	1.236E-07	1.163E-07	1.104E-07	1.076E-07	9.605E-08	8.851E-08	8.032E-08	7.393E-08
97.105	97.665	97.688	97.829	97.875	97.899	98.085	98.249	98.459	98.552
9.72367	9.77978	9.78211	9.79614	9.80082	9.80316	9.82186	9.83823	9.85927	9.86862

```
   6.505E-08   5.554E-08   4.918E-08   4.731E-08   3.310E-08   2.491E-08
1.998E-08   1.668E-08   1.253E-08
      98.762      98.903      99.089      99.113      99.626      99.766
99.953      99.977     100.000
     9.88966     9.90369     9.92240     9.92473     9.97617     9.99020
10.00890    10.01124    10.01358

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.754
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   3.153
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.887
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   5.060
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   6.856
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   8.034
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   9.133

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  9  1     -11.07050 -16.63611  -1.21486
  9  2     -13.68351 -15.91567  -0.91843
  9  3     -13.96752 -16.24887  -1.07551
  9  4     -14.24977 -16.57921  -1.25323
  9  5     -14.36856 -16.70164  -1.32264
  9  6     -14.53378 -16.90966  -1.44956
  9  7     -14.75472 -17.94790  -2.14795
  9  8     -14.93482 -20.65122  -4.07507
  9  9     -15.22084     NUMXQ(K)=  9
    2.543E-06              0.100              1.000
    1.678E-06              0.300              3.000
    1.361E-06              0.501              5.000
    1.037E-06              1.001             10.000
    8.984E-07              1.502             15.000
    7.988E-07              2.003             20.000
    7.221E-07              2.503             25.000
    6.632E-07              3.004             30.000
    6.107E-07              3.505             35.000
    5.650E-07              4.005             40.000
```

5.251E-07	4.506	45.000
4.912E-07	5.007	50.000
4.593E-07	5.507	55.000
4.313E-07	6.008	60.000
4.066E-07	6.509	65.000
3.816E-07	7.010	70.000
3.530E-07	7.510	75.000
3.278E-07	8.011	80.000
2.877E-07	8.512	85.000
2.530E-07	9.012	90.000
1.362E-06	0.5	4.99

ANNUAL AVERAGE = 1.93E-08

K= 9 FIVEXQ(K)= 1.362E-06 FIVEPR(K)= 4.993

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.444	1.961	5.884	13.620	52.287	98.529
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.04	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	0.08	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.16	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.12	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.08	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
B	3.3	0.16	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.16	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.36	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.20	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.20	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
B	26.5	0.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	4.731E-08
C	3.3	0.16	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.52	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.56	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.68	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	0.72	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.68	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.39	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	8.10	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	5.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.31	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.84	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.24	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.82	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	10.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	5.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.08	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.16	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.76	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.80     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.12     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.32     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.04     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.36     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.76     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.64     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.16     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.20     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNE SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.273E-06	1.141E-06	1.024E-06	
0.002	0.014	0.027	0.266	0.944	1.583	2.819	4.415	8.803	9.282	
0.00012	0.00083	0.00156	0.01559	0.05534	0.09275	0.16523	0.25875	0.51593	0.54399	

9.965E-07	9.624E-07	8.590E-07	7.501E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	5.752E-07	5.243E-07	
9.442	12.035	20.133	20.652	21.450	29.149	36.968	37.527	42.793	43.950	
0.55334	0.70531	1.17993	1.21033	1.25709	1.70833	2.16658	2.19931	2.50793	2.57574	

5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	3.479E-07	3.265E-07	2.872E-07	
44.628	55.519	59.827	70.080	70.239	70.957	74.508	75.346	82.606	82.766	
2.61548	3.25377	3.50627	4.10715	4.11650	4.15859	4.36667	4.41577	4.84129	4.85064	

2.656E-07	2.453E-07	2.303E-07	2.130E-07	1.975E-07	1.923E-07	1.779E-07	1.467E-07	1.445E-07	1.415E-07	
85.638	91.622	91.981	93.816	94.574	94.774	95.532	95.572	95.771	96.011	
5.01898	5.36969	5.39073	5.49828	5.54270	5.55439	5.59881	5.60115	5.61284	5.62687	

1.336E-07	1.163E-07	1.104E-07	1.076E-07	9.605E-08	8.851E-08	8.032E-08	7.393E-08	6.505E-08	5.554E-08	
96.809	96.848	96.928	97.048	97.367	97.527	97.606	97.726	97.766	97.846	
5.67363	5.67597	5.68065	5.68766	5.70636	5.71572	5.72039	5.72741	5.72974	5.73442	

4.918E-08	4.731E-08	3.310E-08	2.491E-08	1.998E-08	1.668E-08
98.205	98.245	99.003	99.641	99.801	100.000
5.75546	5.75780	5.80222	5.83963	5.84898	5.86067

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.515 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 2.164 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 3.251 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 4.104 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 4.838 HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= 5.366 HANDCHECK

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
10	1	-11.07050	-16.78869	-1.21042
10	2	-13.68351	-16.10141	-0.94251
10	3	-13.96752	-16.59614	-1.16103
10	4	-14.24977	-17.51496	-1.61568
10	5	-14.53378	-18.36585	-2.07683
10	6	-14.75472	-18.77126	-2.30999
10	7	-14.93482	-24.35241	-5.67050
10	8	-15.22084	NUMXQ(K)= 8	

2.600E-06	0.059	1.000
1.751E-06	0.176	3.000
1.437E-06	0.293	5.000
1.094E-06	0.586	10.000
9.534E-07	0.879	15.000
8.610E-07	1.172	20.000
7.790E-07	1.465	25.000
7.157E-07	1.758	30.000
6.651E-07	2.051	35.000
6.139E-07	2.344	40.000
5.660E-07	2.637	45.000
5.256E-07	2.930	50.000
4.909E-07	3.223	55.000
4.535E-07	3.516	60.000
4.203E-07	3.809	65.000
3.914E-07	4.102	70.000

3.632E-07	4.396	75.000
3.383E-07	4.689	80.000
3.019E-07	4.982	85.000
2.578E-07	5.275	90.000
1.156E-06	0.5	8.53

ANNUAL AVERAGE = 1.09E-08

K= 10 FIVEXQ(K)= 1.156E-06 FIVEPR(K)= 8.531

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.479	1.636	4.269	16.648	49.642	97.527
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	0.09	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.14	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	8.7	0.09	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
B	3.3	0.14	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.19	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.28	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.28	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.14	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.05	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
C	3.3	0.33	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.42	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.70	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.52	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	0.75	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07
C	10.8	0.14	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.038E-07
C	26.5	0.09	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.236E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	1.32	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	4.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	6.01	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	6.67	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	3.76	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	4.27	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	0.70	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	0.23	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.80	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.96	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	4.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.27	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.70	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.27	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	4.65	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	4.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	3.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.46	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.08     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.05     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.28     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.03     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.69     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.75     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.47     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.23     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.273E-06	1.141E-06	1.024E-06		
0.003	0.019	0.037	0.460	1.540	2.339	3.654	5.627	10.231	10.935		
0.00017	0.00094	0.00185	0.02289	0.07667	0.11641	0.18188	0.28007	0.50920	0.54427		

9.965E-07	9.624E-07	8.590E-07	7.501E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	5.752E-07	5.243E-07		
11.264	14.224	20.236	20.659	21.458	28.128	35.832	36.537	40.295	41.563		
0.56064	0.70793	1.00720	1.02824	1.06799	1.39999	1.78343	1.81850	2.00554	2.06867		

5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	3.479E-07	3.265E-07	3.038E-07		
42.080	51.052	55.327	63.078	63.219	63.970	68.621	69.325	73.976	74.117		
2.09439	2.54095	2.75371	3.13949	3.14650	3.18391	3.41538	3.45045	3.68191	3.68893		

2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.130E-07	1.975E-07	1.923E-07	1.779E-07	1.467E-07	1.445E-07		
74.305	79.237	86.706	86.988	90.088	91.357	91.638	93.095	93.189	93.330		
3.69828	3.94377	4.31552	4.32955	4.48386	4.54698	4.56101	4.63349	4.63817	4.64518		

1.415E-07	1.336E-07	1.236E-07	1.163E-07	1.104E-07	1.076E-07	9.605E-08	8.851E-08	8.032E-08	6.505E-08		
93.564	94.645	94.739	94.786	94.880	94.927	94.974	95.115	95.209	95.443		
4.65687	4.71065	4.71532	4.71766	4.72234	4.72467	4.72701	4.73403	4.73870	4.75039		

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   5.554E-08   4.918E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.537      95.819      96.853      98.544      99.295      99.765
100.000
     4.75507     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

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 CHI/Q =  1.556E-05      DISTANCE =   4000.000
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X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

```
 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.509
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.006
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.781
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.538
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.137
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.679
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.312

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.07050 -16.92579  -1.26163
 11  2     -13.68351 -16.65252  -1.15529
 11  3     -13.96752 -16.90963  -1.26592
 11  4     -14.24977 -18.29019  -1.92298
 11  5     -14.53378 -19.20750  -2.39256
 11  6     -14.75472 -19.42068  -2.50711
 11  7     -14.93482 -21.88013  -3.88168
 11  8     -15.22084     NUMXQ(K)=  8
    2.838E-06            0.050             1.000
    1.889E-06            0.149             3.000
    1.543E-06            0.249             5.000
    1.153E-06            0.498            10.000
    9.758E-07            0.747            15.000
    8.634E-07            0.995            20.000
    7.758E-07            1.244            25.000
    7.089E-07            1.493            30.000
    6.556E-07            1.742            35.000
    5.940E-07            1.991            40.000
    5.405E-07            2.240            45.000
```

4.960E-07	2.489	50.000
4.515E-07	2.737	55.000
4.122E-07	2.986	60.000
3.780E-07	3.235	65.000
3.477E-07	3.484	70.000
3.186E-07	3.733	75.000
2.839E-07	3.982	80.000
2.543E-07	4.231	85.000
1.150E-06	0.5	10.05

ANNUAL AVERAGE = 8.98E-09

K= 11 FIVEXQ(K)= 1.150E-06 FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.423	1.503	4.463	22.519	51.600	95.256
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					
			AT 131.4 METERS							
CA=1292.SQ.METERS										
A	5.4	0.14	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.28	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.05	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	10.8	0.09	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	4.471E-08
A	26.5	0.05	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.819E-08
B	3.3	0.05	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.09	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.24	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.33	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.61	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.09	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
B	26.5	0.05	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	4.731E-08
C	3.3	0.14	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.19	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.66	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.71	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	1.13	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07
C	10.8	0.14	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.038E-07

C	26.5	0.09	4000.	0.	131.	374.1	
216.1	0.0	0.000E+00	0.000E+00	1.236E-07			
D	0.2	0.00	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.556E-05			
D	1.1	0.28	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.312E-06			
D	1.7	0.42	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	2.243E-06			
D	2.2	1.13	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.696E-06			
D	3.3	4.24	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.141E-06			
D	4.4	3.77	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	8.590E-07			
D	5.4	4.19	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	6.887E-07			
D	6.5	4.85	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	5.752E-07			
D	8.7	6.54	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	4.321E-07			
D	10.8	0.94	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	3.479E-07			
D	26.5	0.56	4000.	0.	131.	263.4	
78.0	0.0	0.000E+00	0.000E+00	1.415E-07			
E	0.3	0.02	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	0.89	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	1.65	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	1.69	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	5.22	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	5.46	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	7.01	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			
E	7.0	7.39	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	8.33	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	1.79	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	0.09	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			
F	0.3	0.02	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.813E-06			
F	1.2	0.71	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.024E-06			
F	1.8	0.85	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	6.935E-07			
F	2.4	1.69	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	5.243E-07			
F	3.5	3.01	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	3.528E-07			
F	4.7	3.62	90000.	0.	131.	1000.0	

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	4.00	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.68	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.77	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.47	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.89	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.18	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	1.88	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.66	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

ENE SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.273E-06	1.141E-06	1.024E-06		
0.002	0.019	0.038	0.320	0.744	1.638	2.768	4.415	8.650	9.356		
0.00012	0.00097	0.00188	0.01591	0.03695	0.08137	0.13749	0.21932	0.42974	0.46481		
9.965E-07	9.624E-07	8.590E-07	7.501E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	5.752E-07	5.243E-07		
9.498	11.192	14.957	15.145	15.992	20.181	25.405	26.064	30.911	32.606		
0.47182	0.55599	0.74304	0.75239	0.79447	1.00256	1.26208	1.29481	1.53563	1.61980		
5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	3.479E-07	3.265E-07	3.038E-07		
33.312	38.771	45.313	52.325	52.372	53.502	56.514	57.455	64.844	64.985		
1.65487	1.92608	2.25107	2.59943	2.60177	2.65789	2.80752	2.85428	3.22135	3.22837		
2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.130E-07	1.975E-07	1.923E-07	1.779E-07	1.445E-07	1.415E-07		
65.079	68.703	77.033	77.269	81.269	83.057	83.387	86.069	86.681	87.246		
3.23304	3.41307	3.82690	3.83859	4.03732	4.12617	4.14254	4.27580	4.30620	4.33426		
1.336E-07	1.236E-07	1.163E-07	1.076E-07	9.605E-08	8.851E-08	8.032E-08	7.393E-08	6.505E-08	5.554E-08		
91.011	91.105	91.199	92.188	92.658	92.799	92.893	93.176	93.552	93.599		
4.52130	4.52597	4.53065	4.57975	4.60313	4.61014	4.61482	4.62885	4.64755	4.64989		

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   4.918E-08   4.731E-08   4.471E-08   4.375E-08   3.310E-08   2.491E-08
1.998E-08   1.819E-08   1.668E-08   1.253E-08
      93.976      94.023      94.117      94.164      95.058      96.235
98.117      98.165      99.247      99.906
     4.66859     4.67093     4.67561     4.67795     4.72237     4.78082
4.87434     4.87668     4.93045     4.96319

   1.009E-08
     100.000
     4.96786

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.429
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.261
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.534
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.597
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.218
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.824
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.034

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 12  1     -11.07050 -16.95999  -1.24668
 12  2     -13.68351 -17.49915  -1.45183
 12  3     -14.24977 -17.70667  -1.54455
 12  4     -14.36856 -18.20454  -1.77491
 12  5     -14.75472 -18.47764  -1.91542
 12  6     -14.93482 -21.70902  -3.66247
 12  7     -15.22084 -25.32993  -5.70641
 12  8     -15.36220     NUMXQ(K)=  8
    2.613E-06              0.050              1.000
    1.748E-06              0.149              3.000
    1.431E-06              0.248              5.000
    1.062E-06              0.497             10.000
    8.622E-07              0.745             15.000
    7.393E-07              0.994             20.000
    6.536E-07              1.242             25.000
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5.858E-07	1.490	30.000
5.265E-07	1.739	35.000
4.779E-07	1.987	40.000
4.381E-07	2.236	45.000
4.047E-07	2.484	50.000
3.751E-07	2.732	55.000
3.488E-07	2.981	60.000
3.252E-07	3.229	65.000
2.879E-07	3.478	70.000
2.566E-07	3.726	75.000
2.220E-07	3.974	80.000
1.058E-06	0.5	10.06

ANNUAL AVERAGE = 7.42E-09

K= 12 FIVEXQ(K)= 1.058E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.612	2.071	5.130	26.515	53.437	92.988
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED						
					AT 131.4 METERS						
CA=1292.SQ.METERS											
A	4.4	0.03	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.06	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.39	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.42	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	10.8	0.30	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	4.471E-08
A	26.5	0.18	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.819E-08
B	2.2	0.03	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	0.09	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.09	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.39	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.30	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.63	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.33	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
B	26.5	0.21	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	4.731E-08
C	3.3	0.06	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.48	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.69	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.33	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07

C	8.7	1.44	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	3.774E-07						
C	10.8	0.87	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	3.038E-07						
C	26.5	0.48	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	1.236E-07						
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	0.24	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	0.54	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	0.90	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	2.66	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	3.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	4.01	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	4.25	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	9.30	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	6.31	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	3.71	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.90	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	0.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	1.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	3.05	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	3.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.77	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	6.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	12.47	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.42	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.48	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.66	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.29	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.63	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.83	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.84	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.81	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
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E SECTOR BOUNDARY DISTANCE = 4000.0 METERS
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BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
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1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.273E-06	1.141E-06	1.024E-06		
0.002	0.019	0.030	0.269	0.808	1.705	2.603	3.321	5.983	6.402		
0.00015	0.00150	0.00235	0.02106	0.06314	0.13328	0.20342	0.25953	0.46762	0.50035		

9.965E-07	9.624E-07	8.590E-07	7.501E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	5.752E-07	5.669E-07		
6.461	7.718	10.978	11.457	11.936	15.944	18.995	19.683	23.931	23.961		
0.50503	0.60323	0.85807	0.89548	0.93289	1.24618	1.48466	1.53844	1.87044	1.87278		

5.243E-07	5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	3.479E-07	3.265E-07		
24.619	24.948	28.537	37.840	43.614	43.703	45.139	46.425	52.737	59.109		
1.92421	1.94993	2.23050	2.95762	3.40886	3.41588	3.52810	3.62864	4.12196	4.61997		

3.038E-07	2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.130E-07	1.975E-07	1.923E-07	1.779E-07	1.445E-07		
59.976	60.066	62.698	75.172	75.561	78.104	80.736	81.035	83.578	84.206		
4.68777	4.69478	4.90053	5.87549	5.90588	6.10462	6.31036	6.33374	6.53248	6.58157		

1.415E-07	1.336E-07	1.236E-07	1.163E-07	1.104E-07	1.076E-07	9.605E-08	8.851E-08	8.032E-08	7.393E-08		
87.915	91.744	92.223	92.552	92.582	93.270	93.509	93.569	93.868	94.257		
6.87149	7.17076	7.20817	7.23389	7.23622	7.29000	7.30870	7.31338	7.33676	7.36715		

```
   6.505E-08   5.554E-08   4.918E-08   4.731E-08   4.471E-08   4.375E-08
3.310E-08   2.491E-08   1.998E-08   1.819E-08
      94.406      94.825      95.034      95.244      95.543      95.573
96.321      97.158      97.966      98.145
     7.37884     7.41158     7.42794     7.44431     7.46769     7.47003
7.52848     7.59394     7.65707     7.67110

   1.668E-08   1.253E-08   1.009E-08
      99.252      99.970     100.000
     7.75761     7.81372     7.81606

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.203
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.857
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.868
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.955
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.616
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.872
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   7.167

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1     -11.07050 -16.44367  -1.15172
 13  2     -11.63677 -16.93445  -1.26931
 13  3     -13.28753 -17.27886  -1.38918
 13  4     -13.96752 -17.13345  -1.32818
 13  5     -14.36856 -17.43392  -1.47252
 13  6     -14.65458 -17.24455  -1.37219
 13  7     -14.93482 -19.02848  -2.43200
 13  8     -15.22084 -24.53004  -5.94594
 13  9     -15.82832    NUMXQ(K)=  9
    2.449E-06              0.078              1.000
    1.592E-06              0.234              3.000
    1.261E-06              0.391              5.000
    9.007E-07              0.782             10.000
```

7.352E-07	1.172	15.000
6.333E-07	1.563	20.000
5.602E-07	1.954	25.000
5.008E-07	2.345	30.000
4.544E-07	2.736	35.000
4.178E-07	3.126	40.000
3.886E-07	3.517	45.000
3.637E-07	3.908	50.000
3.422E-07	4.299	55.000
3.209E-07	4.690	60.000
2.921E-07	5.080	65.000
2.674E-07	5.471	70.000
2.460E-07	5.862	75.000
2.035E-07	6.253	80.000
1.692E-07	6.644	85.000
1.418E-07	7.034	90.000
1.122E-06	0.5	6.40

ANNUAL AVERAGE = 1.17E-08

K= 13 FIVEXQ(K)= 1.122E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
1.376	3.440	7.777	22.895	58.074	95.154	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED						
			AT 131.4 METERS								
CA=1292.SQ.METERS											
A	4.4	0.08	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.08	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.19	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.13	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	10.8	0.05	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	4.471E-08
A	26.5	0.13	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.819E-08
B	3.3	0.03	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.13	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.05	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.21	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.40	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.32	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
B	26.5	0.27	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	4.731E-08
C	3.3	0.05	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.16	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.35	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.56	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	1.21	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07

C	10.8	0.72	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	3.038E-07						
C	26.5	0.89	4000.	0.	131.	374.1	216.1	0.0
0.000E+00	0.000E+00	1.236E-07						
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.556E-05						
D	1.1	0.51	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.312E-06						
D	1.7	0.51	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	2.243E-06						
D	2.2	0.51	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.696E-06						
D	3.3	1.58	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.141E-06						
D	4.4	3.09	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	8.590E-07						
D	5.4	4.29	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	6.887E-07						
D	6.5	5.26	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	5.752E-07						
D	8.7	14.57	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	4.321E-07						
D	10.8	10.52	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	3.479E-07						
D	26.5	6.09	4000.	0.	131.	263.4	78.0	0.0
0.000E+00	0.000E+00	1.415E-07						
E	0.3	0.01	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.46	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	0.51	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	0.62	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	2.20	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	3.11	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	4.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	6.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	11.84	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	3.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.35	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.40	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.48	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	5.243E-07						
F	3.5	1.05	90000.	0.	131.	1000.0		

```
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       1.32    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.99    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       1.48    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       2.79    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.62    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.21    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.16    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.21    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.59    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.70    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.54    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.27    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.86    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
   G       11.6       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.009E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 1.880E-06 1.696E-06 1.273E-06 1.141E-06 1.024E-06
0.004 0.013 0.022 0.532 1.042 1.498 2.008 2.518 4.102 4.451
0.00037 0.00113 0.00192 0.04634 0.09076 0.13051 0.17493 0.21936 0.35730 0.38769

9.965E-07 9.624E-07 8.590E-07 7.501E-07 6.935E-07 6.887E-07 6.477E-07 6.014E-07 5.752E-07 5.243E-07
4.504 5.122 8.208 8.369 8.772 13.066 15.267 15.616 20.876 21.360
0.39237 0.44615 0.71502 0.72905 0.76412 1.13820 1.32992 1.36032 1.81857 1.86065

5.023E-07 4.876E-07 4.321E-07 3.909E-07 3.815E-07 3.774E-07 3.528E-07 3.479E-07 3.265E-07 3.038E-07
21.923 25.037 39.611 43.932 43.959 45.166 46.213 56.734 62.961 63.686
1.90975 2.18097 3.45052 3.82694 3.82928 3.93449 4.02567 4.94218 5.48461 5.54773

2.872E-07 2.656E-07 2.453E-07 2.303E-07 2.130E-07 1.975E-07 1.923E-07 1.779E-07 1.445E-07 1.415E-07
63.820 65.135 76.972 77.025 79.011 82.339 82.554 84.030 84.433 90.526
5.55942 5.67399 6.70506 6.70973 6.88275 7.17267 7.19137 7.31996 7.35503 7.88577

1.336E-07 1.236E-07 1.163E-07 1.104E-07 1.076E-07 9.605E-08 8.851E-08 8.032E-08 7.393E-08 6.505E-08
93.317 94.203 94.525 94.605 95.223 95.437 95.518 95.840 96.028 96.189
8.12892 8.20608 8.23413 8.24115 8.29492 8.31363 8.32064 8.34870 8.36506 8.37909

```
   5.554E-08   4.918E-08   4.731E-08   4.471E-08   3.310E-08   2.491E-08
1.998E-08   1.819E-08   1.668E-08   1.253E-08
      96.323      96.538      96.806      96.860      97.450      98.148
98.685      98.819      99.087      99.946
     8.39078     8.40948     8.43287     8.43754     8.48898     8.54977
8.59653     8.60822     8.63160     8.70642

   1.009E-08
     100.000
     8.71109

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.046
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.714
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.817
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.447
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   5.481
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   6.701
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   8.125

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1     -11.07050 -16.99068  -1.32021
 14  2     -12.61806 -17.80298  -1.56546
 14  3     -13.96752 -16.72089  -1.12380
 14  4     -14.36856 -16.55011  -1.04221
 14  5     -14.65458 -16.98368  -1.28060
 14  6     -14.93482 -19.44332  -2.81795
 14  7     -15.22084 -24.16929  -5.97192
 14  8     -15.82832     NUMXQ(K)=  8
    2.495E-06            0.087             1.000
    1.470E-06            0.261             3.000
    1.127E-06            0.436             5.000
    7.923E-07            0.871            10.000
    6.668E-07            1.307            15.000
    5.866E-07            1.742            20.000
    5.323E-07            2.178            25.000
```

4.910E-07	2.613	30.000
4.578E-07	3.049	35.000
4.297E-07	3.484	40.000
4.010E-07	3.920	45.000
3.765E-07	4.356	50.000
3.553E-07	4.791	55.000
3.366E-07	5.227	60.000
3.123E-07	5.662	65.000
2.812E-07	6.098	70.000
2.547E-07	6.533	75.000
2.176E-07	6.969	80.000
1.800E-07	7.404	85.000
1.501E-07	7.840	90.000
1.047E-06	0.5	5.74

ANNUAL AVERAGE = 1.38E-08

K= 14 FIVEXQ(K)= 1.047E-06 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01	1.693E-02
0.671	2.093	6.039	16.516	63.462	96.403	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	6.5	0.06	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.04	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	26.5	0.02	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.819E-08
B	2.2	0.02	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	0.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.02	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.02	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.06	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.13	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.11	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
C	3.3	0.06	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.17	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.19	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.38	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	0.56	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07
C	10.8	0.47	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.038E-07
C	26.5	0.26	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.236E-07
D	0.2	0.00	4000.	0.	131.	263.4					

78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.17	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	0.60	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	0.85	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	2.52	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	3.97	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	5.02	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	7.09	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	17.54	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	10.45	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	5.47	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.30     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G        1.2       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.94     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.88     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.36     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.11     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05	8.835E-06	4.813E-06	3.312E-06	2.243E-06	1.880E-06	1.696E-06	1.273E-06	1.141E-06	1.024E-06	
0.001	0.011	0.018	0.189	0.787	1.279	2.134	2.475	4.997	5.275	
0.00015	0.00118	0.00198	0.02068	0.08615	0.13992	0.23344	0.27085	0.54674	0.57713	

9.965E-07	9.624E-07	8.590E-07	7.501E-07	6.935E-07	6.887E-07	6.477E-07	6.014E-07	5.752E-07	5.669E-07	
5.339	5.980	9.954	10.125	10.403	15.425	17.818	18.010	25.104	25.126	
0.58415	0.65429	1.08916	1.10787	1.13826	1.68770	1.94956	1.97060	2.74683	2.74917	

5.243E-07	5.023E-07	4.876E-07	4.321E-07	3.909E-07	3.815E-07	3.774E-07	3.528E-07	3.479E-07	3.265E-07	
25.510	25.895	29.186	46.729	52.178	52.221	52.776	54.058	64.507	70.426	
2.79125	2.83333	3.19339	5.11292	5.70911	5.71379	5.77458	5.91486	7.05816	7.70579	

3.038E-07	2.872E-07	2.656E-07	2.453E-07	2.303E-07	2.130E-07	1.975E-07	1.923E-07	1.779E-07	1.445E-07	
70.896	70.918	72.392	82.927	82.948	84.807	86.965	87.029	88.461	88.589	
7.75723	7.75957	7.92089	9.07354	9.07588	9.27929	9.51543	9.52245	9.67909	9.69312	

1.415E-07	1.336E-07	1.236E-07	1.163E-07	9.605E-08	8.032E-08	7.393E-08	6.505E-08	5.554E-08	4.918E-08	
94.060	95.363	95.620	95.726	95.876	96.090	96.154	96.282	96.325	96.560	
10.29166	10.43428	10.46233	10.47402	10.49039	10.51377	10.52079	10.53481	10.53949	10.56521	

3.310E-08	2.491E-08	1.998E-08	1.819E-08	1.668E-08	1.253E-08
97.500	98.632	99.509	99.530	99.893	100.000
10.66808	10.79200	10.88786	10.89020	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.233
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.088
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.744
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   5.109
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.054
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   7.702
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.07050	-16.70421	-1.20757
15	2	-13.28753	-16.88487	-1.27142
15	3	-13.96752	-16.42298	-1.07012
15	4	-14.36856	-16.29220	-1.00200
15	5	-14.65458	-16.83368	-1.33331
15	6	-14.87137	-16.88602	-1.36887
15	7	-14.93482	NUMXQ(K)= 7	

2.250E-06	0.109	1.000
1.473E-06	0.328	3.000
1.181E-06	0.547	5.000
8.574E-07	1.094	10.000
7.239E-07	1.641	15.000
6.381E-07	2.188	20.000
5.763E-07	2.735	25.000
5.316E-07	3.282	30.000
4.956E-07	3.830	35.000
4.656E-07	4.377	40.000
4.401E-07	4.924	45.000
4.134E-07	5.471	50.000
3.880E-07	6.018	55.000
3.657E-07	6.565	60.000
3.460E-07	7.112	65.000
3.280E-07	7.659	70.000

1.229E-06 0.5 4.57

ANNUAL AVERAGE = 1.86E-08

K= 15 FIVEXQ(K)= 1.229E-06 FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.128	0.534	2.628	10.926	64.626	96.068
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.02	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	5.4	0.11	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.09	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.30	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	10.8	0.02	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	4.471E-08
A	26.5	0.02	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.819E-08
B	3.3	0.06	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.15	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.26	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.32	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.43	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.13	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
C	2.2	0.02	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.481E-06
C	3.3	0.35	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	9.965E-07
C	4.4	0.76	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	7.501E-07
C	5.4	0.97	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	6.014E-07
C	6.5	0.93	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	5.023E-07
C	8.7	1.60	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.774E-07

AT 131.4 METERS
CA=1292.SQ.METERS

C	10.8	0.30	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	3.038E-07
C	26.5	0.09	4000.	0.	131.	374.1	216.1	0.0	0.000E+00	0.000E+00	1.236E-07
D	0.2	0.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.556E-05
D	1.1	0.22	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.312E-06
D	1.7	0.86	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	2.243E-06
D	2.2	1.08	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.696E-06
D	3.3	4.99	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.141E-06
D	4.4	8.43	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	8.590E-07
D	5.4	9.47	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	6.887E-07
D	6.5	8.78	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	5.752E-07
D	8.7	15.00	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	4.321E-07
D	10.8	4.97	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	3.479E-07
D	26.5	2.03	4000.	0.	131.	263.4	78.0	0.0	0.000E+00	0.000E+00	1.415E-07
E	0.3	0.00	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.24	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	0.50	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	0.78	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	2.49	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	4.32	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	4.60	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	5.97	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	7.26	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.04	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.00	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.15	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.32	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.43	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.28	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.41	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.22	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.73	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.63	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 4000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.243E-06 1.880E-06 1.696E-06 1.481E-06 1.273E-06 1.141E-06
0.002 0.006 0.010 0.226 1.091 1.329 2.410 2.431 2.928 7.921
0.00019 0.00069 0.00111 0.02449 0.11801 0.14373 0.26063 0.26297 0.31675 0.85683

1.024E-06 9.965E-07 9.624E-07 8.590E-07 7.501E-07 6.935E-07 6.887E-07 6.477E-07 6.014E-07 5.752E-07
8.073 8.418 9.197 17.626 18.383 18.707 28.174 30.660 31.633 40.408
0.87320 0.91061 0.99478 1.90661 1.98844 2.02351 3.04757 3.31644 3.42165 4.37089

5.243E-07 5.023E-07 4.876E-07 4.321E-07 3.909E-07 3.815E-07 3.774E-07 3.528E-07 3.479E-07 3.265E-07
40.840 41.770 46.093 61.093 65.697 65.762 67.362 68.637 73.608 79.574
4.41765 4.51819 4.98580 6.60839 7.10639 7.11341 7.28642 7.42436 7.96211 8.60741

3.038E-07 2.872E-07 2.656E-07 2.453E-07 2.303E-07 2.130E-07 1.975E-07 1.923E-07 1.779E-07 1.467E-07
79.877 80.028 81.174 88.436 88.696 89.928 90.965 91.289 92.305 92.327
8.64014 8.65651 8.78043 9.56600 9.59406 9.72733 9.83955 9.87462 9.98451 9.98685

1.445E-07 1.415E-07 1.336E-07 1.236E-07 1.163E-07 1.076E-07 9.605E-08 8.851E-08 8.032E-08 7.393E-08
92.759 94.791 95.202 95.288 95.418 95.526 95.742 95.850 96.153 96.239
10.03361 10.25339 10.29781 10.30716 10.32119 10.33288 10.35626 10.36795 10.40068 10.41003

6.505E-08 5.554E-08 4.918E-08 4.471E-08 3.310E-08 2.491E-08
1.998E-08 1.819E-08 1.668E-08 1.253E-08
96.434 96.736 96.996 97.017 97.752 99.092
99.719 99.741 99.914 100.000
10.43108 10.46381 10.49186 10.49420 10.57370 10.71865
10.78646 10.78879 10.80750 10.81685

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= 0.856
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= 4.367
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= 6.605
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= 8.604
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= 9.563
HANDCHECK
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= 9.981

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
16	1	-11.07050	-16.47087	-1.16910
16	2	-13.68351	-15.86553	-0.91520
16	3	-13.96752	-16.25046	-1.10081
16	4	-14.36856	-16.76958	-1.40447
16	5	-14.65458	-17.66158	-1.99680
16	6	-14.93482	-21.59029	-4.87379
16	7	-15.22084	-32.53467	-13.24824
16	8	-15.54231		

NUMXQ(K)= 8

2.536E-06	0.108	1.000
1.694E-06	0.325	3.000
1.384E-06	0.541	5.000
1.054E-06	1.082	10.000
9.120E-07	1.623	15.000
8.109E-07	2.163	20.000
7.304E-07	2.704	25.000
6.687E-07	3.245	30.000
6.192E-07	3.786	35.000
5.782E-07	4.327	40.000
5.352E-07	4.868	45.000
4.979E-07	5.408	50.000
4.658E-07	5.949	55.000

4.378E-07	6.490	60.000
4.053E-07	7.031	65.000
3.749E-07	7.572	70.000
3.482E-07	8.113	75.000
3.219E-07	8.653	80.000
2.733E-07	9.194	85.000
2.151E-07	9.735	90.000
1.428E-06	0.5	4.62

ANNUAL AVERAGE = 2.40E-08

K= 16 FIVEXQ(K)= 1.428E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
0.562	1.924	6.938	13.038	68.870	96.369
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.01	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	2.882E-07
A	2.2	0.09	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	2.179E-07
A	3.3	0.31	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.467E-07
A	4.4	0.33	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.104E-07
A	5.4	0.22	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	8.851E-08
A	6.5	0.18	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	7.393E-08
A	8.7	0.20	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	5.554E-08
A	10.8	0.05	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	4.471E-08
A	26.5	0.04	4000.	0.	131.	655.0	1000.0	0.0	0.000E+00	0.000E+00	1.819E-08
B	1.1	0.00	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.107E-06
B	1.7	0.04	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	7.498E-07
B	2.2	0.12	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	5.669E-07
B	3.3	0.29	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	3.815E-07
B	4.4	0.26	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.872E-07
B	5.4	0.26	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	2.303E-07
B	6.5	0.22	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.923E-07
B	8.7	0.30	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.445E-07
B	10.8	0.12	4000.	0.	131.	492.6	497.9	0.0	0.000E+00	0.000E+00	1.163E-07
B	26.5	0.05	4000.	0.	131.	492.6					

497.9	0.0	0.000E+00	0.000E+00	4.731E-08		
C	1.1	0.01	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	2.892E-06		
C	1.7	0.07	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	1.959E-06		
C	2.2	0.21	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	1.481E-06		
C	3.3	0.42	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	9.965E-07		
C	4.4	0.56	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	7.501E-07		
C	5.4	0.63	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	6.014E-07		
C	6.5	0.52	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	5.023E-07		
C	8.7	0.79	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	3.774E-07		
C	10.8	0.27	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	3.038E-07		
C	26.5	0.17	4000.	0.	131.	374.1
216.1	0.0	0.000E+00	0.000E+00	1.236E-07		
D	0.2	0.00	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.556E-05		
D	1.1	0.57	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.312E-06		
D	1.7	1.50	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	2.243E-06		
D	2.2	2.03	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.696E-06		
D	3.3	5.42	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.141E-06		
D	4.4	7.33	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	8.590E-07		
D	5.4	7.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	6.887E-07		
D	6.5	6.11	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	5.752E-07		
D	8.7	9.08	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	4.321E-07		
D	10.8	3.90	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	3.479E-07		
D	26.5	1.98	4000.	0.	131.	263.4
78.0	0.0	0.000E+00	0.000E+00	1.415E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.73	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.24	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.35	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		

E	7.0	5.18	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	6.91	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	1.44	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	0.26	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			
F	0.3	0.01	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.813E-06			
F	1.2	0.45	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.024E-06			
F	1.8	0.56	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	6.935E-07			
F	2.4	0.84	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	5.243E-07			
F	3.5	1.79	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	3.528E-07			
F	4.7	1.87	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	2.656E-07			
F	5.9	1.57	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	2.130E-07			
F	7.0	1.04	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.779E-07			
F	9.3	1.10	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.336E-07			
F	11.6	0.18	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	1.076E-07			
F	28.5	0.02	90000.	0.	131.	1000.0	
92.1	0.0	0.000E+00	0.000E+00	4.375E-08			
G	1.2	0.25	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	9.605E-08			
G	1.8	0.19	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	6.505E-08			
G	2.4	0.26	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	4.918E-08			
G	3.5	0.72	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	3.310E-08			
G	4.7	0.69	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	2.491E-08			
G	5.9	0.48	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	1.998E-08			
G	7.0	0.27	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	1.668E-08			
G	9.3	0.20	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	1.253E-08			
G	11.6	0.01	90000.	0.	131.	1000.0	
46.0	0.0	0.000E+00	0.000E+00	1.009E-08			

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 4000.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.892E-06 2.243E-06 1.959E-06 1.880E-06 1.696E-06 1.481E-06
0.005 0.019 0.030 0.599 0.610 2.114 2.179 2.911 4.943 5.153
0.00468 0.01870 0.03039 0.59854 0.61023 2.11358 2.17905 2.91085 4.94260 5.15302

1.273E-06 1.141E-06 1.107E-06 1.024E-06 9.965E-07 9.624E-07 8.590E-07 7.501E-07 7.498E-07 6.935E-07
6.392 11.816 11.821 12.270 12.688 14.573 21.898 22.454 22.497 23.060
6.39218 11.81642 11.82109 12.27000 12.68850 14.57296 21.89801 22.45447 22.49655 23.06001

6.887E-07 6.477E-07 6.014E-07 5.752E-07 5.669E-07 5.243E-07 5.023E-07 4.876E-07 4.321E-07 3.909E-07
30.142 35.393 36.020 42.127 42.244 43.081 43.604 50.123 59.206 65.554
30.14192 35.39314 36.01973 42.12667 42.24357 43.08059 43.60431 50.12275 59.20600 65.55376

3.815E-07 3.774E-07 3.528E-07 3.479E-07 3.265E-07 3.038E-07 2.882E-07 2.872E-07 2.656E-07 2.453E-07
65.846 66.636 68.425 72.325 77.501 77.775 77.782 78.046 79.919 86.830
65.84601 66.63626 68.42486 72.32469 77.50110 77.77465 77.78166 78.04586 79.91862 86.82985

2.303E-07 2.179E-07 2.130E-07 1.975E-07 1.923E-07 1.779E-07 1.467E-07 1.445E-07 1.415E-07 1.336E-07
87.087 87.181 88.747 90.187 90.405 91.443 91.756 92.053 94.029 95.132
87.08704 87.18056 88.74704 90.18727 90.40471 91.44279 91.75609 92.05302 94.02866 95.13221

```
   1.236E-07   1.163E-07   1.104E-07   1.076E-07   9.605E-08   8.851E-08
8.032E-08   7.393E-08   6.505E-08   5.554E-08
      95.305      95.424      95.752      95.932      96.180      96.397
96.657      96.834      97.021      97.218
    95.30522    95.42446    95.75179    95.93182    96.17966    96.39709
96.65662    96.83430    97.02135    97.21774

   4.918E-08   4.731E-08   4.471E-08   4.375E-08   3.310E-08   2.491E-08
1.998E-08   1.819E-08   1.668E-08   1.253E-08
      97.480      97.529      97.575      97.592      98.310      99.002
99.481      99.518      99.785      99.988
    97.47960    97.52869    97.57545    97.59182    98.30959    99.00165
99.48094    99.51835    99.78488    99.98829

   1.009E-08
    100.000
    99.99998
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE ORDERED X/Q-FREQUENCY VALUES, AND AS PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY
3.295E-06	1.000	1.000
2.126E-06	3.000	3.000
1.688E-06	5.000	5.000
1.273E-06	10.000	10.000
1.052E-06	15.000	15.000
9.042E-07	20.000	20.000
8.006E-07	25.000	25.000
7.213E-07	30.000	30.000
6.548E-07	35.000	35.000
5.975E-07	40.000	40.000
5.487E-07	45.000	45.000
5.061E-07	50.000	50.000
4.667E-07	55.000	55.000
4.298E-07	60.000	60.000
3.947E-07	65.000	65.000
3.671E-07	70.000	70.000
3.402E-07	75.000	75.000
3.051E-07	80.000	80.000
2.616E-07	85.000	85.000
2.041E-07	90.000	90.000
1.688E-06	5.0	5.00

K= 17 FIVEXQ(K)= 1.688E-06 FIVEPR(K)= 5.000

FUMIGATION X/Q AT THE BOUNDARY: 1.17E-05

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.658E-01	8.311E-01	3.613E-01	2.419E-01	2.081E-01
1.693E-02					
1.417	3.077	6.727	16.153	61.158	96.932
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.556E-05 8.835E-06 4.813E-06 3.312E-06 2.892E-06 2.243E-06 1.959E-06 1.880E-06 1.696E-06 1.481E-06
0.005 0.019 0.030 0.599 0.610 2.114 2.179 2.911 4.943 5.153
0.00468 0.01870 0.03039 0.59854 0.61023 2.11358 2.17905 2.91085 4.94260 5.15302

1.273E-06 1.141E-06 1.107E-06 1.024E-06 9.965E-07 9.624E-07 8.590E-07 7.501E-07 7.498E-07 6.935E-07
6.392 11.816 11.821 12.270 12.688 14.573 21.898 22.454 22.497 23.060
6.39218 11.81642 11.82109 12.26999 12.68850 14.57295 21.89801 22.45446 22.49654 23.06001

6.887E-07 6.477E-07 6.014E-07 5.752E-07 5.669E-07 5.243E-07 5.023E-07 4.876E-07 4.321E-07 3.909E-07
30.142 35.393 36.020 42.127 42.244 43.081 43.604 50.123 59.206 65.554
30.14191 35.39314 36.01974 42.12668 42.24358 43.08060 43.60432 50.12276 59.20601 65.55378

3.815E-07 3.774E-07 3.528E-07 3.479E-07 3.265E-07 3.038E-07 2.882E-07 2.872E-07 2.656E-07 2.453E-07
65.846 66.636 68.425 72.325 77.501 77.775 77.782 78.046 79.919 86.830
65.84602 66.63627 68.42488 72.32473 77.50114 77.77468 77.78169 78.04588 79.91865 86.82989

2.303E-07 2.179E-07 2.130E-07 1.975E-07 1.923E-07 1.779E-07 1.467E-07 1.445E-07 1.415E-07 1.336E-07
87.087 87.181 88.747 90.187 90.405 91.443 91.756 92.053 94.029 95.132
87.08707 87.18060 88.74708 90.18732 90.40475 91.44283 91.75613 92.05305 94.02868 95.13223

```
   1.236E-07   1.163E-07   1.104E-07   1.076E-07   9.605E-08   8.851E-08
8.032E-08   7.393E-08   6.505E-08   5.554E-08
      95.305      95.424      95.752      95.932      96.180      96.397
96.657      96.834      97.021      97.218
    95.30524    95.42445    95.75177    95.93178    96.17963    96.39706
96.65658    96.83427    97.02130    97.21769

   4.918E-08   4.731E-08   4.471E-08   4.375E-08   3.310E-08   2.491E-08
1.998E-08   1.819E-08   1.668E-08   1.253E-08
      97.480      97.529      97.575      97.592      98.309      99.002
99.481      99.518      99.785      99.988
    97.47955    97.52864    97.57539    97.59175    98.30953    99.00159
99.48087    99.51826    99.78481    99.98820

   1.009E-08
     100.000
    99.99989

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY


  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1     -11.07050 -14.90977  -0.98270
 18  2     -13.28753 -14.56986  -0.77679
 18  3     -13.96752 -14.50634  -0.69488
 18  4     -14.36856 -14.49657  -0.64558
 18  5     -14.75472 -14.55204  -0.50685
 18  6     -14.93482 -14.34015  -0.78743
 18  7     -15.22084 -13.96199  -1.12554
 18  8     -15.82832     NUMXQ(K)=  8
    3.295E-06              1.000              1.000
    2.126E-06              3.000              3.000
    1.688E-06              5.000              5.000
    1.273E-06             10.000             10.000
    1.052E-06             15.000             15.000
    9.042E-07             20.000             20.000
    8.006E-07             25.000             25.000
    7.213E-07             30.000             30.000
    6.548E-07             35.000             35.000
    5.975E-07             40.000             40.000
    5.487E-07             45.000             45.000
    5.061E-07             50.000             50.000
    4.667E-07             55.000             55.000
    4.298E-07             60.000             60.000
```

3.947E-07	65.000	65.000
3.671E-07	70.000	70.000
3.402E-07	75.000	75.000
3.051E-07	80.000	80.000
2.616E-07	85.000	85.000
2.041E-07	90.000	90.000
1.688E-06	5.0	5.00

K= 18 FIVEXQ(K)= 1.688E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-2.75582	0.29273	6.22377
2	-1.74889	4.01551	3.53187
3	-2.65187	0.40023	3.10925
4	-2.59901	0.46746	3.53945
5	-2.57624	0.49942	4.77421
6	-2.71373	0.33265	4.27580
7	-2.80169	0.25418	5.37250
8	-2.87545	0.20174	5.06821
9	-2.83570	0.22863	10.01358
10	-2.97215	0.14787	5.86067
11	-2.96019	0.15373	4.97718
12	-3.02310	0.12510	4.96786
13	-2.94909	0.15936	7.81606
14	-2.94599	0.16097	8.71109
15	-2.90921	0.18117	10.94163
16	-2.80535	0.25132	10.81685

K	HOURS(K)	TOTHRS
1	25.64318	25.64318
2	351.75880	377.40200
3	35.06043	412.46240
4	40.94961	453.41200
5	43.74879	497.16080
6	29.14045	526.30130
7	22.26652	548.56780
8	17.67224	566.24010
9	20.02812	586.26820
10	12.95317	599.22140
11	13.46695	612.68840
12	10.95913	623.64750
13	13.96037	637.60780
14	14.10082	651.70870
15	15.87087	667.57950
16	22.01537	689.59490

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.500E-06	1.626E-08	-0.5396	-13.0360			
					1	8.0	-14.15803
					2	16.0	-14.53204
					3	72.0	-15.34361
					4	624.0	-16.50882
2	1.353E-06	1.130E-08	-0.5707	-13.1180			
					1	8.0	-14.30464
					2	16.0	-14.70019
					3	72.0	-15.55851
					4	624.0	-16.79084
3	1.696E-06	1.226E-08	-0.5879	-12.8800			
					1	8.0	-14.10254

					2	16.0	-14.51005
					3	72.0	-15.39431
					4	624.0	-16.66389
4	1.818E-06	1.487E-08	-0.5732	-12.8204			
					1	8.0	-14.01233
					2	16.0	-14.40963
					3	72.0	-15.27176
					4	624.0	-16.50956
5	1.867E-06	1.773E-08	-0.5554	-12.8062			
					1	8.0	-13.96108
					2	16.0	-14.34605
					3	72.0	-15.18141
					4	624.0	-16.38078
6	1.572E-06	1.415E-08	-0.5617	-12.9741			
					1	8.0	-14.14220
					2	16.0	-14.53157
					3	72.0	-15.37648
					4	624.0	-16.58956
7	1.420E-06	1.431E-08	-0.5483	-13.0847			
					1	8.0	-14.22483
					2	16.0	-14.60485
					3	72.0	-15.42949
					4	624.0	-16.61345
8	1.282E-06	1.179E-08	-0.5592	-13.1792			
					1	8.0	-14.34201
					2	16.0	-14.72962
					3	72.0	-15.57069
					4	624.0	-16.77827
9	1.362E-06	1.927E-08	-0.5078	-13.1543			
					1	8.0	-14.21036
					2	16.0	-14.56237
					3	72.0	-15.32619
					4	624.0	-16.42286
10	1.156E-06	1.091E-08	-0.5561	-13.2849			
					1	8.0	-14.44127
					2	16.0	-14.82673
					3	72.0	-15.66314
					4	624.0	-16.86402
11	1.150E-06	8.979E-09	-0.5788	-13.2744			
					1	8.0	-14.47787
					2	16.0	-14.87903
					3	72.0	-15.74951
					4	624.0	-16.99932
12	1.058E-06	7.423E-09	-0.5915	-13.3489			
					1	8.0	-14.57889
					2	16.0	-14.98888
					3	72.0	-15.87854
					4	624.0	-17.15587
13	1.122E-06	1.166E-08	-0.5446	-13.3225			
					1	8.0	-14.45504
					2	16.0	-14.83256
					3	72.0	-15.65174
					4	624.0	-16.82790
14	1.047E-06	1.377E-08	-0.5165	-13.4120			
					1	8.0	-14.48599
					2	16.0	-14.84400
					3	72.0	-15.62084
					4	624.0	-16.73619
15	1.229E-06	1.857E-08	-0.4999	-13.2629			
					1	8.0	-14.30247

```
                                                  2   16.0   -14.64901
                                                  3   72.0   -15.40097
                                                  4  624.0   -16.48060
16 1.428E-06 2.403E-08   -0.4872  -13.1213
                                                  1    8.0   -14.13439
                                                  2   16.0   -14.47208
                                                  3   72.0   -15.20485
                                                  4  624.0   -16.25693
17 1.688E-06 2.403E-08   -0.5071  -12.9404
                                                  1    8.0   -13.99489
                                                  2   16.0   -14.34640
                                                  3   72.0   -15.10915
                                                  4  624.0   -16.20427
18 1.688E-06 2.403E-08   -0.5071  -12.9404
                                                  1    8.0   -13.99489
                                                  2   16.0   -14.34640
                                                  3   72.0   -15.10915
                                                  4  624.0   -16.20427
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

0-2 HR X/Q IS DOWNWIND DISTANCE EXCEEDED

SECTOR	DOWNWIND (METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS	1-4 DAYS	4-30 DAYS	ANNUAL AVERAGE	IN SECTOR	SECTOR
S	4000.	1.50E-06	7.10E-07	4.88E-07	2.17E-07	6.77E-08	1.63E-08	25.6	S
SSW	4000.	1.35E-06	6.13E-07	4.13E-07	1.75E-07	5.10E-08	1.13E-08	351.8	SSW
SW	4000.	1.70E-06	7.50E-07	4.99E-07	2.06E-07	5.79E-08	1.23E-08	35.1	SW
WSW	4000.	1.82E-06	8.21E-07	5.52E-07	2.33E-07	6.76E-08	1.49E-08	40.9	WSW
W	4000.	1.87E-06	8.65E-07	5.88E-07	2.55E-07	7.69E-08	1.77E-08	43.7	W
WNW	4000.	1.57E-06	7.21E-07	4.89E-07	2.10E-07	6.24E-08	1.41E-08	29.1	WNW
NW	4000.	1.42E-06	6.64E-07	4.54E-07	1.99E-07	6.09E-08	1.43E-08	22.3	NW
NNW	4000.	1.28E-06	5.91E-07	4.01E-07	1.73E-07	5.17E-08	1.18E-08	17.7	NNW
N	4000.	1.36E-06	6.74E-07	4.74E-07	2.21E-07	7.37E-08	1.93E-08	20.0	N
NNE	4000.	1.16E-06	5.35E-07	3.64E-07	1.58E-07	4.74E-08	1.09E-08	13.0	NNE
NE	4000.	1.15E-06	5.16E-07	3.45E-07	1.45E-07	4.14E-08	8.98E-09	13.5	NE
ENE	4000.	1.06E-06	4.66E-07	3.09E-07	1.27E-07	3.54E-08	7.42E-09	11.0	ENE
E	4000.	1.12E-06	5.28E-07	3.62E-07	1.59E-07	4.92E-08	1.17E-08	14.0	E
ESE	4000.	1.05E-06	5.11E-07	3.58E-07	1.64E-07	5.39E-08	1.38E-08	14.1	ESE
SE	4000.	1.23E-06	6.14E-07	4.35E-07	2.05E-07	6.96E-08	1.86E-08	15.9	SE
SSE	4000.	1.43E-06	7.27E-07	5.19E-07	2.49E-07	8.70E-08	2.40E-08	22.0	SSE
MAX X/Q		1.87E-06							
TOTAL HOURS AROUND SITE:		689.6							
SRP 2.3.4	4000.	1.69E-06	8.36E-07	5.88E-07					

2.74E-07	9.17E-08	2.40E-08		
SITE LIMIT		1.69E-06	8.36E-07	5.88E-07
2.74E-07	9.17E-08	2.40E-08		

THE FIVE-PERCENT-FOR-THE-ENTIRE-SITE X/Q IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

SECTOR	DOWNWIND DISTANCE (METERS)	FUMIGATION X/Q
S	4000.	1.17E-05
SSW	4000.	1.17E-05
SW	4000.	1.17E-05
WSW	4000.	1.17E-05
W	4000.	1.17E-05
WNW	4000.	1.17E-05
NW	4000.	1.17E-05
NNW	4000.	1.17E-05
N	4000.	1.17E-05
NNE	4000.	1.17E-05
NE	4000.	1.17E-05
ENE	4000.	1.17E-05
E	4000.	1.17E-05
ESE	4000.	1.17E-05
SE	4000.	1.17E-05
SSE	4000.	1.17E-05

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY.
CHECK THE REASONABLENESS OF THE ENVELOPES
COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY
FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

```
   1  1111
Peach Bottom                                    Stack Release
97.5 meters          10.1-96.3 meters

Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
   11    1
2584. 54.3131.4 97.5
    0    0    0    2    6    5    0
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   3.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   2.  10.  10.  15.   3.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   5.   6.  10.  23.  59.  25.   2.   0.   0.   1.   2.   0.   0.   0.
0.   1.
   1.   3.  11.  18.  43.  40.  10.   4.   2.   2.   2.   0.   1.   3.
0.   0.
   0.   6.  10.  11.  13.  17.   9.   0.   7.   4.   3.   3.   2.   3.
0.   5.
   0.   1.   2.  13.   8.   3.   9.   0.   4.   3.   0.   6.  13.   7.
3.   4.
   2.   4.   9.  11.   2.   3.   7.   0.   6.   2.   2.   1.  14.   5.
2.  14.
   1.   2.   0.   1.   0.   1.   0.   0.   0.   0.   0.   2.  10.   2.
0.   1.
   1.   0.   0.   0.   0.   1.   0.   0.   0.   0.   0.   1.   6.   5.
1.   1.
   0.   1.   1.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   1.   1.   9.   5.   0.   2.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   1.   7.   5.   8.  21.   5.   1.   0.   0.   0.   0.   0.   1.   0.
1.   0.
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PRINTOUT OF INPUT CARDS

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00000 00000 00000 00000 00000 00000   2     Peach Bottom
Stack Release
   3     97.5 meters         10.1-96.3 meters
   4
   5     Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316
ft Delta T          6         11 42771     1
   7          0.500  2584.000    54.300   131.400    97.500
   8       0.000  0.000  0.000  2.000  6.000  5.000  0.000
   9       0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS A
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22 0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05 1.13	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.55 1.67	0.000	0.000	0.000	0.000	0.007	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.007
2.05 2.21	0.000	0.005	0.023	0.023	0.035	0.007	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.094
3.05 3.28	0.012	0.014	0.023	0.054	0.138	0.058	0.005	0.000	0.000	0.002	0.005	0.000	0.000	0.000	0.000	0.002	0.313
4.05 4.36	0.002	0.007	0.026	0.042	0.101	0.094	0.023	0.009	0.005	0.005	0.005	0.000	0.002	0.007	0.000	0.000	0.327
5.05 5.44	0.000	0.014	0.023	0.026	0.030	0.040	0.021	0.000	0.016	0.009	0.007	0.007	0.005	0.007	0.000	0.012	0.217
6.05 6.52	0.000	0.002	0.005	0.030	0.019	0.007	0.021	0.000	0.009	0.007	0.000	0.014	0.030	0.016	0.007	0.009	0.178
8.05 8.67	0.005	0.009	0.021	0.026	0.005	0.007	0.016	0.000	0.014	0.005	0.005	0.002	0.033	0.012	0.005	0.033	0.196
10.00 10.77	0.002	0.005	0.000	0.002	0.000	0.002	0.000	0.000	0.000	0.000	0.000	0.005	0.023	0.005	0.000	0.002	0.047
24.59 26.49	0.002	0.000	0.000	0.000	0.000	0.002	0.000	0.000	0.000	0.000	0.000	0.002	0.014	0.012	0.002	0.002	0.037
TOTAL	0.02	0.06	0.12	0.20	0.33	0.22	0.09	0.01	0.04	0.03	0.02	0.03	0.11	0.06	0.01	0.06	1.42

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS B
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22 0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05 1.13	0.000	0.002	0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005
1.55 1.67	0.000	0.002	0.002	0.021	0.012	0.000	0.005	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.042
2.05 2.21	0.002	0.016	0.012	0.019	0.049	0.012	0.002	0.000	0.000	0.000	0.000	0.000	0.002	0.000	0.002	0.000	0.117
3.05 3.28	0.028	0.035	0.021	0.026	0.079	0.044	0.014	0.002	0.002	0.009	0.007	0.002	0.007	0.002	0.005	0.007	0.292

4.05	4.36	0.002	0.026	0.026	0.042	0.014	0.049	0.026	0.009
0.009	0.009	0.009	0.005	0.007	0.012	0.002	0.016	0.264	
5.05	5.44	0.005	0.012	0.009	0.005	0.012	0.021	0.030	0.012
0.040	0.021	0.014	0.012	0.030	0.005	0.002	0.028	0.257	
6.05	6.52	0.007	0.000	0.007	0.002	0.007	0.000	0.021	0.014
0.033	0.012	0.014	0.016	0.023	0.019	0.007	0.035	0.217	
8.05	8.67	0.019	0.005	0.002	0.002	0.000	0.005	0.012	0.007
0.051	0.012	0.007	0.030	0.049	0.035	0.014	0.047	0.297	
10.00	10.77	0.002	0.007	0.000	0.000	0.000	0.002	0.002	0.002
0.014	0.002	0.002	0.005	0.026	0.028	0.012	0.014	0.119	
24.59	26.49	0.000	0.000	0.002	0.000	0.000	0.000	0.000	0.000
0.002	0.002	0.000	0.002	0.016	0.023	0.000	0.000	0.049	
TOTAL		0.07	0.11	0.08	0.12	0.17	0.13	0.11	0.05
0.15	0.07	0.05	0.07	0.16	0.12	0.04	0.15	1.66	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS C
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
1.05	1.13	0.000	0.005	0.005	0.002	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.012	
1.55	1.67	0.000	0.007	0.023	0.033	0.002	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.065	
2.05	2.21	0.009	0.016	0.026	0.037	0.072	0.040	0.005	0.000
0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.002	0.210	
3.05	3.28	0.042	0.033	0.035	0.040	0.040	0.094	0.014	0.009
0.026	0.009	0.016	0.007	0.005	0.005	0.007	0.037	0.419	
4.05	4.36	0.061	0.028	0.019	0.026	0.023	0.049	0.061	0.030
0.047	0.030	0.021	0.009	0.037	0.014	0.019	0.082	0.556	
5.05	5.44	0.049	0.014	0.007	0.019	0.012	0.026	0.072	0.023
0.094	0.033	0.035	0.033	0.054	0.030	0.021	0.105	0.627	
6.05	6.52	0.019	0.019	0.000	0.007	0.005	0.007	0.035	0.028
0.087	0.040	0.026	0.035	0.026	0.049	0.042	0.101	0.524	
8.05	8.67	0.033	0.005	0.009	0.005	0.005	0.007	0.016	0.012
0.112	0.042	0.037	0.056	0.112	0.105	0.061	0.173	0.790	
10.00	10.77	0.009	0.002	0.000	0.000	0.002	0.005	0.000	0.002
0.023	0.000	0.007	0.007	0.068	0.063	0.051	0.033	0.274	
24.59	26.49	0.002	0.007	0.000	0.000	0.000	0.000	0.000	0.000
0.002	0.000	0.005	0.005	0.037	0.077	0.028	0.009	0.173	
TOTAL		0.22	0.14	0.12	0.17	0.16	0.23	0.20	0.11
0.39	0.15	0.15	0.15	0.34	0.34	0.23	0.54	3.65	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS D
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.24	0.000	0.000	0.001	0.001	0.001	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005	
1.05	1.13	0.042	0.042	0.065	0.061	0.065	0.047	0.033	0.030
0.028	0.014	0.021	0.014	0.019	0.044	0.019	0.023	0.568	
1.55	1.67	0.096	0.094	0.187	0.217	0.203	0.154	0.072	0.051
0.068	0.040	0.054	0.021	0.042	0.044	0.065	0.094	1.503	
2.05	2.21	0.157	0.124	0.182	0.231	0.304	0.180	0.126	0.117
0.091	0.072	0.065	0.056	0.070	0.044	0.094	0.117	2.032	

3.05	3.28	0.489	0.278	0.281	0.407	0.531	0.419	0.449	0.313
0.400	0.257	0.229	0.210	0.208	0.138	0.276	0.540	5.424	
4.05	4.36	0.505	0.409	0.292	0.437	0.503	0.393	0.659	0.547
0.748	0.475	0.299	0.187	0.255	0.269	0.435	0.912	7.325	
5.05	5.44	0.554	0.353	0.276	0.288	0.313	0.302	0.496	0.477
0.772	0.451	0.332	0.208	0.313	0.374	0.549	1.024	7.082	
6.05	6.52	0.545	0.231	0.187	0.126	0.241	0.238	0.302	0.344
0.641	0.309	0.187	0.241	0.332	0.458	0.776	0.949	6.107	
8.05	8.67	0.650	0.264	0.122	0.103	0.203	0.220	0.250	0.136
0.807	0.253	0.213	0.325	0.727	1.270	1.920	1.623	9.083	
10.00	10.77	0.161	0.065	0.030	0.026	0.056	0.056	0.035	0.023
0.224	0.049	0.035	0.047	0.493	0.917	1.143	0.538	3.900	
24.59	26.49	0.058	0.023	0.023	0.005	0.042	0.016	0.019	0.002
0.094	0.014	0.012	0.028	0.290	0.531	0.599	0.220	1.976	
TOTAL		3.26	1.88	1.65	1.90	2.46	2.03	2.44	2.04
3.87	1.93	1.45	1.34	2.75	4.09	5.88	6.04	45.00	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS E
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.26	0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.001
0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.000	0.014	
1.05	1.22	0.049	0.035	0.035	0.047	0.056	0.040	0.061	0.037
0.061	0.037	0.040	0.044	0.070	0.040	0.054	0.026	0.732	
1.55	1.80	0.091	0.068	0.049	0.096	0.084	0.101	0.082	0.101
0.103	0.094	0.098	0.082	0.056	0.044	0.037	0.054	1.239	
2.05	2.38	0.117	0.101	0.082	0.119	0.152	0.112	0.210	0.161
0.140	0.152	0.147	0.084	0.098	0.054	0.070	0.084	1.884	
3.05	3.54	0.320	0.215	0.213	0.323	0.393	0.264	0.435	0.411
0.615	0.458	0.383	0.260	0.238	0.192	0.262	0.269	5.251	
4.05	4.70	0.414	0.306	0.222	0.203	0.288	0.313	0.479	0.547
1.010	0.638	0.447	0.271	0.281	0.271	0.360	0.468	6.518	
5.05	5.86	0.421	0.185	0.161	0.094	0.159	0.271	0.355	0.456
0.989	0.601	0.386	0.348	0.451	0.376	0.596	0.498	6.348	
6.05	7.02	0.238	0.070	0.058	0.021	0.087	0.143	0.206	0.332
0.664	0.426	0.231	0.367	0.498	0.542	0.648	0.645	5.176	
8.05	9.35	0.257	0.061	0.040	0.014	0.091	0.108	0.161	0.241
0.858	0.351	0.372	0.414	0.975	1.031	1.153	0.786	6.911	
10.00	11.61	0.056	0.023	0.007	0.009	0.026	0.047	0.037	0.026
0.168	0.044	0.063	0.089	0.206	0.290	0.236	0.112	1.440	
24.59	28.54	0.019	0.002	0.014	0.002	0.049	0.007	0.021	0.002
0.021	0.005	0.005	0.005	0.023	0.028	0.023	0.033	0.260	
TOTAL		1.98	1.07	0.88	0.93	1.39	1.41	2.05	2.32
4.63	2.81	2.17	1.96	2.90	2.87	3.44	2.97	35.77	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS F
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.26	0.001	0.000	0.001	0.001	0.001	0.001	0.001	0.001
0.001	0.001	0.001	0.001	0.001	0.001	0.001	0.000	0.012	
1.05	1.22	0.037	0.016	0.030	0.023	0.026	0.028	0.023	0.028
0.028	0.028	0.035	0.035	0.033	0.030	0.030	0.016	0.449	
1.55	1.80	0.023	0.028	0.021	0.037	0.047	0.026	0.042	0.047
0.026	0.047	0.040	0.042	0.037	0.035	0.030	0.035	0.563	

2.05	2.38	0.061	0.030	0.033	0.023	0.030	0.042	0.063	0.079
0.077	0.068	0.063	0.084	0.051	0.042	0.042	0.047	0.837	
3.05	3.54	0.124	0.044	0.042	0.040	0.035	0.065	0.101	0.103
0.175	0.208	0.231	0.150	0.101	0.091	0.140	0.138	1.789	
4.05	4.70	0.145	0.044	0.016	0.023	0.033	0.042	0.087	0.075
0.208	0.168	0.245	0.180	0.206	0.115	0.161	0.124	1.873	
5.05	5.86	0.068	0.021	0.014	0.000	0.012	0.026	0.042	0.108
0.108	0.108	0.154	0.199	0.199	0.173	0.203	0.133	1.566	
6.05	7.02	0.028	0.009	0.007	0.000	0.000	0.005	0.016	0.035
0.094	0.044	0.072	0.133	0.199	0.129	0.157	0.110	1.038	
8.05	9.35	0.005	0.000	0.000	0.000	0.000	0.002	0.009	0.014
0.056	0.047	0.054	0.187	0.299	0.243	0.143	0.044	1.104	
10.00	11.61	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.002	0.007	0.002	0.049	0.054	0.054	0.000	0.012	0.180	
24.59	28.54	0.002	0.000	0.000	0.000	0.009	0.000	0.000	0.000
0.000	0.000	0.000	0.002	0.002	0.000	0.000	0.000	0.016	
TOTAL		0.49	0.19	0.16	0.15	0.19	0.24	0.38	0.49
0.77	0.73	0.90	1.06	1.18	0.91	0.91	0.66	9.43	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS G
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.26	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
1.05	1.22	0.016	0.021	0.014	0.014	0.019	0.005	0.002	0.016
0.019	0.019	0.002	0.023	0.019	0.019	0.016	0.023	0.248	
1.55	1.80	0.009	0.012	0.012	0.009	0.012	0.007	0.007	0.005
0.021	0.002	0.012	0.019	0.012	0.014	0.014	0.021	0.187	
2.05	2.38	0.009	0.021	0.012	0.009	0.012	0.002	0.026	0.009
0.019	0.021	0.014	0.019	0.016	0.019	0.026	0.028	0.262	
3.05	3.54	0.082	0.019	0.035	0.030	0.016	0.012	0.028	0.012
0.051	0.044	0.051	0.044	0.058	0.051	0.103	0.079	0.718	
4.05	4.70	0.040	0.007	0.012	0.009	0.007	0.002	0.019	0.007
0.014	0.037	0.084	0.058	0.065	0.061	0.124	0.145	0.692	
5.05	5.86	0.016	0.009	0.002	0.000	0.000	0.002	0.009	0.007
0.019	0.009	0.037	0.094	0.063	0.047	0.096	0.068	0.479	
6.05	7.02	0.000	0.000	0.000	0.000	0.000	0.000	0.005	0.002
0.002	0.012	0.023	0.054	0.087	0.023	0.040	0.019	0.267	
8.05	9.35	0.002	0.000	0.000	0.000	0.000	0.000	0.000	0.002
0.002	0.000	0.012	0.033	0.056	0.075	0.012	0.009	0.203	
10.00	11.61	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.005	0.002	0.005	0.000	0.000	0.012	
24.59	28.54	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
TOTAL		0.18	0.09	0.09	0.07	0.07	0.03	0.10	0.06
0.15	0.14	0.24	0.35	0.38	0.31	0.43	0.39	3.07	

WIND MEASURED AT 97.5 METERS.
WIND SPEED CORRECTED TO THE RELEASE HEIGHT OF 131.4 METERS.

OVERALL WIND DIRECTION FREQUENCY

WIND DIRECTION:	N	NNE	NE	ENE	E	ESE	SE	SSE
S SSW	SW	WSW	W	WNW	NW	NNW		
FREQUENCY:	6.2	3.5	3.1	3.5	4.8	4.3	5.4	5.1
10.0	5.9	5.0	5.0	7.8	8.7	10.9	10.8	

OVERALL WIND SPEED FREQUENCY AS MEASURED ON THE TOWER:
MAX.WIND SPEED (M/S): 0.224 1.051 1.551 2.052 3.049 4.050
5.052 6.048 8.051 10.000 24.587
WIND SPEED FREQUENCY: 0.03 2.01 3.61 5.44 14.21 17.56 16.58
13.51 18.59 5.97 2.51

BUILDING AND RELEASE CHARACTERISTICS:
RELEASE HEIGHT: 131.40 METERS
MIXING VOLUME COEFFICIENT: 0.50
BUILDING CROSS-SECTIONAL AREA: 2584.00 SQUARE METERS

BOUNDARY DISTANCES (METERS) FROM THE SOURCE FOR EACH DOWNWIND SECTOR:

DOWNWIND SECTOR	S	SSW	SW	WSW	W	WNW	NW	NNW	N	NNE	NE	ENE	E	ESE	SE	SSE
BOUNDARY 1	5000.	5000.	5000.	5000.	5000.	5000.	5000.	5000.	5000.	5000.	5000.	5000.	5000.	5000.	5000.	5000.
BOUNDARY 2	6000.	6000.	6000.	6000.	6000.	6000.	6000.	6000.	6000.	6000.	6000.	6000.	6000.	6000.	6000.	6000.

DISTANCES AND TERRAIN HEIGHTS (IN METERS) AS A FUNCTION OF THE DOWNWIND SECTOR:

SECTOR	S	SSW	SW	WSW	W	WNW	NW	NNW	N	NNE	NE	ENE	E	ESE	SE	SSE
DISTANCE	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.	500.
ELEVATION	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.

THE CONVERSION FACTOR APPLIED TO THE WIND SPEED CLASSES IS 0.447

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

WINDSPEEDS ADJUSTED TO 131.4 METERS.

PERCENT OF THE TIME A GIVEN WINDSPEED IS LOWER:

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.24	0.00
0.26	0.03
1.13	0.61
1.22	2.04
1.67	3.66
1.80	5.65
2.21	8.10
2.38	11.09
3.28	17.54
3.54	25.29
4.36	33.77
4.70	42.85
5.44	51.03
5.86	59.43
6.52	66.45
7.02	72.93
8.67	83.30
9.35	91.52
10.77	95.86
11.61	97.49
26.49	99.72
28.54	100.00

WINDSPEED (INTERPOLATED) (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.26	0.03
1.19	2.04
1.74	5.65
2.30	11.09
3.42	25.29
4.54	42.85
5.66	59.43
6.76	72.93
8.97	91.52
11.00	97.49
26.72	100.00

LOG-NORMAL INTERPOLATION PERCENTILES

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.87	1.00
1.37	3.00
1.66	5.00
2.20	10.00
2.63	15.00
3.02	20.00
3.40	25.00
3.72	30.00
4.03	35.00
4.35	40.00
4.67	45.00
4.99	50.00
5.33	55.00
5.70	60.00
6.07	65.00
6.49	70.00
6.92	75.00
7.36	80.00
8.05	85.00
8.67	90.00

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.19	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	4.4	0.04	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	8.7	0.08	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	10.8	0.04	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	3.655E-08
A	26.5	0.04	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.487E-08
B	2.2	0.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	0.45	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.08	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.11	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.30	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
C	2.2	0.15	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.051E-06
C	3.3	0.68	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.98	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.79	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.30	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07
C	8.7	0.53	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.678E-07

C	10.8	0.15	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.156E-07
C	26.5	0.04	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	8.769E-08
D	0.2	0.01	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.552E-05
D	1.1	0.68	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.302E-06
D	1.7	1.54	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	2.236E-06
D	2.2	2.52	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.690E-06
D	3.3	7.85	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.138E-06
D	4.4	8.11	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	8.564E-07
D	5.4	8.90	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	6.867E-07
D	6.5	8.75	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	5.735E-07
D	8.7	10.44	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	4.308E-07
D	10.8	2.59	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.469E-07
D	26.5	0.94	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.411E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.79	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.47	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	1.88	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	5.15	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	6.65	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	6.76	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	3.83	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	4.13	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	0.90	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.60	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.38	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.98	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.99	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.33	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.09	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.08	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	28.5	0.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.31	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.64	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	9.3	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05	8.835E-06	4.813E-06	3.302E-06	2.236E-06	1.880E-06	1.690E-06	1.273E-06	1.138E-06	1.051E-06
0.006	0.021	0.036	0.713	2.253	3.042	5.559	7.024	14.875	15.025
0.00035	0.00129	0.00226	0.04435	0.14021	0.18930	0.34595	0.43714	0.92578	0.93514

1.024E-06	9.624E-07	8.564E-07	7.072E-07	6.935E-07	6.867E-07	6.477E-07	5.735E-07	5.323E-07	5.243E-07
15.626	17.505	25.619	26.295	26.671	35.574	40.721	49.473	50.450	51.427
0.97255	1.08945	1.59446	1.63655	1.65993	2.21404	2.53435	3.07911	3.13990	3.20069

4.876E-07	4.308E-07	4.268E-07	3.909E-07	3.679E-07	3.565E-07	3.528E-07	3.469E-07	3.265E-07	2.678E-07
58.076	68.520	69.308	76.070	76.108	76.408	78.399	80.992	84.823	85.349
3.61452	4.26450	4.31359	4.73444	4.73678	4.75548	4.87940	5.04072	5.27920	5.31193

2.656E-07	2.476E-07	2.453E-07	2.156E-07	2.130E-07	1.975E-07	1.864E-07	1.779E-07	1.495E-07	1.411E-07
87.678	88.129	92.261	92.412	93.501	94.403	94.440	94.891	94.966	95.905
5.45689	5.48495	5.74213	5.75149	5.81929	5.87540	5.87774	5.90580	5.91047	5.96892

1.336E-07	1.248E-07	1.199E-07	9.605E-08	9.377E-08	9.025E-08	8.769E-08	8.032E-08	7.550E-08	6.505E-08
95.980	96.093	96.281	96.544	96.844	96.882	96.920	97.220	97.258	97.408
5.97360	5.98061	5.99230	6.00867	6.02737	6.02971	6.03205	6.05075	6.05309	6.06244

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   4.918E-08   4.540E-08   4.375E-08   3.655E-08   3.310E-08   2.491E-08
1.998E-08   1.487E-08   1.253E-08
      97.558      97.633      97.671      97.709      99.023      99.662
99.925      99.962     100.000
     6.07180     6.07647     6.07881     6.08115     6.16298     6.20273
6.21909     6.22143     6.22377

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.925
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.593
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   3.076
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   4.310
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.731
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   5.275
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.738
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   5.872

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  1  1     -11.07347 -16.56241  -1.22090
  1  2     -13.68648 -16.88232  -1.35671
  1  3     -13.97049 -17.08308  -1.45026
  1  4     -14.37153 -17.96010  -1.91932
  1  5     -14.66696 -18.06980  -1.98326
  1  6     -14.75472 -20.45429  -3.40979
  1  7     -14.93482 -26.06802  -6.87781
  1  8     -15.22084 -45.00341 -18.88406
  1  9     -15.43763     NUMXQ(K)=  9
    3.304E-06              0.062              1.000
    2.212E-06              0.187              3.000
    1.811E-06              0.311              5.000
    1.356E-06              0.622             10.000
    1.133E-06              0.934             15.000
    9.772E-07              1.245             20.000
    8.678E-07              1.556             25.000
    7.808E-07              1.867             30.000
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7.118E-07	2.178	35.000
6.558E-07	2.490	40.000
6.092E-07	2.801	45.000
5.683E-07	3.112	50.000
5.237E-07	3.423	55.000
4.854E-07	3.734	60.000
4.521E-07	4.045	65.000
4.229E-07	4.357	70.000
3.962E-07	4.668	75.000
3.599E-07	4.979	80.000
3.242E-07	5.290	85.000
2.670E-07	5.601	90.000
1.489E-06	0.5	8.03

ANNUAL AVERAGE = 1.63E-08

K= 1 FIVEXQ(K)= 1.489E-06 FIVEPR(K)= 8.034

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01	1.693E-02
0.376	1.428	5.034	12.976	65.311	97.183	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.13	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.781E-07
A	3.3	0.40	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	4.4	0.20	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.40	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.07	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.26	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	10.8	0.13	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	3.655E-08
B	1.1	0.07	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.187E-07
B	1.7	0.07	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	4.867E-07
B	2.2	0.46	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	0.99	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.73	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.33	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	8.7	0.13	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.20	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
C	1.1	0.13	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.052E-06
C	1.7	0.20	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.390E-06
C	2.2	0.46	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.051E-06

C	3.3	0.93	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	7.072E-07						
C	4.4	0.79	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	5.323E-07						
C	5.4	0.40	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	4.268E-07						
C	6.5	0.53	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	3.565E-07						
C	8.7	0.13	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.678E-07						
C	10.8	0.07	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.156E-07						
C	26.5	0.20	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	8.769E-08						
D	0.2	0.01	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.552E-05						
D	1.1	1.19	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.302E-06						
D	1.7	2.65	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	2.236E-06						
D	2.2	3.51	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.690E-06						
D	3.3	7.88	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.138E-06						
D	4.4	11.58	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	8.564E-07						
D	5.4	10.00	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	6.867E-07						
D	6.5	6.55	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	5.735E-07						
D	8.7	7.48	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	4.308E-07						
D	10.8	1.85	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.469E-07						
D	26.5	0.66	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.411E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.92	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.85	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	8.67	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.99	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.66	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						

```
   F         0.3       0.01    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.813E-06
   F         1.2       0.46    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.024E-06
   F         1.8       0.79    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.86    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.26    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       1.26    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F         5.9       0.60    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F         7.0       0.26    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07

   G         1.2       0.60    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.33    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.60    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.53    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.20    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 2.052E-06 1.880E-06 1.690E-06 1.390E-06 1.273E-06
0.010 0.029 0.041 1.232 3.880 4.013 5.006 8.514 8.713 10.633
0.00035 0.00102 0.00144 0.04353 0.13705 0.14173 0.17680 0.30071 0.30773 0.37553

1.138E-06 1.051E-06 1.024E-06 9.624E-07 8.564E-07 7.187E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07
18.510 18.974 19.437 22.283 33.868 33.934 34.861 35.655 45.651 51.742
0.65376 0.67012 0.68649 0.78702 1.19618 1.19852 1.23125 1.25931 1.61235 1.82745

5.735E-07 5.323E-07 5.243E-07 4.876E-07 4.867E-07 4.308E-07 4.268E-07 3.909E-07 3.679E-07 3.565E-07
58.295 59.090 59.950 68.622 68.688 76.169 76.566 81.796 82.259 82.789
2.05891 2.08697 2.11736 2.42365 2.42599 2.69018 2.70421 2.88892 2.90528 2.92399

3.528E-07 3.469E-07 3.265E-07 2.678E-07 2.656E-07 2.476E-07 2.453E-07 2.156E-07 2.130E-07 1.975E-07
84.046 85.900 87.886 88.018 89.276 90.269 91.990 92.056 92.652 93.314
2.96841 3.03387 3.10401 3.10869 3.15311 3.18818 3.24897 3.25131 3.27235 3.29573

1.864E-07 1.781E-07 1.779E-07 1.495E-07 1.411E-07 1.199E-07 9.605E-08 9.377E-08 9.025E-08 8.769E-08
94.042 94.175 94.439 94.770 95.432 95.830 96.425 96.558 96.756 96.955
3.32145 3.32613 3.33548 3.34717 3.37055 3.38458 3.40562 3.41030 3.41731 3.42432

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   8.032E-08   7.550E-08   7.236E-08   6.505E-08   6.043E-08   4.918E-08
4.540E-08   3.655E-08   3.310E-08   2.491E-08
      97.021      97.220      97.617      97.948      98.014      98.610
98.875      99.007      99.537      99.735
     3.42666     3.43368     3.44771     3.45940     3.46173     3.48278
3.49213     3.49680     3.51551     3.52252

   1.998E-08
     100.000
     3.53187

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME     INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.300
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.195
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.825
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.421
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.688
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.886
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.031
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.101

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1     -11.07347 -16.77422  -1.26802
  2  2     -13.29050 -17.11419  -1.39176
  2  3     -13.97049 -17.73482  -1.66652
  2  4     -14.24977 -19.30111  -2.41551
  2  5     -14.53378 -19.98712  -2.76310
  2  6     -14.65754 -20.69549  -3.13035
  2  7     -14.75472 -25.29318  -5.55299
  2  8     -14.87434 -26.09041  -5.97790
  2  9     -14.93482     NUMXQ(K)=  9
    3.805E-06              0.035              1.000
    2.556E-06              0.106              3.000
    2.098E-06              0.177              5.000
    1.570E-06              0.353             10.000
```

1.296E-06	0.530	15.000
1.124E-06	0.706	20.000
1.004E-06	0.883	25.000
9.133E-07	1.060	30.000
8.386E-07	1.236	35.000
7.690E-07	1.413	40.000
7.115E-07	1.589	45.000
6.629E-07	1.766	50.000
6.098E-07	1.943	55.000
5.590E-07	2.119	60.000
5.154E-07	2.296	65.000
4.763E-07	2.472	70.000
4.389E-07	2.649	75.000
4.030E-07	2.825	80.000
3.559E-07	3.002	85.000
1.332E-06	0.5	14.16

ANNUAL AVERAGE = 1.11E-08

K= 2 FIVEXQ(K)= 1.332E-06 FIVEPR(K)=14.157

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 9.789E-01 8.841E-01 3.613E-01 3.371E-01 2.081E-01
1.693E-02
1.589 4.568 8.407 13.914 67.279 97.484
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.75	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.781E-07
A	3.3	0.75	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	4.4	0.83	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.75	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.15	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.68	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
B	1.1	0.08	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.187E-07
B	1.7	0.08	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	4.867E-07
B	2.2	0.38	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	0.68	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.83	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.30	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.23	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.08	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	26.5	0.08	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.071E-08
C	1.1	0.15	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.052E-06
C	1.7	0.75	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.390E-06
C	2.2	0.83	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.051E-06

C	3.3	1.13	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	7.072E-07						
C	4.4	0.60	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	5.323E-07						
C	5.4	0.23	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	4.268E-07						
C	8.7	0.30	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.678E-07						
D	0.2	0.02	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.552E-05						
D	1.1	2.11	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.302E-06						
D	1.7	6.02	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	2.236E-06						
D	2.2	5.87	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.690E-06						
D	3.3	9.02	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.138E-06						
D	4.4	9.40	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	8.564E-07						
D	5.4	8.87	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	6.867E-07						
D	6.5	6.02	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	5.735E-07						
D	8.7	3.91	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	4.308E-07						
D	10.8	0.98	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.469E-07						
D	26.5	0.75	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.411E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.58	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.84	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.14	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.19	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.88	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.28	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.45	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.03	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.68	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       1.05    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.35    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       0.53    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F         5.9       0.45    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F         7.0       0.23    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07

   G         1.2       0.45    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.38    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.38    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       1.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.38    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.08    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05	8.835E-06	4.813E-06	3.302E-06	2.236E-06	2.052E-06	1.880E-06	1.690E-06	1.390E-06	1.273E-06	
0.017	0.039	0.064	2.170	8.186	8.336	9.464	15.329	16.081	17.660	
0.00054	0.00121	0.00200	0.06747	0.25451	0.25919	0.29426	0.47662	0.50000	0.54910	

1.138E-06	1.051E-06	1.024E-06	9.624E-07	8.564E-07	7.187E-07	7.072E-07	6.935E-07	6.867E-07	6.477E-07	
26.684	27.511	28.489	31.120	40.520	40.595	41.723	42.400	51.273	58.116	
0.82967	0.85538	0.88578	0.96761	1.25986	1.26220	1.29727	1.31832	1.59420	1.80696	

5.735E-07	5.323E-07	5.243E-07	4.876E-07	4.867E-07	4.308E-07	4.268E-07	3.909E-07	3.679E-07	3.528E-07	
64.131	64.733	65.786	72.929	73.005	76.915	77.140	82.329	82.705	84.058	
1.99401	2.01271	2.04544	2.26756	2.26989	2.39147	2.39849	2.55981	2.57150	2.61359	

3.469E-07	3.265E-07	2.678E-07	2.656E-07	2.476E-07	2.453E-07	2.130E-07	1.975E-07	1.864E-07	1.781E-07	
85.036	86.916	87.217	87.743	88.420	89.698	90.149	90.375	91.202	91.954	
2.64398	2.70243	2.71178	2.72815	2.74919	2.78894	2.80297	2.80998	2.83570	2.85908	

1.779E-07	1.495E-07	1.411E-07	1.248E-07	1.199E-07	9.605E-08	9.377E-08	9.025E-08	8.032E-08	7.236E-08	
92.180	92.480	93.232	93.458	94.210	94.661	94.736	95.563	96.015	96.767	
2.86609	2.87544	2.89882	2.90584	2.92922	2.94325	2.94559	2.97130	2.98533	3.00871	

```
   6.505E-08   6.043E-08   4.918E-08   4.540E-08   3.310E-08   3.071E-08
2.491E-08   1.998E-08
      97.143      97.293      97.669      98.346      99.474      99.549
99.925     100.000
     3.02040     3.02508     3.03677     3.05781     3.09288     3.09522
3.10691     3.10925

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.254
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.476
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.258
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.805
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.992
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.265
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.268
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.557
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   2.700
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(11)=   2.786

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  3  1     -11.07347 -16.40457  -1.21137
  3  2     -13.01077 -16.76255  -1.33914
  3  3     -13.29050 -18.27168  -1.92120
  3  4     -13.97049 -18.34275  -1.95295
  3  5     -14.24977 -20.57043  -3.01587
  3  6     -14.37153 -20.59260  -3.02666
  3  7     -14.53378 -22.95879  -4.20868
  3  8     -14.53561 -23.11327  -4.28586
  3  9     -14.75472 -29.77326  -7.70078
  3 10     -14.93482 -55.19625 -20.89470
  3 11     -15.22084     NUMXQ(K)= 11
    4.741E-06              0.031              1.000
    3.253E-06              0.093              3.000
```

2.699E-06	0.155	5.000
2.049E-06	0.311	10.000
1.707E-06	0.466	15.000
1.414E-06	0.622	20.000
1.213E-06	0.777	25.000
1.066E-06	0.933	30.000
9.539E-07	1.088	35.000
8.647E-07	1.244	40.000
7.908E-07	1.399	45.000
7.290E-07	1.555	50.000
6.766E-07	1.710	55.000
6.228E-07	1.866	60.000
5.639E-07	2.021	65.000
5.137E-07	2.176	70.000
4.635E-07	2.332	75.000
4.121E-07	2.487	80.000
3.517E-07	2.643	85.000
1.638E-06	0.5	16.08

ANNUAL AVERAGE = 1.20E-08

K= 3 FIVEXQ(K)= 1.638E-06 FIVEPR(K)=16.081

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01	1.693E-02
3.910	6.617	10.603	15.892	68.847	97.218	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.66	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.781E-07
A	3.3	1.52	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	4.4	1.19	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.73	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.86	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.73	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	10.8	0.07	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	3.655E-08
B	1.7	0.59	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	4.867E-07
B	2.2	0.53	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	0.73	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	1.19	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.13	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.07	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.07	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
C	1.1	0.07	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.052E-06
C	1.7	0.92	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.390E-06
C	2.2	1.06	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.051E-06
C	3.3	1.12	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07

C	4.4	0.73	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	5.323E-07						
C	5.4	0.53	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	4.268E-07						
C	6.5	0.20	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	3.565E-07						
C	8.7	0.13	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.678E-07						
D	0.2	0.01	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.552E-05						
D	1.1	1.72	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.302E-06						
D	1.7	6.14	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	2.236E-06						
D	2.2	6.54	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.690E-06						
D	3.3	11.49	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.138E-06						
D	4.4	12.35	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	8.564E-07						
D	5.4	8.12	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	6.867E-07						
D	6.5	3.57	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	5.735E-07						
D	8.7	2.91	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	4.308E-07						
D	10.8	0.73	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.469E-07						
D	26.5	0.13	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.411E-07						
E	0.3	0.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.71	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	9.12	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	5.75	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	2.64	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	0.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	0.40	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	1.06	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.66	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
G	1.2	0.40	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 2.052E-06 1.880E-06 1.690E-06 1.390E-06 1.273E-06
0.014 0.039 0.057 1.774 7.917 7.983 9.305 15.844 16.769 19.477
0.00050 0.00140 0.00201 0.06279 0.28023 0.28257 0.32933 0.56080 0.59353 0.68939

1.138E-06 1.051E-06 1.024E-06 9.624E-07 8.564E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07 5.735E-07
30.971 32.028 32.689 36.057 48.410 49.533 50.590 58.715 67.831 71.398
1.09620 1.13361 1.15699 1.27623 1.71345 1.75319 1.79060 2.07818 2.40083 2.52708

5.323E-07 5.243E-07 4.876E-07 4.867E-07 4.308E-07 4.268E-07 3.909E-07 3.679E-07 3.565E-07 3.528E-07
72.124 72.785 78.532 79.126 82.033 82.561 85.203 85.732 85.930 87.053
2.55280 2.57618 2.77959 2.80063 2.90350 2.92221 3.01573 3.03443 3.04145 3.08119

3.469E-07 3.265E-07 2.678E-07 2.656E-07 2.476E-07 2.453E-07 1.975E-07 1.864E-07 1.781E-07 1.495E-07
87.780 88.374 88.506 89.167 89.893 90.290 90.554 91.743 92.404 92.536
3.10691 3.12796 3.13263 3.15601 3.18173 3.19576 3.20511 3.24720 3.27058 3.27525

1.411E-07 1.248E-07 1.199E-07 9.605E-08 9.377E-08 9.025E-08 8.032E-08 7.236E-08 6.505E-08 6.043E-08
92.668 92.734 94.253 94.649 94.715 95.904 95.971 96.697 96.961 97.820
3.27993 3.28227 3.33604 3.35007 3.35241 3.39449 3.39683 3.42255 3.43190 3.46229

4.918E-08	4.540E-08	3.655E-08	3.310E-08	2.491E-08
98.084	98.811	98.877	99.736	100.000
3.47165	3.49736	3.49970	3.53010	3.53945

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

```
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.280
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.560
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.095
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.712
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.398
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.798
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.013
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.104
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   3.125
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
4	1	-11.07347	-16.27046	-1.17660
4	2	-13.01077	-16.32094	-1.19482
4	3	-13.29050	-17.40335	-1.62159
4	4	-13.68648	-17.41098	-1.62492
4	5	-13.97049	-18.20403	-1.99947
4	6	-14.24977	-22.77685	-4.31171
4	7	-14.53561	-27.43897	-6.75087
4	8	-14.75472	-31.80591	-9.07506
4	9	-14.87434	-52.53561	-20.18587
4	10	-14.93482	NUMXQ(K)= 10	

4.618E-06	0.035	1.000
3.191E-06	0.106	3.000
2.657E-06	0.177	5.000
2.040E-06	0.354	10.000
1.730E-06	0.531	15.000
1.478E-06	0.708	20.000
1.296E-06	0.885	25.000
1.160E-06	1.062	30.000

1.054E-06	1.239	35.000
9.690E-07	1.416	40.000
8.982E-07	1.593	45.000
8.343E-07	1.770	50.000
7.718E-07	1.947	55.000
7.182E-07	2.124	60.000
6.716E-07	2.301	65.000
6.113E-07	2.478	70.000
5.380E-07	2.655	75.000
4.712E-07	2.832	80.000
3.937E-07	3.009	85.000
1.773E-06	0.5	14.13

ANNUAL AVERAGE = 1.45E-08

K= 4 FIVEXQ(K)= 1.773E-06 FIVEPR(K)=14.126

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01
1.693E-02					
5.747	9.050	13.806	17.985	71.703	97.952
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.7	0.15	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	2.356E-07
A	2.2	0.73	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.781E-07
A	3.3	2.89	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	4.4	2.11	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.64	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.39	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.10	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
B	1.7	0.24	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	4.867E-07
B	2.2	1.03	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	1.67	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.29	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.24	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.15	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
C	1.7	0.05	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.390E-06
C	2.2	1.52	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.051E-06
C	3.3	0.83	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.49	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.24	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07

AT 131.4 METERS
CA=1292.SQ.METERS

C	6.5	0.10	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	3.565E-07						
C	8.7	0.10	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.678E-07						
C	10.8	0.05	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.156E-07						
D	0.2	0.01	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.552E-05						
D	1.1	1.37	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.302E-06						
D	1.7	4.26	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	2.236E-06						
D	2.2	6.37	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.690E-06						
D	3.3	11.12	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.138E-06						
D	4.4	10.53	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	8.564E-07						
D	5.4	6.56	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	6.867E-07						
D	6.5	5.04	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	5.735E-07						
D	8.7	4.26	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	4.308E-07						
D	10.8	1.18	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.469E-07						
D	26.5	0.88	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.411E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.76	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	8.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	6.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	3.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.81	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.91	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.54	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	1.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.54	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.64	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       0.73     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.69     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.24     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F       28.5       0.20     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.39     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.34     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05	8.835E-06	4.813E-06	3.302E-06	2.236E-06	1.880E-06	1.690E-06	1.390E-06	1.273E-06	1.138E-06
0.011	0.034	0.048	1.419	5.680	6.855	13.221	13.270	15.033	26.150
0.00054	0.00161	0.00228	0.06775	0.27116	0.32727	0.63122	0.63355	0.71772	1.24846

1.051E-06	1.024E-06	9.624E-07	8.564E-07	7.072E-07	6.935E-07	6.867E-07	6.477E-07	5.735E-07	5.323E-07
27.668	28.207	31.390	41.919	42.752	43.731	50.293	58.521	63.565	64.054
1.32093	1.34665	1.49863	2.00130	2.04105	2.08781	2.40111	2.79390	3.03471	3.05809

5.243E-07	4.876E-07	4.867E-07	4.308E-07	4.268E-07	3.909E-07	3.679E-07	3.565E-07	3.528E-07	3.469E-07
64.691	70.715	70.960	75.220	75.465	78.795	79.823	79.921	80.656	81.831
3.08849	3.37607	3.38776	3.59116	3.60285	3.76184	3.81094	3.81562	3.85069	3.90680

3.265E-07	2.678E-07	2.656E-07	2.476E-07	2.453E-07	2.356E-07	2.156E-07	2.130E-07	1.975E-07	1.864E-07
83.643	83.741	84.427	86.092	88.002	88.149	88.198	88.443	88.981	89.275
3.99331	3.99798	4.03071	4.11021	4.20139	4.20841	4.21074	4.22243	4.24815	4.26218

1.781E-07	1.495E-07	1.411E-07	1.248E-07	1.199E-07	9.605E-08	9.025E-08	8.032E-08	7.236E-08	6.505E-08
90.010	90.255	91.136	91.283	94.172	94.564	96.670	97.698	98.335	98.580
4.29725	4.30894	4.35102	4.35804	4.49598	4.51469	4.61522	4.66432	4.69472	4.70641

6.043E-08	4.918E-08	4.540E-08	4.375E-08	3.310E-08	2.491E-08
98.972	99.216	99.314	99.510	99.853	100.000
4.72511	4.73680	4.74148	4.75083	4.76719	4.77421

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.630
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.999
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.791
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.385
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.759
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.990
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.198
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
5	1	-11.07347	-16.19175	-1.16301
5	2	-13.29050	-17.13967	-1.54299
5	3	-13.97049	-18.02418	-1.97364
5	4	-14.24977	-20.65293	-3.34821
5	5	-14.53561	-22.94116	-4.60064
5	6	-14.75472	-26.38270	-6.53472
5	7	-14.93482	-36.08489	-12.07296
5	8	-15.22084	NUMXQ(K)=	8

4.332E-06	0.048	1.000
2.981E-06	0.143	3.000
2.475E-06	0.239	5.000
1.894E-06	0.477	10.000
1.577E-06	0.716	15.000
1.340E-06	0.955	20.000
1.176E-06	1.194	25.000
1.055E-06	1.432	30.000
9.593E-07	1.671	35.000
8.823E-07	1.910	40.000
8.081E-07	2.148	45.000
7.403E-07	2.387	50.000
6.831E-07	2.626	55.000
6.245E-07	2.865	60.000

5.550E-07	3.103	65.000
4.968E-07	3.342	70.000
4.337E-07	3.581	75.000
3.735E-07	3.819	80.000
2.983E-07	4.058	85.000
1.859E-06	0.5	10.47

ANNUAL AVERAGE = 1.73E-08

K= 5 FIVEXQ(K)= 1.859E-06 FIVEPR(K)=10.473

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01
1.693E-02					
7.003	10.627	14.006	18.036	69.615	98.629
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.16	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.781E-07
A	3.3	1.37	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	4.4	2.19	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.93	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.16	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.16	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	10.8	0.05	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	3.655E-08
A	26.5	0.05	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.487E-08
B	2.2	0.27	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	1.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	1.15	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.49	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	8.7	0.11	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.05	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
C	2.2	0.93	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.051E-06
C	3.3	2.19	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	1.15	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.60	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07

C	6.5	0.16	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	3.565E-07						
C	8.7	0.16	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.678E-07						
C	10.8	0.11	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.156E-07						
D	0.2	0.01	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.552E-05						
D	1.1	1.09	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.302E-06						
D	1.7	3.61	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	2.236E-06						
D	2.2	4.21	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.690E-06						
D	3.3	9.79	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.138E-06						
D	4.4	9.19	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	8.564E-07						
D	5.4	7.05	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	6.867E-07						
D	6.5	5.58	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	5.735E-07						
D	8.7	5.14	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	4.308E-07						
D	10.8	1.31	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.469E-07						
D	26.5	0.38	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.411E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.93	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.35	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.62	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	6.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	3.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	2.52	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	1.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.16	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.60	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.98	90000.	0.	131.	1000.0		

```
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       1.53    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.98    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.60    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.11    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.05    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G        1.2       0.11    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.16    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.27    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 1.880E-06 1.690E-06 1.273E-06 1.138E-06 1.051E-06
0.009 0.027 0.044 1.138 4.746 5.676 9.886 12.238 22.026 22.955
0.00038 0.00115 0.00188 0.04864 0.20295 0.24269 0.42272 0.52326 0.94177 0.98151

1.024E-06 9.624E-07 8.564E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07 5.735E-07 5.323E-07 5.243E-07
23.611 26.236 35.422 37.609 38.211 45.265 51.444 57.021 58.169 59.154
1.00957 1.12179 1.51458 1.60811 1.63382 1.93543 2.19963 2.43811 2.48721 2.52929

4.876E-07 4.308E-07 4.268E-07 3.909E-07 3.679E-07 3.565E-07 3.528E-07 3.469E-07 3.265E-07 2.678E-07
66.481 71.621 72.222 78.565 78.839 79.003 80.534 81.846 85.182 85.346
2.84259 3.06236 3.08808 3.35929 3.37098 3.37800 3.44346 3.49957 3.64219 3.64921

2.656E-07 2.476E-07 2.453E-07 2.156E-07 2.130E-07 1.975E-07 1.864E-07 1.781E-07 1.779E-07 1.495E-07
86.330 87.369 89.884 89.993 90.595 91.689 92.837 93.001 93.110 93.602
3.69129 3.73572 3.84327 3.84794 3.87366 3.92042 3.96952 3.97653 3.98121 4.00225

1.411E-07 1.336E-07 1.199E-07 9.605E-08 9.377E-08 9.025E-08 8.032E-08 7.550E-08 7.236E-08 6.505E-08
93.985 94.040 95.407 95.516 95.626 97.813 97.977 98.032 98.961 99.125
4.01862 4.02096 4.07941 4.08408 4.08876 4.18228 4.18929 4.19163 4.23138 4.23839

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   6.043E-08   4.918E-08   4.540E-08   3.655E-08   3.310E-08   2.491E-08
1.998E-08   1.487E-08
      99.289      99.344      99.508      99.563      99.836      99.891
99.945     100.000
     4.24541     4.24774     4.25476     4.25710     4.26879     4.27112
4.27346     4.27580

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.422
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.941
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.513
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.197
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.840
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.356
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.639
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.840
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   3.966

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  6  1     -11.07347 -16.46465  -1.20518
  6  2     -13.29050 -16.95566  -1.39161
  6  3     -13.68648 -17.34214  -1.55612
  6  4     -13.97049 -17.94898  -1.83620
  6  5     -14.24977 -19.46427  -2.58835
  6  6     -14.53378 -20.21836  -2.98423
  6  7     -14.75472 -23.75691  -4.91698
  6  8     -14.93482 -35.75982 -11.60678
  6  9     -15.22084 -47.73016 -18.37135
  6 10     -15.49533     NUMXQ(K)= 10
    3.934E-06              0.043              1.000
    2.679E-06              0.128              3.000
    2.213E-06              0.214              5.000
    1.681E-06              0.428             10.000
    1.382E-06              0.641             15.000
```

1.196E-06	0.855	20.000
1.057E-06	1.069	25.000
9.478E-07	1.283	30.000
8.628E-07	1.497	35.000
7.833E-07	1.710	40.000
7.173E-07	1.924	45.000
6.621E-07	2.138	50.000
6.022E-07	2.352	55.000
5.470E-07	2.565	60.000
5.002E-07	2.779	65.000
4.557E-07	2.993	70.000
4.160E-07	3.207	75.000
3.756E-07	3.421	80.000
3.281E-07	3.634	85.000
2.426E-07	3.848	90.000
1.560E-06	0.5	11.69

ANNUAL AVERAGE = 1.39E-08

K= 6 FIVEXQ(K)= 1.560E-06 FIVEPR(K)=11.694

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01	1.693E-02
5.085	8.202	13.506	19.046	66.408	99.289	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.09	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	4.4	0.44	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.39	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.39	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.30	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
B	1.7	0.09	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	4.867E-07
B	2.2	0.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	0.26	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.48	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.57	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.39	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.22	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
C	2.2	0.09	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.051E-06
C	3.3	0.26	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	1.13	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	1.35	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.65	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07

C	8.7	0.30	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.678E-07
D	0.2	0.01	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.552E-05
D	1.1	0.61	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.302E-06
D	1.7	1.35	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	2.236E-06
D	2.2	2.35	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.690E-06
D	3.3	8.36	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.138E-06
D	4.4	12.27	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	8.564E-07
D	5.4	9.23	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	6.867E-07
D	6.5	5.61	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	5.735E-07
D	8.7	4.66	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	4.308E-07
D	10.8	0.65	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.469E-07
D	26.5	0.35	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.411E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.52	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	3.92	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	8.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	8.92	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	6.61	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	3.83	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	3.00	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	0.70	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.39	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.44	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.78	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	1.17	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.87	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	1.61	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.30	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.52	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.35	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
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THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05	8.835E-06	4.813E-06	3.302E-06	2.236E-06	1.880E-06	1.690E-06	1.273E-06	1.138E-06	1.051E-06	
0.005	0.027	0.038	0.647	1.996	3.128	5.478	7.001	15.357	15.444	
0.00027	0.00143	0.00204	0.03478	0.10726	0.16804	0.29430	0.37613	0.82503	0.82971	

1.024E-06	9.624E-07	8.564E-07	7.072E-07	6.935E-07	6.867E-07	6.477E-07	5.735E-07	5.323E-07	5.243E-07	
15.879	19.795	32.068	32.329	33.112	42.338	50.432	56.046	57.178	58.353	
0.85309	1.06351	1.72284	1.73686	1.77895	2.27461	2.70949	3.01109	3.07188	3.13501	

4.876E-07	4.867E-07	4.308E-07	4.268E-07	3.909E-07	3.679E-07	3.565E-07	3.528E-07	3.469E-07	3.265E-07	
67.274	67.361	72.018	73.367	79.982	80.025	80.678	82.549	83.202	87.032	
3.61430	3.61898	3.86915	3.94163	4.29701	4.29935	4.33442	4.43495	4.47002	4.67577	

2.678E-07	2.656E-07	2.476E-07	2.453E-07	2.130E-07	1.975E-07	1.864E-07	1.779E-07	1.495E-07	1.411E-07	
87.336	88.946	89.207	92.210	92.994	93.690	94.169	94.473	95.039	95.387	
4.69214	4.77864	4.79267	4.95400	4.99608	5.03349	5.05921	5.07557	5.10597	5.12467	

1.336E-07	1.248E-07	1.199E-07	9.605E-08	9.377E-08	9.025E-08	8.032E-08	7.550E-08	7.236E-08	6.505E-08	
95.561	95.953	96.040	96.083	96.301	96.736	97.128	97.171	97.563	97.694	
5.13403	5.15507	5.15974	5.16208	5.17377	5.19715	5.21819	5.22053	5.24158	5.24859	

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   6.043E-08   4.918E-08   4.540E-08   3.310E-08   2.491E-08   1.998E-08
1.668E-08
      98.085      98.564      98.869      99.391      99.739      99.913
100.000
     5.26963     5.29535     5.31172     5.33977     5.35848     5.36783
5.37251

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
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 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.824
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.721
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.707
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.611
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.294
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.672
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.950

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  7  1     -11.07347 -16.59979  -1.21485
  7  2     -13.68648 -16.09352  -1.00374
  7  3     -13.97049 -17.08967  -1.47470
  7  4     -14.24977 -18.52169  -2.21832
  7  5     -14.53378 -19.49106  -2.75754
  7  6     -14.75472 -22.47162  -4.49286
  7  7     -14.93482 -32.18311 -10.28209
  7  8     -15.22084     NUMXQ(K)=  8
    3.283E-06              0.054              1.000
    2.213E-06              0.161              3.000
    1.819E-06              0.269              5.000
    1.370E-06              0.537             10.000
    1.150E-06              0.806             15.000
    1.031E-06              1.075             20.000
    9.457E-07              1.343             25.000
    8.798E-07              1.612             30.000
    8.127E-07              1.880             35.000
    7.491E-07              2.149             40.000
    6.962E-07              2.418             45.000
```

6.513E-07	2.686	50.000
5.956E-07	2.955	55.000
5.467E-07	3.224	60.000
5.048E-07	3.492	65.000
4.638E-07	3.761	70.000
4.248E-07	4.029	75.000
3.907E-07	4.298	80.000
3.435E-07	4.567	85.000
2.767E-07	4.835	90.000
1.413E-06	0.5	9.31

ANNUAL AVERAGE = 1.45E-08

K= 7 FIVEXQ(K)= 1.413E-06 FIVEPR(K)= 9.307

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01	1.693E-02
1.610	3.699	7.485	14.634	60.072	98.216	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.18	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
B	3.3	0.05	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.18	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.23	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.28	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.14	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.05	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
C	3.3	0.18	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.60	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.46	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.55	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07
C	8.7	0.23	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.678E-07
C	10.8	0.05	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.156E-07
D	0.2	0.00	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.552E-05
D	1.1	0.60	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.302E-06
D	1.7	1.01	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	2.236E-06
D	2.2	2.31	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.690E-06
D	3.3	6.18	5000.	0.	131.	322.2					

89.1	0.0	0.000E+00	0.000E+00	1.138E-06		
D	4.4	10.79	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	8.564E-07		
D	5.4	9.41	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	6.867E-07		
D	6.5	6.78	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	5.735E-07		
D	8.7	2.68	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	4.308E-07		
D	10.8	0.46	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	3.469E-07		
D	26.5	0.05	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.411E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.74	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.55	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.92	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	2.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		

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   G         2.4       0.18    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.23    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 1.880E-06 1.690E-06 1.273E-06 1.138E-06 1.024E-06
0.005 0.019 0.034 0.633 1.648 2.386 4.693 6.676 12.858 13.412
0.00025 0.00097 0.00170 0.03209 0.08353 0.12094 0.23784 0.33837 0.65167 0.67973

9.624E-07 8.564E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07 5.735E-07 5.323E-07 5.243E-07 4.876E-07
16.595 27.389 27.574 28.497 37.907 46.026 52.808 53.407 54.976 65.771
0.84105 1.38815 1.39750 1.44426 1.92122 2.33272 2.67641 2.70680 2.78629 3.33339

4.308E-07 4.268E-07 3.909E-07 3.565E-07 3.528E-07 3.469E-07 3.265E-07 2.678E-07 2.656E-07 2.476E-07
68.446 68.908 77.903 78.457 80.486 80.948 87.498 87.729 89.205 89.251
3.46900 3.49238 3.94830 3.97635 4.07923 4.10261 4.43461 4.44630 4.52111 4.52345

2.453E-07 2.156E-07 2.130E-07 1.975E-07 1.864E-07 1.779E-07 1.495E-07 1.411E-07 1.336E-07 1.248E-07
94.003 94.049 96.171 96.679 96.863 97.555 97.786 97.832 98.109 98.385
4.76427 4.76661 4.87416 4.89988 4.90923 4.94430 4.95599 4.95833 4.97236 4.98638

9.605E-08 9.377E-08 9.025E-08 8.032E-08 7.550E-08 6.505E-08 4.918E-08 3.310E-08 2.491E-08 1.998E-08
98.708 98.847 99.031 99.077 99.124 99.216 99.400 99.631 99.769 99.908
5.00275 5.00977 5.01912 5.02146 5.02379 5.02847 5.03782 5.04951 5.05653 5.06354

```
   1.668E-08   1.253E-08
     99.954     100.000
    5.06588     5.06822

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
      CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.651
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.387
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.330
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.330
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.945
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.431
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.761

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1     -11.07347 -16.80422  -1.25550
  8  2     -13.68648 -16.18556  -1.00636
  8  3     -13.97049 -16.88110  -1.32237
  8  4     -14.24977 -17.88312  -1.82593
  8  5     -14.53378 -19.78284  -2.86158
  8  6     -14.75472 -20.57256  -3.31103
  8  7     -14.93482 -29.17666  -8.36420
  8  8     -15.22084     NUMXQ(K)=  8
    3.121E-06              0.051              1.000
    2.080E-06              0.152              3.000
    1.700E-06              0.253              5.000
    1.271E-06              0.507             10.000
    1.076E-06              0.760             15.000
    9.670E-07              1.014             20.000
    8.876E-07              1.267             25.000
    8.167E-07              1.520             30.000
    7.526E-07              1.774             35.000
    7.000E-07              2.027             40.000
    6.560E-07              2.281             45.000
    6.073E-07              2.534             50.000
    5.633E-07              2.788             55.000
    5.254E-07              3.041             60.000
```

4.923E-07	3.294	65.000
4.499E-07	3.548	70.000
4.110E-07	3.801	75.000
3.753E-07	4.055	80.000
3.416E-07	4.308	85.000
2.919E-07	4.561	90.000
1.279E-06	0.5	9.87

ANNUAL AVERAGE = 1.23E-08

K= 8 FIVEXQ(K)= 1.279E-06 FIVEPR(K)= 9.865

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01	1.693E-02
0.185	1.107	3.183	12.839	53.116	98.801	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED						
			AT 131.4 METERS								
CA=1292.SQ.METERS											
A	4.4	0.05	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.16	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.09	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.14	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
B	3.3	0.02	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.09	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.40	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.33	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.51	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.14	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
B	26.5	0.02	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.071E-08
C	2.2	0.02	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.051E-06
C	3.3	0.26	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.47	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.93	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.86	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07
C	8.7	1.12	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.678E-07
C	10.8	0.23	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.156E-07

C	26.5	0.02	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	8.769E-08
D	0.2	0.00	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.552E-05
D	1.1	0.28	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.302E-06
D	1.7	0.68	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	2.236E-06
D	2.2	0.91	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.690E-06
D	3.3	3.99	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.138E-06
D	4.4	7.47	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	8.564E-07
D	5.4	7.71	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	6.867E-07
D	6.5	6.40	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	5.735E-07
D	8.7	8.06	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	4.308E-07
D	10.8	2.24	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.469E-07
D	26.5	0.93	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.411E-07
E	0.3	0.01	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.61	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.03	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	1.40	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	6.14	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	10.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	9.88	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	6.63	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	8.57	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.68	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.21	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.28	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.26	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.77	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.75	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	2.08	90000.	0.	131.	1000.0					

```
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       1.07    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.93    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.56    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.02    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.19    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.21    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.19    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.51    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.14    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.19    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.02    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.02    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 1.880E-06 1.690E-06 1.273E-06 1.138E-06 1.051E-06
0.002 0.014 0.021 0.301 0.979 1.586 2.496 3.524 7.516 7.539
0.00023 0.00140 0.00213 0.03018 0.09799 0.15878 0.24996 0.35283 0.75264 0.75497

1.024E-06 9.624E-07 8.564E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07 5.735E-07 5.323E-07 5.243E-07
7.820 9.221 16.692 16.949 17.206 24.911 31.052 37.449 37.916 38.687
0.78303 0.92331 1.67148 1.69720 1.72292 2.49447 3.10937 3.74999 3.79675 3.87391

4.876E-07 4.308E-07 4.268E-07 3.909E-07 3.565E-07 3.528E-07 3.469E-07 3.265E-07 2.678E-07 2.656E-07
48.773 56.828 57.762 67.639 68.503 70.254 72.495 79.126 80.247 82.325
4.88394 5.69056 5.78408 6.77307 6.85958 7.03493 7.25938 7.92338 8.03561 8.24369

2.476E-07 2.453E-07 2.156E-07 2.130E-07 1.975E-07 1.864E-07 1.779E-07 1.495E-07 1.411E-07 1.336E-07
82.348 90.917 91.151 92.225 93.906 93.999 94.933 95.330 96.264 96.825
8.24603 9.10409 9.12747 9.23502 9.40336 9.41271 9.50623 9.54597 9.63950 9.69561

1.248E-07 1.076E-07 9.605E-08 9.377E-08 9.025E-08 8.769E-08 8.032E-08 7.550E-08 7.236E-08 6.505E-08
97.151 97.175 97.362 97.875 97.922 97.945 98.155 98.296 98.459 98.669
9.72834 9.73068 9.74938 9.80082 9.80550 9.80783 9.82888 9.84291 9.85927 9.88031

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   6.043E-08   4.918E-08   4.540E-08   3.310E-08   3.071E-08   2.491E-08
1.998E-08   1.668E-08   1.253E-08
      98.762      98.949      99.089      99.603      99.626      99.766
99.953      99.977     100.000
     9.88966     9.90837     9.92240     9.97383     9.97617     9.99020
10.00890    10.01124    10.01358

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.752
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   3.106
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   6.769
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.920
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   9.101
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   9.400

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  9  1     -11.07347 -16.64198  -1.21549
  9  2     -13.68648 -15.95657  -0.93360
  9  3     -13.97049 -16.23857  -1.06617
  9  4     -14.24977 -16.78063  -1.35676
  9  5     -14.75472 -18.00644  -2.17768
  9  6     -14.93482 -20.24903  -3.76761
  9  7     -15.22084 -31.23703 -12.00090
  9  8     -15.43763     NUMXQ(K)=  8
    2.533E-06              0.100              1.000
    1.671E-06              0.300              3.000
    1.356E-06              0.501              5.000
    1.031E-06              1.001             10.000
    8.912E-07              1.502             15.000
    7.917E-07              2.003             20.000
    7.164E-07              2.503             25.000
    6.584E-07              3.004             30.000
    6.022E-07              3.505             35.000
    5.542E-07              4.005             40.000
    5.141E-07              4.506             45.000
    4.801E-07              5.007             50.000
    4.506E-07              5.507             55.000
```

4.248E-07	6.008	60.000
4.020E-07	6.509	65.000
3.760E-07	7.010	70.000
3.475E-07	7.510	75.000
3.193E-07	8.011	80.000
2.821E-07	8.512	85.000
2.505E-07	9.012	90.000
1.357E-06	0.5	4.99

ANNUAL AVERAGE = 1.99E-08

K= 9 FIVEXQ(K)= 1.357E-06 FIVEPR(K)= 4.993

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01
1.693E-02					
0.444	1.961	5.884	13.620	52.287	98.529
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.04	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	4.4	0.08	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.16	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.12	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.08	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
B	3.3	0.16	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.16	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.36	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.20	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.20	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
B	26.5	0.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.071E-08
C	3.3	0.16	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.52	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.56	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.68	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07
C	8.7	0.72	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.678E-07
D	0.2	0.00	5000.	0.	131.	322.2					

89.1	0.0	0.000E+00	0.000E+00	1.552E-05		
D	1.1	0.24	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	3.302E-06		
D	1.7	0.68	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	2.236E-06		
D	2.2	1.24	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.690E-06		
D	3.3	4.39	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.138E-06		
D	4.4	8.10	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	8.564E-07		
D	5.4	7.70	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	6.867E-07		
D	6.5	5.27	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	5.735E-07		
D	8.7	4.31	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	4.308E-07		
D	10.8	0.84	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	3.469E-07		
D	26.5	0.24	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.411E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.82	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	10.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	5.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.08	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.16	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.76	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       0.80    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.12    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.32    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.04    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.36    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.76    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.64    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.16    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.20    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
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COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
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THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 1.880E-06 1.690E-06 1.273E-06 1.138E-06 1.024E-06
0.002 0.014 0.027 0.266 0.944 1.583 2.819 4.415 8.803 9.282
0.00012 0.00083 0.00156 0.01559 0.05534 0.09275 0.16523 0.25875 0.51593 0.54399

9.624E-07 8.564E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07 5.735E-07 5.323E-07 5.243E-07 4.876E-07
11.875 19.973 20.133 20.931 28.630 36.450 41.715 42.234 43.391 54.282
0.69596 1.17058 1.17993 1.22669 1.67793 2.13619 2.44481 2.47520 2.54300 3.18129

4.308E-07 4.268E-07 3.909E-07 3.565E-07 3.528E-07 3.469E-07 3.265E-07 2.678E-07 2.656E-07 2.476E-07
58.590 59.149 69.402 70.080 73.630 74.468 81.729 82.447 85.319 85.479
3.43379 3.46653 4.06740 4.10715 4.31523 4.36433 4.78985 4.83194 5.00028 5.00963

2.453E-07 2.130E-07 1.975E-07 1.864E-07 1.779E-07 1.495E-07 1.411E-07 1.336E-07 1.248E-07 1.199E-07
91.463 93.298 94.056 94.215 94.973 95.332 95.572 96.370 96.569 96.609
5.36033 5.46788 5.51231 5.52166 5.56608 5.58712 5.60115 5.64791 5.65960 5.66194

1.076E-07 9.605E-08 9.377E-08 9.025E-08 8.032E-08 7.550E-08 7.236E-08 6.505E-08 6.043E-08 4.918E-08
96.729 97.048 97.247 97.327 97.407 97.447 97.606 97.646 97.766 98.125
5.66896 5.68766 5.69935 5.70403 5.70870 5.71104 5.72039 5.72273 5.72974 5.75079

4.540E-08	3.310E-08	3.071E-08	2.491E-08	1.998E-08	1.668E-08
98.205	98.963	99.003	99.641	99.801	100.000
5.75546	5.79989	5.80222	5.83963	5.84898	5.86067

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.515
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.134
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.178
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.064
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.786
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.357
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   5.464
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
10	1	-11.07347	-16.79166	-1.21042
10	2	-13.68648	-16.12910	-0.95215
10	3	-13.97049	-16.60591	-1.16247
10	4	-14.24977	-17.60373	-1.65477
10	5	-14.53378	-18.19662	-1.97436
10	6	-14.75472	-18.81336	-2.32813
10	7	-14.93482	-23.64211	-5.22663
10	8	-15.22084	-38.47770	-14.43430
10	9	-15.36220	NUMXQ(K)=	9

2.593E-06	0.059	1.000
1.745E-06	0.176	3.000
1.433E-06	0.293	5.000
1.090E-06	0.586	10.000
9.489E-07	0.879	15.000
8.559E-07	1.172	20.000
7.738E-07	1.465	25.000
7.109E-07	1.758	30.000
6.606E-07	2.051	35.000
6.072E-07	2.344	40.000
5.587E-07	2.637	45.000
5.178E-07	2.930	50.000
4.820E-07	3.223	55.000

4.461E-07	3.516	60.000
4.151E-07	3.809	65.000
3.873E-07	4.102	70.000
3.592E-07	4.396	75.000
3.344E-07	4.689	80.000
2.957E-07	4.982	85.000
2.557E-07	5.275	90.000
1.153E-06	0.5	8.53

ANNUAL AVERAGE = 1.15E-08

K= 10 FIVEXQ(K)= 1.153E-06 FIVEPR(K)= 8.531

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01	1.693E-02
0.479	1.636	4.269	16.648	49.642	97.527	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.09	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00
A	4.4	0.09	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00
A	5.4	0.14	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00
A	8.7	0.09	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00
B	3.3	0.14	5000.	0.	131.	602.6	635.6	0.0	0.000E+00
B	4.4	0.19	5000.	0.	131.	602.6	635.6	0.0	0.000E+00
B	5.4	0.28	5000.	0.	131.	602.6	635.6	0.0	0.000E+00
B	6.5	0.28	5000.	0.	131.	602.6	635.6	0.0	0.000E+00
B	8.7	0.14	5000.	0.	131.	602.6	635.6	0.0	0.000E+00
B	10.8	0.05	5000.	0.	131.	602.6	635.6	0.0	0.000E+00
C	3.3	0.33	5000.	0.	131.	457.6	264.8	0.0	0.000E+00
C	4.4	0.42	5000.	0.	131.	457.6	264.8	0.0	0.000E+00
C	5.4	0.70	5000.	0.	131.	457.6	264.8	0.0	0.000E+00
C	6.5	0.52	5000.	0.	131.	457.6	264.8	0.0	0.000E+00
C	8.7	0.75	5000.	0.	131.	457.6	264.8	0.0	0.000E+00
C	10.8	0.14	5000.	0.	131.	457.6	264.8	0.0	0.000E+00
C	26.5	0.09	5000.	0.	131.	457.6	264.8	0.0	0.000E+00
D	0.2	0.00	5000.	0.	131.	322.2			

89.1	0.0	0.000E+00	0.000E+00	1.552E-05		
D	1.1	0.42	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	3.302E-06		
D	1.7	1.08	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	2.236E-06		
D	2.2	1.32	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.690E-06		
D	3.3	4.60	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.138E-06		
D	4.4	6.01	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	8.564E-07		
D	5.4	6.67	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	6.867E-07		
D	6.5	3.76	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	5.735E-07		
D	8.7	4.27	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	4.308E-07		
D	10.8	0.70	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	3.469E-07		
D	26.5	0.23	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.411E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.80	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.96	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	4.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.27	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.70	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.27	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	4.65	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	4.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	3.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.46	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.08    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07
   F       11.6       0.05    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.076E-07

   G        1.2       0.05    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.23    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.28    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.03    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.69    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.75    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.47    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.23    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 1.880E-06 1.690E-06 1.273E-06 1.138E-06 1.024E-06
0.003 0.019 0.037 0.460 1.540 2.339 3.654 5.627 10.231 10.935
0.00017 0.00094 0.00185 0.02289 0.07667 0.11641 0.18188 0.28007 0.50920 0.54427

9.624E-07 8.564E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07 5.735E-07 5.323E-07 5.243E-07 4.876E-07
13.895 19.908 20.236 21.035 27.705 35.409 39.167 39.590 40.858 49.831
0.69157 0.99084 1.00720 1.04695 1.37895 1.76239 1.94943 1.97047 2.03360 2.48016

4.308E-07 4.268E-07 3.909E-07 3.565E-07 3.528E-07 3.469E-07 3.265E-07 2.678E-07 2.656E-07 2.476E-07
54.105 54.810 62.561 63.078 67.728 68.433 73.083 73.835 78.767 78.908
2.69292 2.72799 3.11377 3.13949 3.37095 3.40602 3.63749 3.67490 3.92039 3.92741

2.453E-07 2.156E-07 2.130E-07 1.975E-07 1.864E-07 1.779E-07 1.495E-07 1.411E-07 1.336E-07 1.248E-07
86.377 86.518 89.619 90.887 91.075 92.531 92.813 93.048 94.128 94.410
4.29915 4.30617 4.46048 4.52360 4.53296 4.60543 4.61946 4.63115 4.68493 4.69896

1.199E-07 1.076E-07 9.605E-08 9.377E-08 9.025E-08 8.769E-08 8.032E-08 7.550E-08 7.236E-08 6.505E-08
94.504 94.551 94.598 94.739 94.833 94.927 95.021 95.068 95.209 95.443
4.70363 4.70597 4.70831 4.71532 4.72000 4.72467 4.72935 4.73169 4.73870 4.75039

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   4.918E-08   4.540E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.725      95.819      96.853      98.544      99.295      99.765
100.000
     4.76442     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.509
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.990
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.760
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.478
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.111
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.634
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.296
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   4.457

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.07347 -16.92876  -1.26162
 11  2     -13.68648 -16.73162  -1.18492
 11  3     -13.97049 -16.87206  -1.24518
 11  4     -14.24977 -18.45759  -1.99807
 11  5     -14.53378 -18.91389  -2.23042
 11  6     -14.75472 -19.55622  -2.57489
 11  7     -14.93482 -21.56385  -3.69346
 11  8     -15.22084 -29.17120  -8.12314
 11  9     -15.36220      NUMXQ(K)=  9
    2.829E-06              0.050              1.000
    1.883E-06              0.149              3.000
    1.538E-06              0.249              5.000
    1.149E-06              0.498             10.000
    9.690E-07              0.747             15.000
    8.546E-07              0.995             20.000
    7.689E-07              1.244             25.000
    7.036E-07              1.493             30.000
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6.516E-07	1.742	35.000
5.863E-07	1.991	40.000
5.316E-07	2.240	45.000
4.860E-07	2.489	50.000
4.435E-07	2.737	55.000
4.074E-07	2.986	60.000
3.742E-07	3.235	65.000
3.434E-07	3.484	70.000
3.125E-07	3.733	75.000
2.800E-07	3.982	80.000
2.522E-07	4.231	85.000
1.147E-06	0.5	10.05

ANNUAL AVERAGE = 9.45E-09

K= 11 FIVEXQ(K)= 1.147E-06 FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01
1.693E-02					
0.423	1.503	4.463	22.519	51.600	95.256
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	5.4	0.14	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.28	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.05	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	10.8	0.09	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	3.655E-08
A	26.5	0.05	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.487E-08
B	3.3	0.05	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.09	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.24	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.33	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.61	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.09	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
B	26.5	0.05	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.071E-08
C	3.3	0.14	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.19	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.66	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.71	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07
C	8.7	1.13	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.678E-07
C	10.8	0.14	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.156E-07

C	26.5	0.09	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	8.769E-08
D	0.2	0.00	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.552E-05
D	1.1	0.28	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.302E-06
D	1.7	0.42	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	2.236E-06
D	2.2	1.13	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.690E-06
D	3.3	4.24	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.138E-06
D	4.4	3.77	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	8.564E-07
D	5.4	4.19	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	6.867E-07
D	6.5	4.85	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	5.735E-07
D	8.7	6.54	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	4.308E-07
D	10.8	0.94	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.469E-07
D	26.5	0.56	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.411E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.89	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.65	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	1.69	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	5.22	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	5.46	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	7.01	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	7.39	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	8.33	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.79	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.71	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.85	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	1.69	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	3.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	3.62	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	4.00	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.68	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.77	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.47	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.89	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.18	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	1.88	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.66	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

ENE SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 1.880E-06 1.690E-06 1.273E-06 1.138E-06 1.024E-06
0.002 0.019 0.038 0.320 0.744 1.638 2.768 4.415 8.650 9.356
0.00012 0.00097 0.00188 0.01591 0.03695 0.08137 0.13749 0.21932 0.42974 0.46481

9.624E-07 8.564E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07 5.735E-07 5.323E-07 5.243E-07 4.876E-07
11.051 14.816 14.957 15.804 19.993 25.217 30.064 30.252 31.947 37.406
0.54898 0.73602 0.74304 0.78512 0.99321 1.25273 1.49355 1.50290 1.58707 1.85828

4.308E-07 4.268E-07 3.909E-07 3.565E-07 3.528E-07 3.469E-07 3.265E-07 2.678E-07 2.656E-07 2.476E-07
43.948 44.607 51.619 52.325 55.337 56.278 63.667 64.797 68.421 68.468
2.18326 2.21600 2.56436 2.59943 2.74907 2.79583 3.16290 3.21901 3.39904 3.40138

2.453E-07 2.156E-07 2.130E-07 1.975E-07 1.864E-07 1.779E-07 1.495E-07 1.411E-07 1.336E-07 1.248E-07
76.798 76.939 80.939 82.728 82.822 85.505 85.740 86.305 90.070 90.399
3.81521 3.82223 4.02096 4.10980 4.11448 4.24775 4.25944 4.28749 4.47454 4.49090

1.076E-07 9.605E-08 9.377E-08 8.769E-08 8.032E-08 7.550E-08 7.236E-08 6.505E-08 6.043E-08 4.918E-08
91.387 91.858 92.470 92.564 92.658 92.752 92.893 93.270 93.552 93.929
4.54000 4.56338 4.59378 4.59845 4.60313 4.60780 4.61482 4.63352 4.64755 4.66625

```
   4.540E-08   4.375E-08   3.655E-08   3.310E-08   3.071E-08   2.491E-08
1.998E-08   1.668E-08   1.487E-08   1.253E-08
      93.976      94.023      94.117      95.011      95.058      96.235
98.117      99.200      99.247      99.906
     4.66859     4.67093     4.67561     4.72003     4.72237     4.78082
4.87434     4.92812     4.93045     4.96319

   1.009E-08
     100.000
     4.96786
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

```
 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.429
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.251
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.562
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.160
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.812
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.018

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 12  1     -11.07347 -16.96295  -1.24668
 12  2     -13.68648 -17.51032  -1.45495
 12  3     -14.24977 -18.13163  -1.73219
 12  4     -14.75472 -18.58331  -1.96389
 12  5     -14.93482 -21.19734  -3.37095
 12  6     -15.22084 -25.53790  -5.81918
 12  7     -15.36220     NUMXQ(K)=  7
    2.605E-06              0.050              1.000
    1.742E-06              0.149              3.000
    1.426E-06              0.248              5.000
    1.058E-06              0.497             10.000
    8.592E-07              0.745             15.000
    7.364E-07              0.994             20.000
    6.509E-07              1.242             25.000
    5.759E-07              1.490             30.000
    5.175E-07              1.739             35.000
    4.708E-07              1.987             40.000
```

4.325E-07	2.236	45.000
4.003E-07	2.484	50.000
3.705E-07	2.732	55.000
3.438E-07	2.981	60.000
3.165E-07	3.229	65.000
2.829E-07	3.478	70.000
2.544E-07	3.726	75.000
2.198E-07	3.974	80.000
1.055E-06	0.5	10.06

ANNUAL AVERAGE = 7.81E-09

K= 12 FIVEXQ(K)= 1.055E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01	1.693E-02
0.612	2.071	5.130	26.515	53.437	92.988	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					
			AT 131.4 METERS							
CA=1292.SQ.METERS										
A	4.4	0.03	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.06	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.39	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.42	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	10.8	0.30	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	3.655E-08
A	26.5	0.18	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.487E-08
B	2.2	0.03	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	0.09	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.09	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.39	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.30	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.63	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.33	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
B	26.5	0.21	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.071E-08
C	3.3	0.06	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.48	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.69	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.33	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07

C	8.7	1.44	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.678E-07						
C	10.8	0.87	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	2.156E-07						
C	26.5	0.48	5000.	0.	131.	457.6	264.8	0.0
0.000E+00	0.000E+00	8.769E-08						
D	0.2	0.00	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.552E-05						
D	1.1	0.24	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.302E-06						
D	1.7	0.54	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	2.236E-06						
D	2.2	0.90	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.690E-06						
D	3.3	2.66	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.138E-06						
D	4.4	3.26	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	8.564E-07						
D	5.4	4.01	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	6.867E-07						
D	6.5	4.25	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	5.735E-07						
D	8.7	9.30	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	4.308E-07						
D	10.8	6.31	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	3.469E-07						
D	26.5	3.71	5000.	0.	131.	322.2	89.1	0.0
0.000E+00	0.000E+00	1.411E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.90	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	0.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	1.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	3.05	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	3.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.77	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	6.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	12.47	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.42	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.48	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.66	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.29	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.63	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.83	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.84	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.81	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05	8.835E-06	4.813E-06	3.302E-06	2.236E-06	1.880E-06	1.690E-06	1.273E-06	1.138E-06	1.024E-06	
0.002	0.019	0.030	0.269	0.808	1.705	2.603	3.321	5.983	6.402	
0.00015	0.00150	0.00235	0.02106	0.06314	0.13328	0.20342	0.25953	0.46762	0.50035	

9.624E-07	8.564E-07	7.072E-07	6.935E-07	6.867E-07	6.477E-07	5.735E-07	5.323E-07	5.243E-07	4.876E-07	
7.658	10.918	10.978	11.457	15.465	18.516	22.764	23.243	23.901	27.490	
0.59855	0.85339	0.85807	0.89548	1.20878	1.44726	1.77926	1.81666	1.86810	2.14866	

4.308E-07	4.268E-07	3.909E-07	3.679E-07	3.565E-07	3.528E-07	3.469E-07	3.265E-07	2.678E-07	2.656E-07	
36.793	37.481	43.255	43.285	43.614	44.900	51.212	57.583	59.019	61.651	
2.87579	2.92957	3.38081	3.38315	3.40886	3.50940	4.00272	4.50073	4.61295	4.81870	

2.476E-07	2.453E-07	2.156E-07	2.130E-07	1.975E-07	1.864E-07	1.779E-07	1.495E-07	1.411E-07	1.336E-07	
61.741	74.215	75.082	77.625	80.257	80.347	82.890	83.279	86.988	90.817	
4.82571	5.80067	5.86847	6.06721	6.27295	6.27997	6.47870	6.50910	6.79901	7.09828	

1.248E-07	1.076E-07	9.605E-08	9.377E-08	9.025E-08	8.769E-08	8.032E-08	7.550E-08	7.236E-08	6.505E-08	
91.116	91.804	92.043	92.671	92.701	93.180	93.479	93.808	93.868	94.017	
7.12166	7.17543	7.19414	7.24324	7.24558	7.28298	7.30636	7.33208	7.33676	7.34845	

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   6.043E-08   4.918E-08   4.540E-08   4.375E-08   3.655E-08   3.310E-08
3.071E-08   2.491E-08   1.998E-08   1.668E-08
      94.406      94.616      95.034      95.064      95.363      96.111
96.321      97.158      97.966      99.073
     7.37884     7.39521     7.42794     7.43028     7.45366     7.51211
7.52848     7.59394     7.65707     7.74358

   1.487E-08   1.253E-08   1.009E-08
     99.252      99.970     100.000
    7.75761     7.81372     7.81606

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.203
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.446
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.378
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.497
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   5.797
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   6.269

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1     -11.07347 -16.41849  -1.14569
 13  2     -11.63677 -16.94397  -1.27159
 13  3     -13.29050 -17.29376  -1.39333
 13  4     -14.24977 -17.34230  -1.41555
 13  5     -14.75472 -17.24379  -1.36166
 13  6     -14.93482 -18.85761  -2.31338
 13  7     -15.22084 -23.85140  -5.48997
 13  8     -15.43763     NUMXQ(K)=  8
    2.444E-06             0.078             1.000
    1.587E-06             0.234             3.000
    1.257E-06             0.391             5.000
    8.964E-07             0.782            10.000
    7.260E-07             1.172            15.000
    6.203E-07             1.563            20.000
    5.459E-07             1.954            25.000
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4.901E-07	2.345	30.000
4.463E-07	2.736	35.000
4.108E-07	3.126	40.000
3.815E-07	3.517	45.000
3.573E-07	3.908	50.000
3.363E-07	4.299	55.000
3.120E-07	4.690	60.000
2.854E-07	5.080	65.000
2.623E-07	5.471	70.000
2.383E-07	5.862	75.000
1.993E-07	6.253	80.000

1.118E-06 0.5 6.40

ANNUAL AVERAGE = 1.20E-08

K= 13 FIVEXQ(K)= 1.118E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 9.789E-01 8.841E-01 3.613E-01 3.371E-01 2.081E-01
1.693E-02
1.376 3.440 7.777 22.895 58.074 95.154
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.08	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.08	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.19	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.13	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	10.8	0.05	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	3.655E-08
A	26.5	0.13	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.487E-08
B	3.3	0.03	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.13	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.05	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.21	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.40	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.32	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
B	26.5	0.27	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.071E-08
C	3.3	0.05	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.16	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.35	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.56	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07
C	8.7	1.21	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.678E-07

C	10.8	0.72	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.156E-07
C	26.5	0.89	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	8.769E-08
D	0.2	0.00	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.552E-05
D	1.1	0.51	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.302E-06
D	1.7	0.51	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	2.236E-06
D	2.2	0.51	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.690E-06
D	3.3	1.58	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.138E-06
D	4.4	3.09	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	8.564E-07
D	5.4	4.29	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	6.867E-07
D	6.5	5.26	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	5.735E-07
D	8.7	14.57	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	4.308E-07
D	10.8	10.52	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.469E-07
D	26.5	6.09	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.411E-07
E	0.3	0.01	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.46	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	0.51	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	0.62	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	2.20	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	3.11	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	4.32	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	6.23	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	11.84	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	3.33	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.32	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.35	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.40	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.48	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.05	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	2.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.62	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.59	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.70	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.54	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05	8.835E-06	4.813E-06	3.302E-06	2.236E-06	1.880E-06	1.690E-06	1.273E-06	1.138E-06	1.024E-06	
0.004	0.013	0.022	0.532	1.042	1.498	2.008	2.518	4.102	4.451	
0.00037	0.00113	0.00192	0.04634	0.09076	0.13051	0.17493	0.21936	0.35730	0.38769	

9.624E-07	8.564E-07	7.072E-07	6.935E-07	6.867E-07	6.477E-07	5.735E-07	5.323E-07	5.243E-07	4.876E-07	
5.068	8.154	8.208	8.611	12.905	15.106	20.367	20.528	21.011	24.124	
0.44147	0.71034	0.71502	0.75009	1.12417	1.31589	1.77415	1.78818	1.83026	2.10147	

4.308E-07	4.268E-07	3.909E-07	3.565E-07	3.528E-07	3.469E-07	3.265E-07	2.678E-07	2.656E-07	2.476E-07	
38.698	39.047	43.368	43.932	44.979	55.500	61.727	62.934	64.249	64.276	
3.37102	3.40142	3.77784	3.82694	3.91812	4.83463	5.37706	5.48227	5.59683	5.59917	

2.453E-07	2.156E-07	2.130E-07	1.975E-07	1.864E-07	1.779E-07	1.495E-07	1.411E-07	1.336E-07	1.248E-07	
76.113	76.837	78.823	82.152	82.286	83.762	83.816	89.908	92.700	92.914	
6.63024	6.69337	6.86638	7.15630	7.16799	7.29658	7.30126	7.83199	8.07515	8.09385	

1.076E-07	9.605E-08	9.377E-08	9.025E-08	8.769E-08	8.032E-08	7.550E-08	7.236E-08	6.505E-08	6.043E-08	
93.532	93.746	94.149	94.229	95.115	95.437	95.759	95.840	96.001	96.189	
8.14762	8.16633	8.20140	8.20841	8.28557	8.31362	8.34168	8.34869	8.36272	8.37909	

```
   4.918E-08   4.540E-08   3.655E-08   3.310E-08   3.071E-08   2.491E-08
1.998E-08   1.668E-08   1.487E-08   1.253E-08
      96.403      96.538      96.591      97.182      97.450      98.148
98.685      98.953      99.087      99.946
     8.39779     8.40948     8.41416     8.46560     8.48898     8.54977
8.59653     8.61991     8.63160     8.70641

   1.009E-08
     100.000
     8.71109

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.046
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.710
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   3.368
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   5.373
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   6.626
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   7.152

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1     -11.07347 -16.99364  -1.32021
 14  2     -12.62103 -17.82019  -1.56976
 14  3     -13.97049 -16.67443  -1.10256
 14  4     -14.65754 -16.96749  -1.26277
 14  5     -14.93482 -19.29965  -2.71160
 14  6     -15.22084 -23.43934  -5.46367
 14  7     -15.43763     NUMXQ(K)=  7
    2.486E-06              0.087              1.000
    1.462E-06              0.261              3.000
    1.120E-06              0.436              5.000
    7.891E-07              0.871             10.000
    6.663E-07              1.307             15.000
    5.875E-07              1.742             20.000
    5.310E-07              2.178             25.000
    4.875E-07              2.613             30.000
    4.527E-07              3.049             35.000
    4.228E-07              3.484             40.000
```

3.950E-07	3.920	45.000
3.712E-07	4.356	50.000
3.505E-07	4.791	55.000
3.323E-07	5.227	60.000
3.046E-07	5.662	65.000
2.754E-07	6.098	70.000
2.504E-07	6.533	75.000
2.130E-07	6.969	80.000
1.040E-06	0.5	5.74

ANNUAL AVERAGE = 1.40E-08

K= 14 FIVEXQ(K)= 1.040E-06 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01
1.693E-02					
0.671	2.093	6.039	16.516	63.462	96.403
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					
			AT 131.4 METERS							
CA=1292.SQ.METERS										
A	6.5	0.06	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.04	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	26.5	0.02	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.487E-08
B	2.2	0.02	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	0.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.02	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.02	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.06	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.13	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.11	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
C	3.3	0.06	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.17	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.19	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.38	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07
C	8.7	0.56	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.678E-07
C	10.8	0.47	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.156E-07
C	26.5	0.26	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	8.769E-08
D	0.2	0.00	5000.	0.	131.	322.2					

89.1	0.0	0.000E+00	0.000E+00	1.552E-05		
D	1.1	0.17	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	3.302E-06		
D	1.7	0.60	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	2.236E-06		
D	2.2	0.85	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.690E-06		
D	3.3	2.52	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.138E-06		
D	4.4	3.97	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	8.564E-07		
D	5.4	5.02	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	6.867E-07		
D	6.5	7.09	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	5.735E-07		
D	8.7	17.54	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	4.308E-07		
D	10.8	10.45	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	3.469E-07		
D	26.5	5.47	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.411E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

```
92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F         9.3       1.30    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G         1.2       0.15    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.24    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.94    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       1.13    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.88    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G         7.0       0.36    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G         9.3       0.11    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 1.880E-06 1.690E-06 1.273E-06 1.138E-06 1.024E-06
0.001 0.011 0.018 0.189 0.787 1.279 2.134 2.475 4.997 5.275
0.00015 0.00118 0.00198 0.02068 0.08615 0.13992 0.23344 0.27085 0.54674 0.57713

9.624E-07 8.564E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07 5.735E-07 5.323E-07 5.243E-07 4.876E-07
5.916 9.890 9.954 10.232 15.254 17.647 24.741 24.912 25.297 28.587
0.64727 1.08215 1.08916 1.11956 1.66899 1.93085 2.70708 2.72578 2.76787 3.12793

4.308E-07 4.268E-07 3.909E-07 3.679E-07 3.565E-07 3.528E-07 3.469E-07 3.265E-07 2.678E-07 2.656E-07
46.131 46.323 51.772 51.793 52.178 53.460 63.909 69.828 70.384 71.858
5.04745 5.06849 5.66469 5.66703 5.70911 5.84940 6.99269 7.64033 7.70112 7.86244

2.476E-07 2.453E-07 2.156E-07 2.130E-07 1.975E-07 1.864E-07 1.779E-07 1.495E-07 1.411E-07 1.336E-07
71.901 82.435 82.905 84.764 86.923 86.944 88.376 88.397 93.867 95.171
7.86712 9.01977 9.07121 9.27462 9.51076 9.51309 9.66974 9.67208 10.27062 10.41324

1.248E-07 9.605E-08 9.377E-08 8.769E-08 8.032E-08 7.550E-08 6.505E-08 6.043E-08 4.918E-08 4.540E-08
95.235 95.384 95.513 95.769 95.983 96.090 96.218 96.282 96.517 96.560
10.42025 10.43662 10.45065 10.47870 10.50208 10.51377 10.52780 10.53481 10.56053 10.56521

3.310E-08	2.491E-08	1.998E-08	1.668E-08	1.487E-08	1.253E-08
97.500	98.632	99.509	99.872	99.893	100.000
10.66808	10.79200	10.88786	10.92760	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

```
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.233
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.929
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   5.044
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.637
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   9.016
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   9.507
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.07347	-16.70718	-1.20757
15	2	-13.29050	-16.85845	-1.26103
15	3	-14.24977	-16.01657	-0.85407
15	4	-14.37153	-16.30113	-1.00180
15	5	-14.65754	-16.81686	-1.31615
15	6	-14.93482	-19.46911	-3.17094
15	7	-15.22084	-25.02872	-7.32066
15	8	-15.43763	NUMXQ(K)= 8	

2.243E-06	0.109	1.000
1.470E-06	0.328	3.000
1.181E-06	0.547	5.000
8.593E-07	1.094	10.000
7.039E-07	1.641	15.000
6.196E-07	2.188	20.000
5.709E-07	2.735	25.000
5.267E-07	3.282	30.000
4.910E-07	3.830	35.000
4.613E-07	4.377	40.000
4.361E-07	4.924	45.000
4.090E-07	5.471	50.000
3.842E-07	6.018	55.000
3.624E-07	6.565	60.000
3.432E-07	7.112	65.000
3.252E-07	7.659	70.000

2.891E-07	8.206	75.000
2.585E-07	8.753	80.000
2.165E-07	9.300	85.000
1.228E-06	0.5	4.57

ANNUAL AVERAGE = 1.89E-08

K= 15 FIVEXQ(K)= 1.228E-06 FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01	1.693E-02
0.128	0.534	2.628	10.926	64.626	96.068	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.02	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	5.4	0.11	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.09	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.30	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	10.8	0.02	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	3.655E-08
A	26.5	0.02	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.487E-08
B	3.3	0.06	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.15	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.26	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.32	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.43	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.13	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
C	2.2	0.02	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	1.051E-06
C	3.3	0.35	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	7.072E-07
C	4.4	0.76	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	5.323E-07
C	5.4	0.97	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	4.268E-07
C	6.5	0.93	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	3.565E-07
C	8.7	1.60	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.678E-07

C	10.8	0.30	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	2.156E-07
C	26.5	0.09	5000.	0.	131.	457.6	264.8	0.0	0.000E+00	0.000E+00	8.769E-08
D	0.2	0.00	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.552E-05
D	1.1	0.22	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.302E-06
D	1.7	0.86	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	2.236E-06
D	2.2	1.08	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.690E-06
D	3.3	4.99	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.138E-06
D	4.4	8.43	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	8.564E-07
D	5.4	9.47	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	6.867E-07
D	6.5	8.78	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	5.735E-07
D	8.7	15.00	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	4.308E-07
D	10.8	4.97	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	3.469E-07
D	26.5	2.03	5000.	0.	131.	322.2	89.1	0.0	0.000E+00	0.000E+00	1.411E-07
E	0.3	0.00	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.24	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	0.50	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	0.78	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	2.49	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	4.32	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	4.60	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	5.97	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	7.26	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.04	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.00	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.15	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.32	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.43	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.28	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.41	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.22	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.73	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.63	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 5000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05	8.835E-06	4.813E-06	3.302E-06	2.236E-06	1.880E-06	1.690E-06	1.273E-06	1.138E-06	1.051E-06	
0.002	0.006	0.010	0.226	1.091	1.329	2.410	2.907	7.900	7.921	
0.00019	0.00069	0.00111	0.02449	0.11801	0.14373	0.26063	0.31441	0.85449	0.85683	
1.024E-06	9.624E-07	8.564E-07	7.072E-07	6.935E-07	6.867E-07	6.477E-07	5.735E-07	5.323E-07	5.243E-07	
8.073	8.851	17.280	17.626	17.951	27.418	29.903	38.679	39.436	39.868	
0.87320	0.95737	1.86920	1.90661	1.94168	2.96574	3.23461	4.18385	4.26568	4.31244	
4.876E-07	4.308E-07	4.268E-07	3.909E-07	3.565E-07	3.528E-07	3.469E-07	3.265E-07	2.678E-07	2.656E-07	
44.191	59.191	60.164	64.768	65.697	66.973	71.944	77.910	79.509	80.655	
4.78005	6.40264	6.50786	7.00586	7.10639	7.24434	7.78208	8.42738	8.60040	8.72431	
2.476E-07	2.453E-07	2.156E-07	2.130E-07	1.975E-07	1.864E-07	1.779E-07	1.495E-07	1.411E-07	1.336E-07	
80.720	87.982	88.285	89.517	90.554	90.706	91.722	91.981	94.013	94.423	
8.73133	9.51690	9.54964	9.68291	9.79513	9.81150	9.92138	9.94944	10.16922	10.21364	
1.248E-07	1.199E-07	1.076E-07	9.605E-08	9.377E-08	8.769E-08	8.032E-08	7.550E-08	7.236E-08	6.505E-08	
94.748	94.769	94.877	95.093	95.526	95.612	95.915	96.045	96.153	96.347	
10.24871	10.25105	10.26274	10.28612	10.33288	10.34223	10.37496	10.38899	10.40068	10.42172	

```
   6.043E-08   4.918E-08   4.540E-08   3.655E-08   3.310E-08   2.491E-08
1.998E-08   1.668E-08   1.487E-08   1.253E-08
      96.434      96.693      96.996      97.017      97.752      99.092
99.719      99.892      99.914     100.000
    10.43108    10.45913    10.49186    10.49420    10.57370    10.71865
10.78646    10.80516    10.80750    10.81685
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

```
 CHI/Q =  1.556E-05      DISTANCE =   4000.000
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X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.853
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.963
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   4.180
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   6.504
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   8.424
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   9.514
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   9.792
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
16	1	-11.07347	-16.47626	-1.16962
16	2	-13.68648	-15.92061	-0.93666
16	3	-13.97049	-16.32076	-1.12886
16	4	-14.19142	-16.36709	-1.15342
16	5	-14.37153	-16.73425	-1.36564
16	6	-14.66696	-17.63391	-1.95995
16	7	-14.93482	-20.78345	-4.24700
16	8	-15.22084	-32.66652	-13.31960
16	9	-15.43763	NUMXQ(K)= 9	

2.526E-06	0.108	1.000
1.688E-06	0.325	3.000
1.378E-06	0.541	5.000
1.048E-06	1.082	10.000
9.036E-07	1.623	15.000
8.000E-07	2.163	20.000
7.186E-07	2.704	25.000
6.558E-07	3.245	30.000
6.050E-07	3.786	35.000
5.613E-07	4.327	40.000

5.198E-07	4.868	45.000
4.846E-07	5.408	50.000
4.542E-07	5.949	55.000
4.276E-07	6.490	60.000
3.946E-07	7.031	65.000
3.655E-07	7.572	70.000
3.400E-07	8.113	75.000
3.070E-07	8.653	80.000
2.663E-07	9.194	85.000
2.068E-07	9.735	90.000
1.423E-06	0.5	4.62

ANNUAL AVERAGE = 2.37E-08

K= 16 FIVEXQ(K)= 1.423E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01	1.693E-02
0.562	1.924	6.938	13.038	68.870	96.369	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.01	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	2.356E-07
A	2.2	0.09	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.781E-07
A	3.3	0.31	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.199E-07
A	4.4	0.33	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	9.025E-08
A	5.4	0.22	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	7.236E-08
A	6.5	0.18	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	6.043E-08
A	8.7	0.20	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	4.540E-08
A	10.8	0.05	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	3.655E-08
A	26.5	0.04	5000.	0.	131.	801.3	1000.0	0.0	0.000E+00	0.000E+00	1.487E-08
B	1.1	0.00	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.187E-07
B	1.7	0.04	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	4.867E-07
B	2.2	0.12	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	3.679E-07
B	3.3	0.29	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	2.476E-07
B	4.4	0.26	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.864E-07
B	5.4	0.26	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.495E-07
B	6.5	0.22	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	1.248E-07
B	8.7	0.30	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	9.377E-08
B	10.8	0.12	5000.	0.	131.	602.6	635.6	0.0	0.000E+00	0.000E+00	7.550E-08
B	26.5	0.05	5000.	0.	131.	602.6					

635.6	0.0	0.000E+00	0.000E+00	3.071E-08		
C	1.1	0.01	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	2.052E-06		
C	1.7	0.07	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	1.390E-06		
C	2.2	0.21	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	1.051E-06		
C	3.3	0.42	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	7.072E-07		
C	4.4	0.56	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	5.323E-07		
C	5.4	0.63	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	4.268E-07		
C	6.5	0.52	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	3.565E-07		
C	8.7	0.79	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	2.678E-07		
C	10.8	0.27	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	2.156E-07		
C	26.5	0.17	5000.	0.	131.	457.6
264.8	0.0	0.000E+00	0.000E+00	8.769E-08		
D	0.2	0.00	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.552E-05		
D	1.1	0.57	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	3.302E-06		
D	1.7	1.50	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	2.236E-06		
D	2.2	2.03	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.690E-06		
D	3.3	5.42	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.138E-06		
D	4.4	7.33	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	8.564E-07		
D	5.4	7.08	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	6.867E-07		
D	6.5	6.11	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	5.735E-07		
D	8.7	9.08	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	4.308E-07		
D	10.8	3.90	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	3.469E-07		
D	26.5	1.98	5000.	0.	131.	322.2
89.1	0.0	0.000E+00	0.000E+00	1.411E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.73	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.24	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.35	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		

E	7.0	5.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	6.91	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.44	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	1.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.18	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.25	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.69	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.01	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 5000.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 2.052E-06 1.880E-06 1.690E-06 1.390E-06 1.273E-06
0.005 0.019 0.030 0.599 2.102 2.114 2.845 4.877 4.943 6.182
0.00468 0.01870 0.03039 0.59854 2.10189 2.11358 2.84539 4.87714 4.94260 6.18176

1.138E-06 1.051E-06 1.024E-06 9.624E-07 8.564E-07 7.187E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07
11.606 11.816 12.265 14.150 21.475 21.479 21.898 22.461 29.543 34.795
11.60599 11.81642 12.26532 14.14977 21.47483 21.47951 21.89802 22.46148 29.54338 34.79460

5.735E-07 5.323E-07 5.243E-07 4.876E-07 4.867E-07 4.308E-07 4.268E-07 3.909E-07 3.679E-07 3.565E-07
40.902 41.458 42.295 48.813 48.856 57.939 58.565 64.913 65.030 65.554
40.90154 41.45799 42.29501 48.81345 48.85553 57.93879 58.56538 64.91314 65.03004 65.55376

3.528E-07 3.469E-07 3.265E-07 2.678E-07 2.656E-07 2.476E-07 2.453E-07 2.356E-07 2.156E-07 2.130E-07
67.342 71.242 76.419 77.209 79.082 79.374 86.285 86.292 86.566 88.132
67.34236 71.24220 76.41860 77.20885 79.08162 79.37387 86.28510 86.29211 86.56566 88.13214

1.975E-07 1.864E-07 1.781E-07 1.779E-07 1.495E-07 1.411E-07 1.336E-07 1.248E-07 1.199E-07 1.076E-07
89.572 89.837 89.930 90.968 91.225 93.201 94.305 94.522 94.835 95.015
89.57237 89.83657 89.93009 90.96818 91.22536 93.20100 94.30456 94.52200 94.83529 95.01532

9.605E-08 9.377E-08 9.025E-08 8.769E-08 8.032E-08 7.550E-08
7.236E-08 6.505E-08 6.043E-08 4.918E-08
95.263 95.560 95.887 96.060 96.320 96.439
96.657 96.844 97.021 97.283
95.26315 95.56008 95.88741 96.06042 96.31995 96.43919
96.65662 96.84367 97.02135 97.28321

4.540E-08 4.375E-08 3.655E-08 3.310E-08 3.071E-08 2.491E-08
1.998E-08 1.668E-08 1.487E-08 1.253E-08
97.480 97.496 97.543 98.260 98.310 99.002
99.481 99.747 99.785 99.988
97.47961 97.49597 97.54273 98.26051 98.30960 99.00166
99.48095 99.74748 99.78489 99.98830

1.009E-08
100.000
99.99998

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE ORDERED X/Q-FREQUENCY VALUES, AND AS PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY
3.270E-06	1.000	1.000
2.108E-06	3.000	3.000
1.675E-06	5.000	5.000
1.259E-06	10.000	10.000
1.039E-06	15.000	15.000
8.918E-07	20.000	20.000
7.899E-07	25.000	25.000
7.112E-07	30.000	30.000
6.454E-07	35.000	35.000
5.921E-07	40.000	40.000
5.448E-07	45.000	45.000
5.019E-07	50.000	50.000
4.624E-07	55.000	55.000
4.255E-07	60.000	60.000
3.904E-07	65.000	65.000
3.625E-07	70.000	70.000
3.345E-07	75.000	75.000
2.974E-07	80.000	80.000
2.562E-07	85.000	85.000
1.975E-07	90.000	90.000
1.675E-06	5.0	5.00

K= 17 FIVEXQ(K)= 1.675E-06 FIVEPR(K)= 5.000

FUMIGATION X/Q AT THE BOUNDARY: 9.60E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.789E-01	8.841E-01	3.613E-01	3.371E-01	2.081E-01
1.693E-02					
1.417	3.077	6.727	16.153	61.158	96.932
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.552E-05 8.835E-06 4.813E-06 3.302E-06 2.236E-06 2.052E-06 1.880E-06 1.690E-06 1.390E-06 1.273E-06
0.005 0.019 0.030 0.599 2.102 2.114 2.845 4.877 4.943 6.182
0.00468 0.01870 0.03039 0.59854 2.10189 2.11358 2.84539 4.87714 4.94260 6.18176

1.138E-06 1.051E-06 1.024E-06 9.624E-07 8.564E-07 7.187E-07 7.072E-07 6.935E-07 6.867E-07 6.477E-07
11.606 11.816 12.265 14.150 21.475 21.479 21.898 22.461 29.543 34.795
11.60599 11.81642 12.26532 14.14977 21.47483 21.47950 21.89801 22.46148 29.54338 34.79461

5.735E-07 5.323E-07 5.243E-07 4.876E-07 4.867E-07 4.308E-07 4.268E-07 3.909E-07 3.679E-07 3.565E-07
40.902 41.458 42.295 48.813 48.856 57.939 58.565 64.913 65.030 65.554
40.90155 41.45800 42.29501 48.81345 48.85554 57.93879 58.56539 64.91315 65.03004 65.55376

3.528E-07 3.469E-07 3.265E-07 2.678E-07 2.656E-07 2.476E-07 2.453E-07 2.356E-07 2.156E-07 2.130E-07
67.342 71.242 76.419 77.209 79.082 79.374 86.285 86.292 86.566 88.132
67.34237 71.24222 76.41863 77.20889 79.08165 79.37389 86.28513 86.29214 86.56567 88.13216

1.975E-07 1.864E-07 1.781E-07 1.779E-07 1.495E-07 1.411E-07 1.336E-07 1.248E-07 1.199E-07 1.076E-07
89.572 89.837 89.930 90.968 91.225 93.201 94.305 94.522 94.835 95.015
89.57240 89.83659 89.93011 90.96820 91.22538 93.20101 94.30457 94.52200 94.83529 95.01530

```
   9.605E-08   9.377E-08   9.025E-08   8.769E-08   8.032E-08   7.550E-08
7.236E-08   6.505E-08   6.043E-08   4.918E-08
      95.263      95.560      95.887      96.060      96.320      96.439
96.657      96.844      97.021      97.283
    95.26315    95.56007    95.88738    96.06039    96.31990    96.43912
96.65656    96.84359    97.02128    97.28314

   4.540E-08   4.375E-08   3.655E-08   3.310E-08   3.071E-08   2.491E-08
1.998E-08   1.668E-08   1.487E-08   1.253E-08
      97.479      97.496      97.543      98.260      98.309      99.002
99.481      99.747      99.785      99.988
    97.47953    97.49589    97.54264    98.26042    98.30951    99.00156
99.48085    99.74739    99.78478    99.98817

   1.009E-08
     100.000
    99.99986

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY


  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1     -11.07347 -14.92373  -0.98551
 18  2     -13.29050 -14.58968  -0.78394
 18  3     -13.97049 -14.52278  -0.69924
 18  4     -14.24977 -14.50482  -0.65326
 18  5     -14.75472 -14.55030  -0.53438
 18  6     -14.93482 -14.38408  -0.76538
 18  7     -15.22084 -13.96221  -1.15126
 18  8     -18.19490     NUMXQ(K)=  8
    3.270E-06              1.000              1.000
    2.108E-06              3.000              3.000
    1.675E-06              5.000              5.000
    1.259E-06             10.000             10.000
    1.039E-06             15.000             15.000
    8.918E-07             20.000             20.000
    7.899E-07             25.000             25.000
    7.112E-07             30.000             30.000
    6.454E-07             35.000             35.000
    5.921E-07             40.000             40.000
    5.448E-07             45.000             45.000
    5.019E-07             50.000             50.000
    4.624E-07             55.000             55.000
    4.255E-07             60.000             60.000
```

3.904E-07	65.000	65.000
3.625E-07	70.000	70.000
3.345E-07	75.000	75.000
2.974E-07	80.000	80.000
2.562E-07	85.000	85.000
1.974E-07	90.000	90.000
1.675E-06	5.0	5.00

K= 18 FIVEXQ(K)= 1.675E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-2.75766	0.29109	6.22377
2	-1.75357	3.97521	3.53187
3	-2.66363	0.38651	3.10925
4	-2.61576	0.44515	3.53945
5	-2.57624	0.49942	4.77421
6	-2.71252	0.33387	4.27580
7	-2.80217	0.25381	5.37250
8	-2.87428	0.20248	5.06821
9	-2.83541	0.22884	10.01358
10	-2.97094	0.14845	5.86067
11	-2.95903	0.15431	4.97718
12	-3.02193	0.12559	4.96786
13	-2.94780	0.16003	7.81606
14	-2.94607	0.16093	8.71109
15	-2.90800	0.18188	10.94163
16	-2.80491	0.25166	10.81685

K	HOURS(K)	TOTHRS
1	25.49959	25.49959
2	348.22860	373.72820
3	33.85847	407.58670
4	38.99525	446.58190
5	43.74879	490.33070
6	29.24696	519.57760
7	22.23362	541.81130
8	17.73750	559.54880
9	20.04639	579.59520
10	13.00434	592.59950
11	13.51760	606.11710
12	11.00142	617.11850
13	14.01833	631.13680
14	14.09717	645.23390
15	15.93248	661.16640
16	22.04513	683.21150

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.489E-06	1.633E-08	-0.5382	-13.0440			
					1	8.0	-14.16321
					2	16.0	-14.53628
					3	72.0	-15.34581
					4	624.0	-16.50810
2	1.332E-06	1.115E-08	-0.5704	-13.1333			
					1	8.0	-14.31948
					2	16.0	-14.71487
					3	72.0	-15.57286
					4	624.0	-16.80471
3	1.638E-06	1.196E-08	-0.5867	-12.9155			
					1	8.0	-14.13557

					2	16.0	-14.54225
					3	72.0	-15.42471
					4	624.0	-16.69170
4	1.773E-06	1.446E-08	-0.5736	-12.8452			
					1	8.0	-14.03793
					2	16.0	-14.43550
					3	72.0	-15.29819
					4	624.0	-16.53680
5	1.859E-06	1.732E-08	-0.5576	-12.8090			
					1	8.0	-13.96861
					2	16.0	-14.35513
					3	72.0	-15.19385
					4	624.0	-16.39805
6	1.560E-06	1.385E-08	-0.5634	-12.9800			
					1	8.0	-14.15159
					2	16.0	-14.54212
					3	72.0	-15.38953
					4	624.0	-16.60621
7	1.413E-06	1.454E-08	-0.5457	-13.0918			
					1	8.0	-14.22659
					2	16.0	-14.60486
					3	72.0	-15.42568
					4	624.0	-16.60418
8	1.279E-06	1.231E-08	-0.5538	-13.1859			
					1	8.0	-14.33745
					2	16.0	-14.72130
					3	72.0	-15.55421
					4	624.0	-16.75007
9	1.357E-06	1.993E-08	-0.5033	-13.1617			
					1	8.0	-14.20836
					2	16.0	-14.55725
					3	72.0	-15.31430
					4	624.0	-16.40124
10	1.153E-06	1.152E-08	-0.5493	-13.2926			
					1	8.0	-14.43485
					2	16.0	-14.81561
					3	72.0	-15.64183
					4	624.0	-16.82808
11	1.147E-06	9.453E-09	-0.5723	-13.2819			
					1	8.0	-14.47183
					2	16.0	-14.86849
					3	72.0	-15.72921
					4	624.0	-16.96499
12	1.055E-06	7.809E-09	-0.5851	-13.3565			
					1	8.0	-14.57313
					2	16.0	-14.97869
					3	72.0	-15.85871
					4	624.0	-17.12221
13	1.118E-06	1.197E-08	-0.5411	-13.3291			
					1	8.0	-14.45430
					2	16.0	-14.82936
					3	72.0	-15.64319
					4	624.0	-16.81166
14	1.040E-06	1.396E-08	-0.5141	-13.4198			
					1	8.0	-14.48882
					2	16.0	-14.84517
					3	72.0	-15.61843
					4	624.0	-16.72864
15	1.228E-06	1.895E-08	-0.4975	-13.2649			
					1	8.0	-14.29948

					2	16.0	-14.64436
					3	72.0	-15.39271
					4	624.0	-16.46716
16	1.423E-06	2.372E-08	-0.4882	-13.1246			
					1	8.0	-14.13989
					2	16.0	-14.47832
					3	72.0	-15.21268
					4	624.0	-16.26704
17	1.675E-06	2.372E-08	-0.5077	-12.9480			
					1	8.0	-14.00375
					2	16.0	-14.35566
					3	72.0	-15.11928
					4	624.0	-16.21565
18	1.675E-06	2.372E-08	-0.5077	-12.9480			
					1	8.0	-14.00375
					2	16.0	-14.35566
					3	72.0	-15.11928
					4	624.0	-16.21565

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

0-2 HR X/Q IS

SECTOR	DOWNWIND DISTANCE (METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS	1-4 DAYS	4-30 DAYS	ANNUAL AVERAGE	IN SECTOR	SECTOR
S	5000.	1.49E-06	7.06E-07	4.86E-07	2.16E-07	6.77E-08	1.63E-08	25.5	S
SSW	5000.	1.33E-06	6.04E-07	4.07E-07	1.73E-07	5.03E-08	1.11E-08	348.2	SSW
SW	5000.	1.64E-06	7.26E-07	4.83E-07	2.00E-07	5.63E-08	1.20E-08	33.9	SW
WSW	5000.	1.77E-06	8.01E-07	5.38E-07	2.27E-07	6.58E-08	1.45E-08	39.0	WSW
W	5000.	1.86E-06	8.58E-07	5.83E-07	2.52E-07	7.56E-08	1.73E-08	43.7	W
WNW	5000.	1.56E-06	7.15E-07	4.84E-07	2.07E-07	6.14E-08	1.39E-08	29.2	WNW
NW	5000.	1.41E-06	6.63E-07	4.54E-07	2.00E-07	6.15E-08	1.45E-08	22.2	NW
NNW	5000.	1.28E-06	5.93E-07	4.04E-07	1.76E-07	5.32E-08	1.23E-08	17.7	NNW
N	5000.	1.36E-06	6.75E-07	4.76E-07	2.23E-07	7.53E-08	1.99E-08	20.0	N
NNE	5000.	1.15E-06	5.38E-07	3.68E-07	1.61E-07	4.92E-08	1.15E-08	13.0	NNE
NE	5000.	1.15E-06	5.19E-07	3.49E-07	1.48E-07	4.29E-08	9.45E-09	13.5	NE
ENE	5000.	1.05E-06	4.69E-07	3.12E-07	1.30E-07	3.66E-08	7.81E-09	11.0	ENE
E	5000.	1.12E-06	5.28E-07	3.63E-07	1.61E-07	5.00E-08	1.20E-08	14.0	E
ESE	5000.	1.04E-06	5.10E-07	3.57E-07	1.65E-07	5.43E-08	1.40E-08	14.1	ESE
SE	5000.	1.23E-06	6.16E-07	4.37E-07	2.07E-07	7.05E-08	1.89E-08	15.9	SE
SSE	5000.	1.42E-06	7.23E-07	5.15E-07	2.47E-07	8.62E-08	2.37E-08	22.0	SSE
MAX X/Q		1.86E-06							
TOTAL HOURS AROUND SITE:		683.2							
SRP 2.3.4	5000.	1.67E-06	8.28E-07	5.83E-07					

2.72E-07	9.07E-08	2.37E-08		
SITE LIMIT		1.67E-06	8.28E-07	5.83E-07
2.72E-07	9.07E-08	2.37E-08		

THE FIVE-PERCENT-FOR-THE-ENTIRE-SITE X/Q IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

DOWNWIND SECTOR	DISTANCE (METERS)	FUMIGATION X/Q
S	5000.	9.60E-06
SSW	5000.	9.60E-06
SW	5000.	9.60E-06
WSW	5000.	9.60E-06
W	5000.	9.60E-06
WNW	5000.	9.60E-06
NW	5000.	9.60E-06
NNW	5000.	9.60E-06
N	5000.	9.60E-06
NNE	5000.	9.60E-06
NE	5000.	9.60E-06
ENE	5000.	9.60E-06
E	5000.	9.60E-06
ESE	5000.	9.60E-06
SE	5000.	9.60E-06
SSE	5000.	9.60E-06

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY.
CHECK THE REASONABLENESS OF THE ENVELOPES
COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY
FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	3.3	0.19	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00
A	4.4	0.04	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00
A	8.7	0.08	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00
A	10.8	0.04	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00
A	26.5	0.04	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00
B	2.2	0.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00
B	3.3	0.45	6000.	0.	131.	710.5	776.1	0.0	0.000E+00
B	4.4	0.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00
B	5.4	0.08	6000.	0.	131.	710.5	776.1	0.0	0.000E+00
B	6.5	0.11	6000.	0.	131.	710.5	776.1	0.0	0.000E+00
B	8.7	0.30	6000.	0.	131.	710.5	776.1	0.0	0.000E+00
B	10.8	0.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00
C	2.2	0.15	6000.	0.	131.	539.5	312.6	0.0	0.000E+00
C	3.3	0.68	6000.	0.	131.	539.5	312.6	0.0	0.000E+00
C	4.4	0.98	6000.	0.	131.	539.5	312.6	0.0	0.000E+00
C	5.4	0.79	6000.	0.	131.	539.5	312.6	0.0	0.000E+00
C	6.5	0.30	6000.	0.	131.	539.5	312.6	0.0	0.000E+00
C	8.7	0.53	6000.	0.	131.	539.5	312.6	0.0	0.000E+00

C	10.8	0.15	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	1.604E-07		
C	26.5	0.04	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	6.522E-08		
D	0.2	0.01	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.458E-05		
D	1.1	0.68	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.103E-06		
D	1.7	1.54	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	2.101E-06		
D	2.2	2.52	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.589E-06		
D	3.3	7.85	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.069E-06		
D	4.4	8.11	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	8.049E-07		
D	5.4	8.90	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	6.453E-07		
D	6.5	8.75	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	5.390E-07		
D	8.7	10.44	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	4.049E-07		
D	10.8	2.59	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.260E-07		
D	26.5	0.94	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.326E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.15	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	3.83	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.13	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.90	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.30	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.99	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.33	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.09	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.08	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	28.5	0.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.31	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.64	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	9.3	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05 8.835E-06 4.813E-06 3.103E-06 2.101E-06 1.880E-06 1.589E-06 1.273E-06 1.069E-06 1.024E-06
0.006 0.021 0.036 0.713 2.253 3.042 5.559 7.024 14.875 15.476
0.00035 0.00129 0.00226 0.04435 0.14021 0.18930 0.34595 0.43714 0.92578 0.96319

9.624E-07 8.049E-07 7.816E-07 6.935E-07 6.477E-07 6.453E-07 5.390E-07 5.260E-07 5.243E-07 4.876E-07
17.354 25.469 25.619 25.995 31.141 40.044 48.797 49.473 50.450 57.099
1.08010 1.58511 1.59446 1.61784 1.93815 2.49227 3.03703 3.07911 3.13990 3.55373

4.049E-07 3.960E-07 3.909E-07 3.528E-07 3.265E-07 3.260E-07 3.175E-07 2.656E-07 2.651E-07 2.574E-07
67.543 68.520 75.281 77.272 81.104 83.696 84.485 86.814 87.115 87.152
4.20371 4.26450 4.68534 4.80926 5.04774 5.20906 5.25816 5.40312 5.42182 5.42416

2.453E-07 2.130E-07 1.992E-07 1.975E-07 1.779E-07 1.732E-07 1.604E-07 1.336E-07 1.326E-07 1.304E-07
91.285 92.374 92.900 93.802 94.252 94.703 94.853 94.929 95.868 95.905
5.68134 5.74915 5.78188 5.83799 5.86605 5.89410 5.90346 5.90813 5.96658 5.96892

1.046E-07 1.017E-07 9.605E-08 8.733E-08 8.032E-08 7.655E-08 6.560E-08 6.522E-08 6.505E-08 5.282E-08
95.980 96.168 96.431 96.544 96.844 96.882 97.183 97.220 97.370 97.408
5.97360 5.98529 6.00166 6.00867 6.02737 6.02971 6.04842 6.05075 6.06011 6.06244

```
   4.918E-08   4.375E-08   3.851E-08   3.310E-08   3.100E-08   2.491E-08
1.998E-08   1.261E-08   1.253E-08
      97.558      97.596      97.671      98.986      99.023      99.662
99.925      99.962     100.000
     6.07180     6.07413     6.07881     6.16064     6.16298     6.20273
6.21909     6.22143     6.22377

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.925
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   2.490
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   4.682
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   5.205
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   5.254
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   5.678
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.834

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  1  1     -11.13557 -16.62451  -1.22090
  1  2     -13.74858 -16.76854  -1.28205
  1  3     -14.25352 -17.70105  -1.75740
  1  4     -14.75472 -20.69756  -3.54473
  1  5     -14.93644 -24.30114  -5.76196
  1  6     -14.96290 -25.89572  -6.74586
  1  7     -15.22084 -40.47401 -15.95844
  1  8     -15.43763     NUMXQ(K)=  8
    3.105E-06              0.062              1.000
    2.079E-06              0.187              3.000
    1.702E-06              0.311              5.000
    1.275E-06              0.622             10.000
    1.065E-06              0.934             15.000
    9.261E-07              1.245             20.000
    8.278E-07              1.556             25.000
    7.533E-07              1.867             30.000
    6.942E-07              2.178             35.000
    6.457E-07              2.490             40.000
    5.907E-07              2.801             45.000
```

5.445E-07	3.112	50.000
5.051E-07	3.423	55.000
4.712E-07	3.734	60.000
4.416E-07	4.045	65.000
4.154E-07	4.357	70.000
3.922E-07	4.668	75.000
3.524E-07	4.979	80.000
3.111E-07	5.290	85.000
2.572E-07	5.601	90.000
1.400E-06	0.5	8.03

ANNUAL AVERAGE = 1.56E-08

K= 1 FIVEXQ(K)= 1.400E-06 FIVEPR(K)= 8.034

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01	1.693E-02
0.376	1.428	5.034	57.369	65.311	97.183	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.13	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.511E-07
A	3.3	0.40	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	4.4	0.20	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.40	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.07	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.26	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
A	10.8	0.13	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.100E-08
B	1.1	0.07	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.028E-07
B	1.7	0.07	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	3.405E-07
B	2.2	0.46	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.574E-07
B	3.3	0.99	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.73	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.33	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	8.7	0.13	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.20	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
C	1.1	0.13	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.527E-06
C	1.7	0.20	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.034E-06
C	2.2	0.46	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	7.816E-07

C	3.3	0.93	6000.	0.	131.	539.5	
312.6	0.0	0.000E+00	0.000E+00	5.260E-07			
C	4.4	0.79	6000.	0.	131.	539.5	
312.6	0.0	0.000E+00	0.000E+00	3.960E-07			
C	5.4	0.40	6000.	0.	131.	539.5	
312.6	0.0	0.000E+00	0.000E+00	3.175E-07			
C	6.5	0.53	6000.	0.	131.	539.5	
312.6	0.0	0.000E+00	0.000E+00	2.651E-07			
C	8.7	0.13	6000.	0.	131.	539.5	
312.6	0.0	0.000E+00	0.000E+00	1.992E-07			
C	10.8	0.07	6000.	0.	131.	539.5	
312.6	0.0	0.000E+00	0.000E+00	1.604E-07			
C	26.5	0.20	6000.	0.	131.	539.5	
312.6	0.0	0.000E+00	0.000E+00	6.522E-08			
D	0.2	0.01	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	1.458E-05			
D	1.1	1.19	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	3.103E-06			
D	1.7	2.65	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	2.101E-06			
D	2.2	3.51	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	1.589E-06			
D	3.3	7.88	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	1.069E-06			
D	4.4	11.58	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	8.049E-07			
D	5.4	10.00	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	6.453E-07			
D	6.5	6.55	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	5.390E-07			
D	8.7	7.48	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	4.049E-07			
D	10.8	1.85	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	3.260E-07			
D	26.5	0.66	6000.	0.	131.	379.9	
99.2	0.0	0.000E+00	0.000E+00	1.326E-07			
E	0.3	0.02	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.835E-06			
E	1.2	0.99	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.880E-06			
E	1.8	1.92	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.273E-06			
E	2.4	2.85	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	9.624E-07			
E	3.5	6.09	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	6.477E-07			
E	4.7	8.67	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	4.876E-07			
E	5.9	5.23	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.909E-07			
E	7.0	1.99	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	3.265E-07			
E	9.3	1.72	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	2.453E-07			
E	11.6	0.66	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	1.975E-07			
E	28.5	0.07	9000.	0.	131.	389.6	
74.2	0.0	0.000E+00	0.000E+00	8.032E-08			

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   F         0.3       0.01    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.813E-06
   F         1.2       0.46    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.024E-06
   F         1.8       0.79    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.86    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.26    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       1.26    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F         5.9       0.60    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F         7.0       0.26    90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07

   G         1.2       0.60    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G         1.8       0.33    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G         2.4       0.60    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G         3.5       0.53    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G         4.7       0.20    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G         5.9       0.26    90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.527E-06	1.273E-06	1.069E-06	
0.010	0.029	0.041	1.232	3.880	4.873	8.382	8.514	10.434	18.312	
0.00035	0.00102	0.00144	0.04353	0.13705	0.17212	0.29604	0.30071	0.36852	0.64674	

1.034E-06	1.024E-06	9.624E-07	8.049E-07	7.816E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	
18.510	18.974	21.820	33.405	33.868	34.663	40.753	50.749	57.302	58.229	
0.65376	0.67012	0.77066	1.17981	1.19618	1.22424	1.43933	1.79238	2.02384	2.05658	

5.243E-07	5.028E-07	4.876E-07	4.049E-07	3.960E-07	3.909E-07	3.528E-07	3.405E-07	3.265E-07	3.260E-07	
59.090	59.156	67.828	75.308	76.103	81.332	82.590	82.656	84.642	86.496	
2.08697	2.08931	2.39559	2.65979	2.68784	2.87255	2.91697	2.91931	2.98945	3.05492	

3.175E-07	2.656E-07	2.651E-07	2.574E-07	2.453E-07	2.130E-07	1.992E-07	1.975E-07	1.779E-07	1.732E-07	
86.893	88.151	88.680	89.144	90.865	91.460	91.593	92.255	92.520	93.513	
3.06894	3.11337	3.13207	3.14844	3.20923	3.23027	3.23494	3.25832	3.26768	3.30275	

1.604E-07	1.511E-07	1.326E-07	1.304E-07	1.046E-07	1.017E-07	9.605E-08	8.032E-08	7.655E-08	6.560E-08	
93.579	93.711	94.373	95.101	95.432	95.830	96.425	96.492	96.690	96.822	
3.30509	3.30976	3.33314	3.35886	3.37055	3.38458	3.40562	3.40796	3.41497	3.41965	

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   6.522E-08   6.505E-08   6.137E-08   5.282E-08   5.126E-08   4.918E-08
3.851E-08   3.310E-08   3.100E-08   2.491E-08
      97.021      97.352      97.749      97.948      98.014      98.610
98.875      99.404      99.537      99.735
     3.42666     3.43835     3.45238     3.45940     3.46173     3.48278
3.49213     3.51083     3.51551     3.52252

   1.998E-08
     100.000
     3.53187

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.296
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.178
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.790
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.393
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.870
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.052
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.206
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.300

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1     -11.13557 -16.85311  -1.27175
  2  2     -13.35260 -17.18462  -1.39219
  2  3     -14.03259 -17.06442  -1.33910
  2  4     -14.25352 -19.13518  -2.32560
  2  5     -14.53378 -20.11686  -2.82175
  2  6     -14.75472 -27.50431  -6.70930
  2  7     -14.93644 -39.27229 -12.99159
  2  8     -15.22084 -65.32378 -27.06351
  2  9     -15.56855     NUMXQ(K)=  9
    3.562E-06              0.035              1.000
    2.389E-06              0.106              3.000
    1.960E-06              0.177              5.000
    1.465E-06              0.353             10.000
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1.209E-06	0.530	15.000
1.049E-06	0.706	20.000
9.368E-07	0.883	25.000
8.520E-07	1.060	30.000
7.858E-07	1.236	35.000
7.329E-07	1.413	40.000
6.886E-07	1.589	45.000
6.506E-07	1.766	50.000
5.978E-07	1.943	55.000
5.498E-07	2.119	60.000
5.085E-07	2.296	65.000
4.695E-07	2.472	70.000
4.318E-07	2.649	75.000
3.990E-07	2.825	80.000
3.433E-07	3.002	85.000
2.593E-07	3.179	90.000
1.243E-06	0.5	14.16

ANNUAL AVERAGE = 1.06E-08

K= 2 FIVEXQ(K)= 1.243E-06 FIVEPR(K)=14.157

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01	1.693E-02
1.589	4.568	8.407	61.773	67.279	97.484	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	2.2	0.75	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.511E-07
A	3.3	0.75	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	4.4	0.83	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.75	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.15	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.68	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
B	1.1	0.08	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.028E-07
B	1.7	0.08	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	3.405E-07
B	2.2	0.38	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.574E-07
B	3.3	0.68	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.83	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.30	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.23	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.08	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	26.5	0.08	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.148E-08
C	1.1	0.15	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.527E-06
C	1.7	0.75	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.034E-06
C	2.2	0.83	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	7.816E-07

C	3.3	1.13	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	5.260E-07						
C	4.4	0.60	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	3.960E-07						
C	5.4	0.23	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	3.175E-07						
C	8.7	0.30	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	1.992E-07						
D	0.2	0.02	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.458E-05						
D	1.1	2.11	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.103E-06						
D	1.7	6.02	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	2.101E-06						
D	2.2	5.87	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.589E-06						
D	3.3	9.02	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.069E-06						
D	4.4	9.40	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	8.049E-07						
D	5.4	8.87	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	6.453E-07						
D	6.5	6.02	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	5.390E-07						
D	8.7	3.91	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	4.049E-07						
D	10.8	0.98	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.260E-07						
D	26.5	0.75	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.326E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.58	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.84	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.14	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.19	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.88	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.28	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.45	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.03	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.68	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F        2.4       1.05     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       1.35     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.53     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.45     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F        7.0       0.23     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.779E-07

   G        1.2       0.45     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       1.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.38     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.08     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.527E-06	1.273E-06	1.069E-06	
0.017	0.039	0.064	2.170	8.186	9.314	15.179	15.329	16.908	25.932	
0.00054	0.00121	0.00200	0.06747	0.25451	0.28958	0.47195	0.47662	0.52572	0.80629	

1.034E-06	1.024E-06	9.624E-07	8.049E-07	7.816E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	
26.684	27.661	30.293	39.693	40.520	41.197	48.040	56.913	62.928	64.056	
0.82967	0.86006	0.94189	1.23415	1.25986	1.28091	1.49367	1.76956	1.95660	1.99167	

5.243E-07	5.028E-07	4.876E-07	4.049E-07	3.960E-07	3.909E-07	3.528E-07	3.405E-07	3.265E-07	3.260E-07	
65.109	65.184	72.328	76.238	76.840	82.028	83.382	83.457	85.337	86.314	
2.02440	2.02674	2.24885	2.37043	2.38913	2.55046	2.59254	2.59488	2.65333	2.68373	

3.175E-07	2.656E-07	2.574E-07	2.453E-07	2.130E-07	1.992E-07	1.975E-07	1.779E-07	1.732E-07	1.511E-07	
86.540	87.066	87.442	88.721	89.172	89.473	89.698	89.924	90.601	91.352	
2.69074	2.70711	2.71880	2.75854	2.77257	2.78192	2.78894	2.79595	2.81699	2.84037	

1.326E-07	1.304E-07	1.046E-07	1.017E-07	9.605E-08	8.733E-08	8.032E-08	7.655E-08	6.560E-08	6.505E-08	
92.104	92.932	93.232	93.984	94.436	94.661	95.112	95.939	96.015	96.391	
2.86375	2.88947	2.89882	2.92221	2.93623	2.94325	2.95728	2.98299	2.98533	2.99702	

6.137E-08 5.126E-08 4.918E-08 3.851E-08 3.310E-08 2.491E-08
2.148E-08 1.998E-08
97.143 97.293 97.669 98.346 99.474 99.850
99.925 100.000
3.02040 3.02508 3.03677 3.05781 3.09288 3.10457
3.10691 3.10925

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(2)= HANDCHECK 0.254
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(3)= HANDCHECK 0.471
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(4)= HANDCHECK 1.233
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(5)= HANDCHECK 1.768
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(6)= HANDCHECK 2.247
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(7)= HANDCHECK 2.548
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(8)= HANDCHECK 2.681
GRAPH: SLOPE LT -1.0 FOR LOW PERCENTAGES. XSAVE(9)= HANDCHECK 2.688

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
3	1	-11.13557	-16.46667	-1.21137
3	2	-13.07287	-16.88652	-1.36122
3	3	-13.35260	-18.40561	-1.94636
3	4	-14.03259	-17.51664	-1.55069
3	5	-14.25352	-20.21110	-2.83115
3	6	-14.53378	-22.81919	-4.13175
3	7	-14.75472	-30.91267	-8.27835
3	8	-14.93644	-60.12811	-23.41682
3	9	-14.96290	NUMXQ(K)= 9	

4.456E-06	0.031	1.000
3.057E-06	0.093	3.000
2.537E-06	0.155	5.000
1.923E-06	0.311	10.000
1.598E-06	0.466	15.000
1.317E-06	0.622	20.000
1.127E-06	0.777	25.000
9.893E-07	0.933	30.000

8.839E-07	1.088	35.000
8.012E-07	1.244	40.000
7.462E-07	1.399	45.000
6.995E-07	1.555	50.000
6.593E-07	1.710	55.000
6.072E-07	1.866	60.000
5.532E-07	2.021	65.000
5.069E-07	2.176	70.000
4.577E-07	2.332	75.000
4.086E-07	2.487	80.000
3.444E-07	2.643	85.000
1.528E-06	0.5	16.08

ANNUAL AVERAGE = 1.12E-08

K= 3 FIVEXQ(K)= 1.528E-06 FIVEPR(K)=16.081

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01
1.693E-02					
3.910	6.617	10.603	63.558	68.847	97.218
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.66	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.511E-07
A	3.3	1.52	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	4.4	1.19	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.73	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.86	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.73	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
A	10.8	0.07	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.100E-08
B	1.7	0.59	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	3.405E-07
B	2.2	0.53	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.574E-07
B	3.3	0.73	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	1.19	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.13	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.07	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.07	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
C	1.1	0.07	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.527E-06
C	1.7	0.92	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.034E-06
C	2.2	1.06	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	7.816E-07
C	3.3	1.12	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07

C	4.4	0.73	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	3.960E-07						
C	5.4	0.53	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	3.175E-07						
C	6.5	0.20	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	2.651E-07						
C	8.7	0.13	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	1.992E-07						
D	0.2	0.01	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.458E-05						
D	1.1	1.72	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.103E-06						
D	1.7	6.14	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	2.101E-06						
D	2.2	6.54	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.589E-06						
D	3.3	11.49	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.069E-06						
D	4.4	12.35	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	8.049E-07						
D	5.4	8.12	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	6.453E-07						
D	6.5	3.57	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	5.390E-07						
D	8.7	2.91	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	4.049E-07						
D	10.8	0.73	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.260E-07						
D	26.5	0.13	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.326E-07						
E	0.3	0.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.32	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.71	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	9.12	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	5.75	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	2.64	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	0.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	0.40	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.07	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	1.06	90000.	0.	131.	1000.0		

```
92.1      0.0      0.000E+00   0.000E+00   6.935E-07
   F        2.4       0.66     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       1.12     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.66     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07

   G        1.2       0.40     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.86     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.26     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.527E-06	1.273E-06	1.069E-06
0.014	0.039	0.057	1.774	7.917	9.239	15.778	15.844	18.552	30.046
0.00050	0.00140	0.00201	0.06279	0.28023	0.32699	0.55846	0.56080	0.65665	1.06347

1.034E-06	1.024E-06	9.624E-07	8.049E-07	7.816E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07
30.971	31.632	35.000	47.353	48.410	49.467	58.583	66.708	70.275	71.398
1.09620	1.11959	1.23882	1.67604	1.71345	1.75085	2.07350	2.36108	2.48733	2.52708

5.243E-07	4.876E-07	4.049E-07	3.960E-07	3.909E-07	3.528E-07	3.405E-07	3.265E-07	3.260E-07	3.175E-07
72.058	77.805	80.712	81.438	84.080	85.203	85.798	86.392	87.119	87.647
2.55046	2.75387	2.85674	2.88246	2.97598	3.01573	3.03677	3.05781	3.08353	3.10224

2.656E-07	2.651E-07	2.574E-07	2.453E-07	1.992E-07	1.975E-07	1.732E-07	1.511E-07	1.326E-07	1.304E-07
88.308	88.506	89.035	89.431	89.563	89.827	90.554	91.214	91.347	92.536
3.12562	3.13263	3.15134	3.16536	3.17004	3.17939	3.20511	3.22849	3.23317	3.27525

1.046E-07	1.017E-07	9.605E-08	8.733E-08	8.032E-08	7.655E-08	6.560E-08	6.505E-08	6.137E-08	5.126E-08
92.668	94.187	94.583	94.649	94.715	95.904	95.971	96.235	96.961	97.820
3.27993	3.33370	3.34773	3.35007	3.35241	3.39449	3.39683	3.40618	3.43190	3.46229

4.918E-08	3.851E-08	3.310E-08	3.100E-08	2.491E-08
98.084	98.811	99.670	99.736	100.000
3.47165	3.49736	3.52776	3.53010	3.53945

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.280
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.558
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.674
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.359
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.751
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.973
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.099
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.162
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
4	1	-11.13557	-16.33257	-1.17660
4	2	-13.07287	-16.40384	-1.20233
4	3	-13.35260	-17.54575	-1.65230
4	4	-14.03259	-17.35262	-1.56146
4	5	-14.25352	-22.67507	-4.24315
4	6	-14.53378	-27.02526	-6.51042
4	7	-14.75472	-36.12294	-11.33740
4	8	-14.96290	-68.75140	-28.81950
4	9	-15.22084	NUMXQ(K)=	9

4.339E-06	0.035	1.000
2.999E-06	0.106	3.000
2.497E-06	0.177	5.000
1.916E-06	0.354	10.000
1.623E-06	0.531	15.000
1.383E-06	0.708	20.000
1.209E-06	0.885	25.000
1.080E-06	1.062	30.000
9.799E-07	1.239	35.000
8.992E-07	1.416	40.000
8.325E-07	1.593	45.000

7.777E-07	1.770	50.000
7.318E-07	1.947	55.000
6.918E-07	2.124	60.000
6.565E-07	2.301	65.000
5.916E-07	2.478	70.000
5.216E-07	2.655	75.000
4.506E-07	2.832	80.000
3.703E-07	3.009	85.000
1.664E-06	0.5	14.13

ANNUAL AVERAGE = 1.35E-08

K= 4 FIVEXQ(K)= 1.664E-06 FIVEPR(K)=14.126

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01
1.693E-02					
5.747	9.050	13.806	67.524	71.703	97.952
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	1.7	0.15	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.999E-07
A	2.2	0.73	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.511E-07
A	3.3	2.89	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	4.4	2.11	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.64	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.39	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.10	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
B	1.7	0.24	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	3.405E-07
B	2.2	1.03	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.574E-07
B	3.3	1.67	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.29	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.24	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.15	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
C	1.7	0.05	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.034E-06
C	2.2	1.52	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	7.816E-07
C	3.3	0.83	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	0.49	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.24	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07

C	6.5	0.10	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	2.651E-07						
C	8.7	0.10	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	1.992E-07						
C	10.8	0.05	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	1.604E-07						
D	0.2	0.01	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.458E-05						
D	1.1	1.37	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.103E-06						
D	1.7	4.26	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	2.101E-06						
D	2.2	6.37	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.589E-06						
D	3.3	11.12	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.069E-06						
D	4.4	10.53	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	8.049E-07						
D	5.4	6.56	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	6.453E-07						
D	6.5	5.04	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	5.390E-07						
D	8.7	4.26	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	4.049E-07						
D	10.8	1.18	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.260E-07						
D	26.5	0.88	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.326E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	1.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	1.76	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	3.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	8.23	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	6.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	3.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	1.81	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	1.91	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	0.54	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	1.03	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.54	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.98	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.64	90000.	0.	131.	1000.0		

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92.1      0.0      0.000E+00   0.000E+00   5.243E-07
   F        3.5       0.73     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   3.528E-07
   F        4.7       0.69     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.656E-07
   F        5.9       0.24     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   2.130E-07
   F       28.5       0.20     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   4.375E-08

   G        1.2       0.39     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.34     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.273E-06	1.069E-06	1.034E-06	
0.011	0.034	0.048	1.419	5.680	6.855	13.221	14.984	26.101	26.150	
0.00054	0.00161	0.00228	0.06775	0.27116	0.32727	0.63122	0.71538	1.24612	1.24846	
1.024E-06	9.624E-07	8.049E-07	7.816E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	5.243E-07	
26.689	29.872	40.401	41.919	42.898	51.126	57.688	62.732	63.565	64.201	
1.27417	1.42615	1.92882	2.00130	2.04806	2.44085	2.75415	2.99497	3.03471	3.06511	
4.876E-07	4.049E-07	3.960E-07	3.909E-07	3.528E-07	3.405E-07	3.265E-07	3.260E-07	3.175E-07	2.656E-07	
70.225	74.486	74.975	78.305	79.040	79.285	81.097	82.272	82.517	83.203	
3.35269	3.55609	3.57947	3.73846	3.77353	3.78522	3.87173	3.92784	3.93953	3.97226	
2.651E-07	2.574E-07	2.453E-07	2.130E-07	1.999E-07	1.992E-07	1.975E-07	1.732E-07	1.604E-07	1.511E-07	
83.301	84.329	86.239	86.484	86.631	86.729	87.267	88.932	88.981	89.716	
3.97694	4.02604	4.11722	4.12891	4.13593	4.14060	4.16632	4.24581	4.24815	4.28322	
1.326E-07	1.304E-07	1.046E-07	1.017E-07	9.605E-08	8.733E-08	8.032E-08	7.655E-08	6.505E-08	6.137E-08	
90.597	90.891	91.136	94.025	94.417	94.564	95.593	97.698	97.943	98.580	
4.32531	4.33933	4.35103	4.48897	4.50767	4.51469	4.56379	4.66432	4.67601	4.70641	

5.126E-08	4.918E-08	4.375E-08	3.851E-08	3.310E-08	2.491E-08
98.972	99.216	99.412	99.510	99.853	100.000
4.72511	4.73680	4.74615	4.75083	4.76719	4.77421

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

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                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.630
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.245
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.751
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.350
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.735
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.925
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.114
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   4.661
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
5	1	-11.13557	-16.25385	-1.16301
5	2	-13.35260	-17.27923	-1.57404
5	3	-13.74858	-17.23998	-1.55654
5	4	-14.25352	-20.43974	-3.22426
5	5	-14.53378	-22.71801	-4.46805
5	6	-14.75472	-28.98403	-7.98379
5	7	-14.93644	-37.80130	-12.99498
5	8	-15.22084	-49.54667	-19.75440
5	9	-16.38534	NUMXQ(K)= 9	

4.071E-06	0.048	1.000
2.801E-06	0.143	3.000
2.326E-06	0.239	5.000
1.780E-06	0.477	10.000
1.480E-06	0.716	15.000
1.254E-06	0.955	20.000
1.098E-06	1.194	25.000
9.826E-07	1.432	30.000
8.932E-07	1.671	35.000
8.208E-07	1.910	40.000
7.609E-07	2.148	45.000

7.101E-07	2.387	50.000
6.664E-07	2.626	55.000
6.106E-07	2.865	60.000
5.450E-07	3.103	65.000
4.899E-07	3.342	70.000
4.269E-07	3.581	75.000
3.614E-07	3.819	80.000
2.678E-07	4.058	85.000
1.652E-07	4.297	90.000
1.747E-06	0.5	10.47

ANNUAL AVERAGE = 1.63E-08

K= 5 FIVEXQ(K)= 1.747E-06 FIVEPR(K)=10.473

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01
1.693E-02					
7.003	10.627	14.006	65.585	69.615	98.629
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	2.2	0.16	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.511E-07
A	3.3	1.37	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	4.4	2.19	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.93	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.16	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.16	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
A	10.8	0.05	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.100E-08
A	26.5	0.05	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.261E-08
B	2.2	0.27	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.574E-07
B	3.3	1.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	1.15	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.49	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	8.7	0.11	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.05	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
C	2.2	0.93	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	7.816E-07
C	3.3	2.19	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	1.15	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.60	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07

C	6.5	0.16	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	2.651E-07						
C	8.7	0.16	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	1.992E-07						
C	10.8	0.11	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	1.604E-07						
D	0.2	0.01	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.458E-05						
D	1.1	1.09	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.103E-06						
D	1.7	3.61	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	2.101E-06						
D	2.2	4.21	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.589E-06						
D	3.3	9.79	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.069E-06						
D	4.4	9.19	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	8.049E-07						
D	5.4	7.05	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	6.453E-07						
D	6.5	5.58	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	5.390E-07						
D	8.7	5.14	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	4.049E-07						
D	10.8	1.31	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.260E-07						
D	26.5	0.38	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.326E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.93	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	2.35	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	2.62	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	6.18	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	7.33	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	6.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	3.34	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	2.52	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	1.09	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.16	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.66	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.60	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.98	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.53	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	0.98	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.60	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.273E-06	1.069E-06	1.024E-06	
0.009	0.027	0.044	1.138	4.746	5.676	9.886	12.238	22.026	22.682	
0.00038	0.00115	0.00188	0.04864	0.20295	0.24269	0.42272	0.52326	0.94177	0.96982	

9.624E-07	8.049E-07	7.816E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	5.243E-07	4.876E-07	
25.306	34.493	35.422	36.024	42.203	49.256	54.834	57.021	58.005	65.333	
1.08205	1.47484	1.51458	1.54030	1.80450	2.10611	2.34459	2.43811	2.48019	2.79349	

4.049E-07	3.960E-07	3.909E-07	3.528E-07	3.265E-07	3.260E-07	3.175E-07	2.656E-07	2.651E-07	2.574E-07	
70.472	71.621	77.964	79.495	82.830	84.143	84.744	85.728	85.892	86.166	
3.01326	3.06236	3.33357	3.39904	3.54166	3.59777	3.62349	3.66557	3.67259	3.68428	

2.453E-07	2.130E-07	1.992E-07	1.975E-07	1.779E-07	1.732E-07	1.604E-07	1.511E-07	1.336E-07	1.326E-07	
88.681	89.283	89.447	90.540	90.650	91.689	91.798	91.962	92.017	92.399	
3.79183	3.81755	3.82456	3.87132	3.87600	3.92042	3.92510	3.93211	3.93445	3.95081	

1.304E-07	1.046E-07	1.017E-07	9.605E-08	8.032E-08	7.655E-08	6.560E-08	6.505E-08	6.137E-08	5.282E-08	
93.548	94.040	95.407	95.516	95.680	97.867	97.977	98.141	99.070	99.125	
3.99991	4.02096	4.07941	4.08408	4.09110	4.18462	4.18929	4.19631	4.23605	4.23839	

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   5.126E-08   4.918E-08   3.851E-08   3.310E-08   3.100E-08   2.491E-08
1.998E-08   1.261E-08
      99.289      99.344      99.508      99.781      99.836      99.891
99.945     100.000
     4.24541     4.24774     4.25476     4.26645     4.26879     4.27112
4.27346     4.27580

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.422
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.941
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.104
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.791
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.331
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.595
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.620
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.789
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   3.917

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  6  1     -11.13557 -16.52675  -1.20518
  6  2     -13.35260 -17.01777  -1.39161
  6  3     -13.74858 -17.49697  -1.59560
  6  4     -14.25352 -18.99019  -2.33018
  6  5     -14.53378 -19.93822  -2.82589
  6  6     -14.75472 -24.41940  -5.26889
  6  7     -14.93644 -29.61094  -8.15339
  6  8     -14.96290 -37.25393 -12.40764
  6  9     -15.22084 -55.37032 -22.60964
  6 10     -15.56855     NUMXQ(K)= 10
    3.697E-06              0.043              1.000
    2.518E-06              0.128              3.000
    2.080E-06              0.214              5.000
    1.580E-06              0.428             10.000
    1.299E-06              0.641             15.000
```

1.124E-06	0.855	20.000
9.911E-07	1.069	25.000
8.866E-07	1.283	30.000
8.052E-07	1.497	35.000
7.394E-07	1.710	40.000
6.850E-07	1.924	45.000
6.360E-07	2.138	50.000
5.793E-07	2.352	55.000
5.313E-07	2.565	60.000
4.901E-07	2.779	65.000
4.477E-07	2.993	70.000
4.106E-07	3.207	75.000
3.677E-07	3.421	80.000
3.121E-07	3.634	85.000
2.104E-07	3.848	90.000
1.466E-06	0.5	11.69

ANNUAL AVERAGE = 1.31E-08

K= 6 FIVEXQ(K)= 1.466E-06 FIVEPR(K)=11.694

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 9.858E-01 9.154E-01 4.157E-01 3.613E-01 2.081E-01
1.693E-02
5.085 8.202 13.506 60.868 66.408 99.289
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL
INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT:
97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-
96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316
ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE
1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y
SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS
METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	4.4	0.44	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.39	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.39	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.30	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
B	1.7	0.09	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	3.405E-07
B	2.2	0.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.574E-07
B	3.3	0.26	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.48	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.57	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.39	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.22	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
C	2.2	0.09	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	7.816E-07
C	3.3	0.26	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	1.13	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	1.35	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07
C	6.5	0.65	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07

C	8.7	0.30	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.992E-07
D	0.2	0.01	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.458E-05
D	1.1	0.61	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	3.103E-06
D	1.7	1.35	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	2.101E-06
D	2.2	2.35	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.589E-06
D	3.3	8.36	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.069E-06
D	4.4	12.27	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	8.049E-07
D	5.4	9.23	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	6.453E-07
D	6.5	5.61	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	5.390E-07
D	8.7	4.66	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	4.049E-07
D	10.8	0.65	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	3.260E-07
D	26.5	0.35	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.326E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	1.13	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.52	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	3.92	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	8.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	8.92	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	6.61	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	3.83	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	3.00	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	0.70	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.39	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.44	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.78	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	1.17	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.87	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	1.61	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	0.78	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.30	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.17	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.13	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.52	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.35	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NW SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.273E-06	1.069E-06	1.024E-06
0.005	0.027	0.038	0.647	1.996	3.128	5.478	7.001	15.357	15.792
0.00027	0.00143	0.00204	0.03478	0.10726	0.16804	0.29430	0.37613	0.82503	0.84841

9.624E-07	8.049E-07	7.816E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	5.243E-07	4.876E-07
19.708	31.981	32.068	32.851	40.945	50.171	55.785	56.046	57.221	66.143
1.05883	1.71816	1.72284	1.76492	2.19979	2.69546	2.99706	3.01109	3.07422	3.55352

4.049E-07	3.960E-07	3.909E-07	3.528E-07	3.405E-07	3.265E-07	3.260E-07	3.175E-07	2.656E-07	2.651E-07
70.799	71.931	78.545	80.417	80.504	84.333	84.986	86.335	87.945	88.598
3.80368	3.86447	4.21985	4.32039	4.32507	4.53081	4.56588	4.63836	4.72487	4.75994

2.574E-07	2.453E-07	2.130E-07	1.992E-07	1.975E-07	1.779E-07	1.732E-07	1.336E-07	1.326E-07	1.304E-07
88.642	91.644	92.428	92.732	93.429	93.733	93.994	94.169	94.517	94.995
4.76228	4.92360	4.96569	4.98205	5.01946	5.03583	5.04986	5.05921	5.07791	5.10363

1.046E-07	1.017E-07	9.605E-08	8.733E-08	8.032E-08	7.655E-08	6.560E-08	6.505E-08	6.137E-08	5.282E-08
95.561	95.648	95.692	96.083	96.475	96.910	97.128	97.258	97.650	97.694
5.13403	5.13870	5.14104	5.16208	5.18312	5.20650	5.21819	5.22521	5.24625	5.24859

```
   5.126E-08   4.918E-08   3.851E-08   3.310E-08   2.491E-08   1.998E-08
1.668E-08
      98.085      98.564      98.869      99.391      99.739      99.913
100.000
     5.26963     5.29535     5.31172     5.33977     5.35848     5.36783
5.37251
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
CHI/Q WITH RESPECT TO WHEN THE WIND BLOWS
SEC/CUBIC METER THE TOTAL TIME INTO THIS SECTOR ONLY

```
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.824
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.716
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.693
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.550
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.216
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.635
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.920
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   5.016
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
7	1	-11.13557	-16.66190	-1.21485
7	2	-13.74858	-16.16499	-1.00764
7	3	-14.03259	-16.51645	-1.17372
7	4	-14.25352	-18.66230	-2.28672
7	5	-14.53378	-19.56226	-2.78519
7	6	-14.75472	-22.78304	-4.65111
7	7	-14.96290	-30.08438	-8.99367
7	8	-15.22084	-53.57915	-23.20994
7	9	-15.43763		

NUMXQ(K)= 9

3.086E-06	0.054	1.000
2.080E-06	0.161	3.000
1.709E-06	0.269	5.000
1.288E-06	0.537	10.000
1.080E-06	0.806	15.000
9.683E-07	1.075	20.000
8.882E-07	1.343	25.000
8.260E-07	1.612	30.000

7.710E-07	1.880	35.000
7.226E-07	2.149	40.000
6.817E-07	2.418	45.000
6.464E-07	2.686	50.000
5.888E-07	2.955	55.000
5.391E-07	3.224	60.000
4.965E-07	3.492	65.000
4.537E-07	3.761	70.000
4.151E-07	4.029	75.000
3.756E-07	4.298	80.000
3.286E-07	4.567	85.000
2.653E-07	4.835	90.000
1.328E-06	0.5	9.31

ANNUAL AVERAGE = 1.41E-08

K= 7 FIVEXQ(K)= 1.328E-06 FIVEPR(K)= 9.307

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 9.858E-01 9.154E-01 4.157E-01 3.613E-01 2.081E-01
1.693E-02
1.610 3.699 7.485 52.924 60.072 98.216
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.

STABILITY CLASS	WINDSPEED METER/SEC	FREQUENCY PERCENT	DISTANCE METERS	TERRAIN HT METERS	EFF PLUME HT METERS	SIGMA-Y METERS	SIGMA-Z METERS	MEANDER-SY METERS	** CHI/Q VALUES (SEC/CUBIC METER) AT 131.4 METERS MEANDER	BLDG WAKE	USED
A	4.4	0.18	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
B	3.3	0.05	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.18	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.23	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.28	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.14	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.05	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
C	3.3	0.18	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	0.60	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.46	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07
C	6.5	0.55	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07
C	8.7	0.23	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.992E-07
C	10.8	0.05	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.604E-07
D	0.2	0.00	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.458E-05
D	1.1	0.60	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	3.103E-06
D	1.7	1.01	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	2.101E-06
D	2.2	2.31	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.589E-06
D	3.3	6.18	6000.	0.	131.	379.9					

CA=1292.SQ.METERS

99.2	0.0	0.000E+00	0.000E+00	1.069E-06		
D	4.4	10.79	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	8.049E-07		
D	5.4	9.41	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	6.453E-07		
D	6.5	6.78	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	5.390E-07		
D	8.7	2.68	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	4.049E-07		
D	10.8	0.46	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.260E-07		
D	26.5	0.05	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.326E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.74	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	3.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	8.12	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.79	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	9.00	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	6.55	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	4.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.51	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.05	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.92	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	2.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		

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   G         2.4        0.18    90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   4.918E-08
   G         3.5        0.23    90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   3.310E-08
   G         4.7        0.14    90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   2.491E-08
   G         5.9        0.14    90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   1.998E-08
   G         7.0        0.05    90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   1.668E-08
   G         9.3        0.05    90000.        0.        131.       1000.0
46.0      0.0       0.000E+00   0.000E+00   1.253E-08
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.273E-06	1.069E-06	1.024E-06	
0.005	0.019	0.034	0.633	1.648	2.386	4.693	6.676	12.858	13.412	
0.00025	0.00097	0.00170	0.03209	0.08353	0.12094	0.23784	0.33837	0.65167	0.67973	

9.624E-07	8.049E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	5.243E-07	4.876E-07	4.049E-07	
16.595	27.389	28.312	36.431	45.842	52.623	52.808	54.376	65.171	67.846	
0.84105	1.38815	1.43491	1.84641	2.32336	2.66705	2.67641	2.75590	3.30300	3.43861	

3.960E-07	3.909E-07	3.528E-07	3.265E-07	3.260E-07	3.175E-07	2.656E-07	2.651E-07	2.453E-07	2.130E-07	
68.446	77.442	79.472	86.022	86.484	86.945	88.421	88.975	93.726	95.848	
3.46900	3.92492	4.02779	4.35979	4.38317	4.40655	4.48137	4.50942	4.75024	4.85779	

1.992E-07	1.975E-07	1.779E-07	1.732E-07	1.604E-07	1.336E-07	1.326E-07	1.304E-07	1.046E-07	9.605E-08	
96.079	96.586	97.278	97.324	97.371	97.647	97.693	97.878	98.109	98.432	
4.86948	4.89520	4.93027	4.93261	4.93495	4.94898	4.95131	4.96067	4.97236	4.98872	

8.733E-08	8.032E-08	7.655E-08	6.560E-08	6.505E-08	5.282E-08	4.918E-08	3.310E-08	2.491E-08	1.998E-08	
98.708	98.754	98.939	99.077	99.170	99.216	99.400	99.631	99.769	99.908	
5.00275	5.00509	5.01444	5.02145	5.02613	5.02847	5.03782	5.04951	5.05653	5.06354	

```
   1.668E-08   1.253E-08
      99.954     100.000
     5.06588     5.06822

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.651
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.387
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.321
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.300
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.922
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.380
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.747
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   4.854

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1     -11.13557 -16.86632  -1.25550
  8  2     -13.74858 -16.24765  -1.00636
  8  3     -14.03259 -16.35373  -1.05456
  8  4     -14.25352 -17.89850  -1.83021
  8  5     -14.53378 -19.70344  -2.81200
  8  6     -14.75472 -20.94930  -3.51993
  8  7     -14.93644 -27.62181  -7.42602
  8  8     -15.22084 -37.13802 -13.12457
  8  9     -15.36220     NUMXQ(K)=  9
    2.933E-06              0.051              1.000
    1.955E-06              0.152              3.000
    1.597E-06              0.253              5.000
    1.195E-06              0.507             10.000
    1.011E-06              0.760             15.000
    9.088E-07              1.014             20.000
    8.342E-07              1.267             25.000
    7.750E-07              1.520             30.000
    7.260E-07              1.774             35.000
    6.853E-07              2.027             40.000
    6.507E-07              2.281             45.000
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6.031E-07	2.534	50.000
5.593E-07	2.788	55.000
5.216E-07	3.041	60.000
4.886E-07	3.294	65.000
4.453E-07	3.548	70.000
4.075E-07	3.801	75.000
3.707E-07	4.055	80.000
3.355E-07	4.308	85.000
2.833E-07	4.561	90.000
1.202E-06	0.5	9.87

ANNUAL AVERAGE = 1.21E-08

K= 8 FIVEXQ(K)= 1.202E-06 FIVEPR(K)= 9.865

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01	1.693E-02
0.185	1.107	3.183	43.461	53.116	98.801	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.05	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08	
A	5.4	0.16	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08	
A	6.5	0.09	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08	
A	8.7	0.14	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08	
B	3.3	0.02	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07	
B	4.4	0.09	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07	
B	5.4	0.40	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07	
B	6.5	0.33	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08	
B	8.7	0.51	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08	
B	10.8	0.14	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08	
B	26.5	0.02	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.148E-08	
C	2.2	0.02	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	7.816E-07	
C	3.3	0.26	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07	
C	4.4	0.47	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07	
C	5.4	0.93	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07	
C	6.5	0.86	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07	
C	8.7	1.12	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.992E-07	
C	10.8	0.23	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.604E-07	

AT 131.4 METERS
CA=1292.SQ.METERS

```
   C        26.5       0.02     6000.        0.        131.       539.5
312.6      0.0      0.000E+00   0.000E+00   6.522E-08

   D         0.2       0.00     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   1.458E-05
   D         1.1       0.28     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   3.103E-06
   D         1.7       0.68     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   2.101E-06
   D         2.2       0.91     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   1.589E-06
   D         3.3       3.99     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   1.069E-06
   D         4.4       7.47     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   8.049E-07
   D         5.4       7.71     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   6.453E-07
   D         6.5       6.40     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   5.390E-07
   D         8.7       8.06     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   4.049E-07
   D        10.8       2.24     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   3.260E-07
   D        26.5       0.93     6000.        0.        131.       379.9
99.2       0.0      0.000E+00   0.000E+00   1.326E-07

   E         0.3       0.01     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   8.835E-06
   E         1.2       0.61     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   1.880E-06
   E         1.8       1.03     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   1.273E-06
   E         2.4       1.40     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   9.624E-07
   E         3.5       6.14     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   6.477E-07
   E         4.7      10.09     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   4.876E-07
   E         5.9       9.88     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   3.909E-07
   E         7.0       6.63     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   3.265E-07
   E         9.3       8.57     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   2.453E-07
   E        11.6       1.68     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   1.975E-07
   E        28.5       0.21     9000.        0.        131.       389.6
74.2       0.0      0.000E+00   0.000E+00   8.032E-08

   F         0.3       0.01    90000.        0.        131.      1000.0
92.1       0.0      0.000E+00   0.000E+00   4.813E-06
   F         1.2       0.28    90000.        0.        131.      1000.0
92.1       0.0      0.000E+00   0.000E+00   1.024E-06
   F         1.8       0.26    90000.        0.        131.      1000.0
92.1       0.0      0.000E+00   0.000E+00   6.935E-07
   F         2.4       0.77    90000.        0.        131.      1000.0
92.1       0.0      0.000E+00   0.000E+00   5.243E-07
   F         3.5       1.75    90000.        0.        131.      1000.0
92.1       0.0      0.000E+00   0.000E+00   3.528E-07
   F         4.7       2.08    90000.        0.        131.      1000.0
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92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.07	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.51	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.14	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.02	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.02	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05 8.835E-06 4.813E-06 3.103E-06 2.101E-06 1.880E-06 1.589E-06 1.273E-06 1.069E-06 1.024E-06
0.002 0.014 0.021 0.301 0.979 1.586 2.496 3.524 7.516 7.796
0.00023 0.00140 0.00213 0.03018 0.09799 0.15878 0.24996 0.35283 0.75264 0.78069

9.624E-07 8.049E-07 7.816E-07 6.935E-07 6.477E-07 6.453E-07 5.390E-07 5.260E-07 5.243E-07 4.876E-07
9.197 16.669 16.692 16.949 23.090 30.795 37.192 37.449 38.220 48.306
0.92097 1.66914 1.67148 1.69720 2.31210 3.08365 3.72427 3.74999 3.82715 4.83718

4.049E-07 3.960E-07 3.909E-07 3.528E-07 3.265E-07 3.260E-07 3.175E-07 2.656E-07 2.651E-07 2.453E-07
56.361 56.828 66.705 68.456 75.087 77.328 78.262 80.340 81.204 89.773
5.64380 5.69056 6.67955 6.85490 7.51890 7.74335 7.83687 8.04496 8.13147 8.98952

2.130E-07 1.992E-07 1.975E-07 1.779E-07 1.732E-07 1.604E-07 1.336E-07 1.326E-07 1.304E-07 1.076E-07
90.847 91.968 93.649 94.583 94.606 94.840 95.400 96.334 96.428 96.451
9.09707 9.20930 9.37764 9.47116 9.47350 9.49688 9.55299 9.64651 9.65586 9.65820

1.046E-07 9.605E-08 8.733E-08 8.032E-08 7.655E-08 6.560E-08 6.522E-08 6.505E-08 6.137E-08 5.282E-08
96.848 97.035 97.362 97.572 97.618 98.132 98.155 98.366 98.529 98.669
9.69795 9.71665 9.74938 9.77043 9.77510 9.82654 9.82888 9.84992 9.86629 9.88031

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   5.126E-08   4.918E-08   3.851E-08   3.310E-08   2.491E-08   2.148E-08
1.998E-08   1.668E-08   1.253E-08
      98.762      98.949      99.089      99.603      99.743      99.766
99.953      99.977     100.000
     9.88966     9.90837     9.92240     9.97383     9.98786     9.99020
10.00890    10.01124    10.01358

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.752
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   4.834
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   6.676
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.740
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   8.986
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   9.374

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  9  1     -11.13557 -16.70409  -1.21549
  9  2     -13.74858 -15.93139  -0.89771
  9  3     -14.25352 -16.77382  -1.34843
  9  4     -14.53378 -16.81589  -1.37376
  9  5     -14.75472 -18.26920  -2.34238
  9  6     -14.93644 -19.92017  -3.50274
  9  7     -15.22084 -27.56539  -9.20126
  9  8     -15.43763     NUMXQ(K)=  8
    2.381E-06             0.100              1.000
    1.570E-06             0.300              3.000
    1.274E-06             0.501              5.000
    9.728E-07             1.001             10.000
    8.455E-07             1.502             15.000
    7.616E-07             2.003             20.000
    7.001E-07             2.503             25.000
    6.520E-07             3.004             30.000
    5.973E-07             3.505             35.000
    5.499E-07             4.005             40.000
    5.104E-07             4.506             45.000
    4.766E-07             5.007             50.000
    4.470E-07             5.507             55.000
```

4.211E-07	6.008	60.000
3.982E-07	6.509	65.000
3.687E-07	7.010	70.000
3.386E-07	7.510	75.000
3.058E-07	8.011	80.000
2.725E-07	8.512	85.000
2.421E-07	9.012	90.000
1.275E-06	0.5	4.99

ANNUAL AVERAGE = 1.95E-08

K= 9 FIVEXQ(K)= 1.275E-06 FIVEPR(K)= 4.993

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01
1.693E-02					
0.444	1.961	5.884	44.551	52.287	98.529
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.04	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	4.4	0.08	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.16	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.12	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.08	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
B	3.3	0.16	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.16	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.36	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.20	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.20	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
B	26.5	0.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.148E-08
C	3.3	0.16	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	0.52	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.56	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07
C	6.5	0.68	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07
C	8.7	0.72	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.992E-07
D	0.2	0.00	6000.	0.	131.	379.9					

99.2	0.0	0.000E+00	0.000E+00	1.458E-05		
D	1.1	0.24	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.103E-06		
D	1.7	0.68	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	2.101E-06		
D	2.2	1.24	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.589E-06		
D	3.3	4.39	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.069E-06		
D	4.4	8.10	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	8.049E-07		
D	5.4	7.70	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	6.453E-07		
D	6.5	5.27	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	5.390E-07		
D	8.7	4.31	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	4.049E-07		
D	10.8	0.84	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.260E-07		
D	26.5	0.24	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.326E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.60	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.59	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.82	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	10.89	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	10.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	7.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	5.98	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	0.76	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.08	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.16	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	3.55	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	0.76	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.12	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.32	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.04	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.36	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.76	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.64	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NNE SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.273E-06	1.069E-06	1.024E-06		
0.002	0.014	0.027	0.266	0.944	1.583	2.819	4.415	8.803	9.282		
0.00012	0.00083	0.00156	0.01559	0.05534	0.09275	0.16523	0.25875	0.51593	0.54399		
9.624E-07	8.049E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	5.243E-07	4.876E-07	4.049E-07		
11.875	19.973	20.771	28.590	36.290	41.556	41.715	42.872	53.763	58.072		
0.69596	1.17058	1.21734	1.67559	2.12684	2.43546	2.44481	2.51261	3.15089	3.40340		
3.960E-07	3.909E-07	3.528E-07	3.265E-07	3.260E-07	3.175E-07	2.656E-07	2.651E-07	2.453E-07	2.130E-07		
58.590	68.843	72.394	79.654	80.492	81.051	83.923	84.601	90.585	92.420		
3.43379	4.03467	4.24275	4.66828	4.71738	4.75011	4.91845	4.95819	5.30890	5.41645		
1.992E-07	1.975E-07	1.779E-07	1.732E-07	1.336E-07	1.326E-07	1.304E-07	1.076E-07	1.046E-07	1.017E-07		
93.138	93.896	94.654	94.814	95.612	95.851	96.011	96.130	96.489	96.529		
5.45853	5.50295	5.54738	5.55673	5.60349	5.61752	5.62687	5.63389	5.65493	5.65727		
9.605E-08	8.733E-08	8.032E-08	7.655E-08	6.560E-08	6.505E-08	6.137E-08	5.282E-08	5.126E-08	4.918E-08		
96.848	97.048	97.128	97.207	97.407	97.447	97.606	97.646	97.766	98.125		
5.67597	5.68766	5.69234	5.69701	5.70870	5.71104	5.72039	5.72273	5.72975	5.75079		

3.851E-08	3.310E-08	2.491E-08	2.148E-08	1.998E-08	1.668E-08
98.205	98.963	99.601	99.641	99.801	100.000
5.75546	5.79989	5.83730	5.83963	5.84899	5.86068

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.001
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.695
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.148
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.031
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.714
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   5.305
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   5.499
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
10	1	-11.13557	-16.79237	-1.19743
10	2	-11.63677	-16.80826	-1.20112
10	3	-13.85379	-16.13456	-0.92723
10	4	-14.25352	-17.61403	-1.65651
10	5	-14.53378	-18.18832	-1.96535
10	6	-14.75472	-19.05653	-2.46231
10	7	-14.93644	-23.24091	-4.96304
10	8	-15.22084	-35.02189	-12.25342
10	9	-15.43763	NUMXQ(K)= 9	

2.474E-06	0.059	1.000
1.671E-06	0.176	3.000
1.373E-06	0.293	5.000
1.036E-06	0.586	10.000
8.895E-07	0.879	15.000
8.046E-07	1.172	20.000
7.424E-07	1.465	25.000
6.939E-07	1.758	30.000
6.544E-07	2.051	35.000
6.030E-07	2.344	40.000
5.548E-07	2.637	45.000
5.142E-07	2.930	50.000
4.780E-07	3.223	55.000

4.426E-07	3.516	60.000
4.119E-07	3.809	65.000
3.835E-07	4.102	70.000
3.541E-07	4.396	75.000
3.283E-07	4.689	80.000
2.861E-07	4.982	85.000
2.492E-07	5.275	90.000
1.107E-06	0.5	8.53

ANNUAL AVERAGE = 1.15E-08

K= 10 FIVEXQ(K)= 1.107E-06 FIVEPR(K)= 8.531

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01
1.693E-02					
0.479	1.636	4.269	37.263	49.642	97.527
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.09	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	4.4	0.09	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.14	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	8.7	0.09	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
B	3.3	0.14	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.19	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.28	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.28	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.14	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.05	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
C	3.3	0.33	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	0.42	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.70	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07
C	6.5	0.52	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07
C	8.7	0.75	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.992E-07
C	10.8	0.14	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.604E-07
C	26.5	0.09	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	6.522E-08
D	0.2	0.00	6000.	0.	131.	379.9					

99.2	0.0	0.000E+00	0.000E+00	1.458E-05		
D	1.1	0.42	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.103E-06		
D	1.7	1.08	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	2.101E-06		
D	2.2	1.32	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.589E-06		
D	3.3	4.60	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.069E-06		
D	4.4	6.01	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	8.049E-07		
D	5.4	6.67	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	6.453E-07		
D	6.5	3.76	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	5.390E-07		
D	8.7	4.27	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	4.049E-07		
D	10.8	0.70	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.260E-07		
D	26.5	0.23	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.326E-07		
E	0.3	0.02	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.80	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	2.96	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	7.70	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	8.97	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	7.75	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	4.65	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	7.47	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.27	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.09	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.70	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.80	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	1.27	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	4.65	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	4.93	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	3.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.46	90000.	0.	131.	1000.0

92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	1.08	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.23	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.28	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	1.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.69	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.47	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.23	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.273E-06	1.069E-06	1.024E-06
0.003	0.019	0.037	0.460	1.540	2.339	3.654	5.627	10.231	10.935
0.00017	0.00094	0.00185	0.02289	0.07667	0.11641	0.18188	0.28007	0.50920	0.54427

9.624E-07	8.049E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	5.243E-07	4.876E-07	4.049E-07
13.895	19.908	20.706	28.410	35.081	38.839	39.167	40.436	49.408	53.683
0.69157	0.99084	1.03058	1.41402	1.74602	1.93306	1.94943	2.01256	2.45912	2.67188

3.960E-07	3.909E-07	3.528E-07	3.265E-07	3.260E-07	3.175E-07	2.656E-07	2.651E-07	2.453E-07	2.130E-07
54.105	61.856	66.507	71.157	71.862	72.567	77.499	78.016	85.485	88.585
2.69292	3.07870	3.31016	3.54163	3.57670	3.61177	3.85726	3.88298	4.25473	4.40904

1.992E-07	1.975E-07	1.779E-07	1.732E-07	1.604E-07	1.336E-07	1.326E-07	1.304E-07	1.076E-07	1.046E-07
89.337	90.605	92.061	92.202	92.343	93.424	93.658	93.846	93.893	94.175
4.44645	4.50958	4.58205	4.58907	4.59608	4.64986	4.66155	4.67090	4.67324	4.68727

1.017E-07	9.605E-08	8.733E-08	8.032E-08	7.655E-08	6.560E-08	6.522E-08	6.505E-08	6.137E-08	5.282E-08
94.269	94.316	94.598	94.692	94.786	94.927	95.021	95.256	95.396	95.443
4.69194	4.69428	4.70831	4.71298	4.71766	4.72467	4.72935	4.74104	4.74805	4.75039

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   4.918E-08   3.851E-08   3.310E-08   2.491E-08   1.998E-08   1.668E-08
1.253E-08
      95.725      95.819      96.853      98.544      99.295      99.765
100.000
     4.76442     4.76910     4.82053     4.90470     4.94211     4.96549
4.97718

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.509
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.744
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.457
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.076
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.574
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.251
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   4.506

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 11  1     -11.13557 -16.99086  -1.26162
 11  2     -13.74858 -16.25486  -0.97524
 11  3     -13.85379 -16.64715  -1.13457
 11  4     -14.25352 -18.40912  -1.96974
 11  5     -14.53378 -18.98420  -2.26204
 11  6     -14.75472 -19.80401  -2.70049
 11  7     -14.93644 -21.32576  -3.54475
 11  8     -15.22084 -28.80718  -7.88874
 11  9     -15.43763     NUMXQ(K)=  9
    2.659E-06            0.050            1.000
    1.770E-06            0.149            3.000
    1.445E-06            0.249            5.000
    1.080E-06            0.498           10.000
    9.328E-07            0.747           15.000
    8.271E-07            0.995           20.000
    7.512E-07            1.244           25.000
    6.928E-07            1.493           30.000
    6.460E-07            1.742           35.000
    5.806E-07            1.991           40.000
```

5.271E-07	2.240	45.000
4.820E-07	2.489	50.000
4.393E-07	2.737	55.000
4.030E-07	2.986	60.000
3.683E-07	3.235	65.000
3.366E-07	3.484	70.000
3.042E-07	3.733	75.000
2.737E-07	3.982	80.000
2.476E-07	4.231	85.000
2.025E-07	4.479	90.000
1.078E-06	0.5	10.05

ANNUAL AVERAGE = 9.40E-09

K= 11 FIVEXQ(K)= 1.078E-06 FIVEPR(K)=10.046

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01
1.693E-02					
0.423	1.503	4.463	33.544	51.600	95.256
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	5.4	0.14	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.28	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.05	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
A	10.8	0.09	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.100E-08
A	26.5	0.05	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.261E-08
B	3.3	0.05	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.09	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.24	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.33	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.61	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.09	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
B	26.5	0.05	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.148E-08
C	3.3	0.14	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	0.19	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.66	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07
C	6.5	0.71	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07
C	8.7	1.13	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.992E-07
C	10.8	0.14	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.604E-07

C	26.5	0.09	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	6.522E-08
D	0.2	0.00	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.458E-05
D	1.1	0.28	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	3.103E-06
D	1.7	0.42	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	2.101E-06
D	2.2	1.13	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.589E-06
D	3.3	4.24	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.069E-06
D	4.4	3.77	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	8.049E-07
D	5.4	4.19	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	6.453E-07
D	6.5	4.85	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	5.390E-07
D	8.7	6.54	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	4.049E-07
D	10.8	0.94	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	3.260E-07
D	26.5	0.56	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.326E-07
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.89	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	1.65	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	1.69	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	5.22	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	5.46	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	7.01	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	7.39	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	8.33	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.79	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.09	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.02	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.71	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.85	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	1.69	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	3.01	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	3.528E-07
F	4.7	3.62	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	4.00	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.68	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.77	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.05	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.47	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.38	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.89	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.18	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	1.88	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.08	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.66	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

ENE SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05 8.835E-06 4.813E-06 3.103E-06 2.101E-06 1.880E-06 1.589E-06 1.273E-06 1.069E-06 1.024E-06
0.002 0.019 0.038 0.320 0.744 1.638 2.768 4.415 8.650 9.356
0.00012 0.00097 0.00188 0.01591 0.03695 0.08137 0.13749 0.21932 0.42974 0.46481

9.624E-07 8.049E-07 6.935E-07 6.477E-07 6.453E-07 5.390E-07 5.260E-07 5.243E-07 4.876E-07 4.049E-07
11.051 14.816 15.663 20.887 25.075 29.923 30.064 31.758 37.218 43.760
0.54898 0.73602 0.77811 1.03763 1.24571 1.48653 1.49355 1.57771 1.84893 2.17391

3.960E-07 3.909E-07 3.528E-07 3.265E-07 3.260E-07 3.175E-07 2.656E-07 2.651E-07 2.453E-07 2.130E-07
43.948 50.960 53.972 61.361 62.302 62.961 66.585 67.291 75.621 79.622
2.18326 2.53163 2.68127 3.04834 3.09510 3.12783 3.30786 3.34293 3.75676 3.95549

1.992E-07 1.975E-07 1.779E-07 1.732E-07 1.604E-07 1.336E-07 1.326E-07 1.304E-07 1.076E-07 1.046E-07
80.751 82.540 85.222 85.269 85.410 89.175 89.740 89.834 90.823 91.058
4.01161 4.10045 4.23372 4.23606 4.24307 4.43011 4.45817 4.46285 4.51195 4.52364

9.605E-08 8.733E-08 8.032E-08 6.560E-08 6.522E-08 6.505E-08 6.137E-08 5.282E-08 5.126E-08 4.918E-08
91.529 91.858 91.952 92.564 92.658 93.035 93.176 93.270 93.552 93.929
4.54702 4.56338 4.56806 4.59845 4.60313 4.62183 4.62885 4.63352 4.64755 4.66625

```
   4.375E-08   3.851E-08   3.310E-08   3.100E-08   2.491E-08   2.148E-08
1.998E-08   1.668E-08   1.261E-08   1.253E-08
      93.976      94.023      94.917      95.011      96.188      96.235
98.117      99.200      99.247      99.906
     4.66859     4.67093     4.71535     4.72003     4.77848     4.78082
4.87434     4.92812     4.93045     4.96319

   1.009E-08
     100.000
     4.96786

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.001
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.548
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.244
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.529
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   3.092
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.753
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   4.097
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   4.230

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 12  1     -11.13557 -16.37611  -1.10931
 12  2     -11.63677 -17.11637  -1.28258
 12  3     -13.85379 -17.23652  -1.32981
 12  4     -14.25352 -18.15505  -1.73929
 12  5     -14.75472 -18.81047  -2.07454
 12  6     -14.93644 -21.01457  -3.25484
 12  7     -15.22084 -24.74868  -5.35261
 12  8     -15.43763 -27.60452  -6.99434
 12  9     -15.54231     NUMXQ(K)=  9
    2.515E-06             0.050             1.000
    1.663E-06             0.149             3.000
    1.353E-06             0.248             5.000
    1.006E-06             0.497            10.000
```

8.330E-07	0.745	15.000
7.235E-07	0.994	20.000
6.463E-07	1.242	25.000
5.713E-07	1.490	30.000
5.132E-07	1.739	35.000
4.667E-07	1.987	40.000
4.285E-07	2.236	45.000
3.965E-07	2.484	50.000
3.651E-07	2.732	55.000
3.374E-07	2.981	60.000
3.066E-07	3.229	65.000
2.751E-07	3.478	70.000
2.483E-07	3.726	75.000
2.135E-07	3.974	80.000
1.794E-07	4.223	85.000
1.003E-06	0.5	10.06

ANNUAL AVERAGE = 7.77E-09

K= 12 FIVEXQ(K)= 1.003E-06 FIVEPR(K)=10.065

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01	1.693E-02
0.612	2.071	5.130	32.052	53.437	92.988	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 131.4 METERS
CA=1292.SQ.METERS

A	4.4	0.03	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.06	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.39	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.42	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
A	10.8	0.30	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.100E-08
A	26.5	0.18	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.261E-08
B	2.2	0.03	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.574E-07
B	3.3	0.09	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.09	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.39	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.30	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.63	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.33	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
B	26.5	0.21	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.148E-08
C	3.3	0.06	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	0.48	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.69	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07
C	6.5	0.33	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07

C	8.7	1.44	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	1.992E-07						
C	10.8	0.87	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	1.604E-07						
C	26.5	0.48	6000.	0.	131.	539.5	312.6	0.0
0.000E+00	0.000E+00	6.522E-08						
D	0.2	0.00	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.458E-05						
D	1.1	0.24	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.103E-06						
D	1.7	0.54	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	2.101E-06						
D	2.2	0.90	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.589E-06						
D	3.3	2.66	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.069E-06						
D	4.4	3.26	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	8.049E-07						
D	5.4	4.01	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	6.453E-07						
D	6.5	4.25	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	5.390E-07						
D	8.7	9.30	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	4.049E-07						
D	10.8	6.31	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	3.260E-07						
D	26.5	3.71	6000.	0.	131.	379.9	99.2	0.0
0.000E+00	0.000E+00	1.326E-07						
E	0.3	0.02	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.835E-06						
E	1.2	0.90	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.880E-06						
E	1.8	0.72	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.273E-06						
E	2.4	1.26	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	9.624E-07						
E	3.5	3.05	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	6.477E-07						
E	4.7	3.59	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	4.876E-07						
E	5.9	5.77	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.909E-07						
E	7.0	6.37	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	3.265E-07						
E	9.3	12.47	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	2.453E-07						
E	11.6	2.63	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	1.975E-07						
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0
0.000E+00	0.000E+00	8.032E-08						
F	0.3	0.01	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	4.813E-06						
F	1.2	0.42	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	1.024E-06						
F	1.8	0.48	90000.	0.	131.	1000.0	92.1	0.0
0.000E+00	0.000E+00	6.935E-07						
F	2.4	0.66	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.29	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	2.63	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	2.54	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	3.83	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.69	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.03	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.24	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.15	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.75	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.84	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.81	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	1.11	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.03	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.273E-06	1.069E-06	1.024E-06
0.002	0.019	0.030	0.269	0.808	1.705	2.603	3.321	5.983	6.402
0.00015	0.00150	0.00235	0.02106	0.06314	0.13328	0.20342	0.25953	0.46762	0.50035

9.624E-07	8.049E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	5.243E-07	4.876E-07	4.049E-07
7.658	10.918	11.397	14.448	18.457	22.704	22.764	23.422	27.012	36.315
0.59855	0.85339	0.89080	1.12928	1.44258	1.77458	1.77926	1.83069	2.11126	2.83838

3.960E-07	3.909E-07	3.528E-07	3.265E-07	3.260E-07	3.175E-07	2.656E-07	2.651E-07	2.574E-07	2.453E-07
36.793	42.567	43.853	50.224	56.536	57.224	59.856	60.186	60.215	72.689
2.87579	3.32703	3.42757	3.92557	4.41889	4.47267	4.67842	4.70413	4.70647	5.68143

2.130E-07	1.992E-07	1.975E-07	1.779E-07	1.732E-07	1.604E-07	1.336E-07	1.326E-07	1.304E-07	1.076E-07
75.232	76.668	79.300	81.843	81.932	82.800	86.629	90.338	90.428	91.116
5.88017	5.99239	6.19814	6.39687	6.40388	6.47169	6.77096	7.06087	7.06789	7.12166

1.046E-07	9.605E-08	8.733E-08	8.032E-08	7.655E-08	6.560E-08	6.522E-08	6.505E-08	6.137E-08	5.282E-08
91.505	91.744	92.043	92.342	92.372	93.000	93.479	93.629	93.688	94.017
7.15205	7.17076	7.19414	7.21752	7.21986	7.26896	7.30636	7.31805	7.32273	7.34845

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   5.126E-08   4.918E-08   4.375E-08   3.851E-08   3.310E-08   3.100E-08
2.491E-08   2.148E-08   1.998E-08   1.668E-08
      94.406      94.616      94.646      95.064      95.812      96.111
96.949      97.158      97.966      99.073
     7.37884     7.39521     7.39755     7.43028     7.48873     7.51211
7.57758     7.59394     7.65707     7.74358

   1.261E-08   1.253E-08   1.009E-08
      99.252      99.970     100.000
     7.75761     7.81372     7.81606
```

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

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 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.002
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.203
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.441
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.324
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.415
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   5.678
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   6.194
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   7.057

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1     -11.13557 -15.89131  -1.01938
 13  2     -11.63677 -17.14327  -1.31934
 13  3     -13.35260 -17.11931  -1.31100
 13  4     -14.25352 -17.37684  -1.42881
 13  5     -14.75472 -17.30474  -1.38953
 13  6     -14.93644 -18.91069  -2.33177
 13  7     -15.22084 -23.06066  -4.95431
 13  8     -15.43763 -24.57238  -5.93679
 13  9     -15.83605     NUMXQ(K)=  9
    2.329E-06              0.078              1.000
    1.497E-06              0.234              3.000
    1.202E-06              0.391              5.000
    8.746E-07              0.782             10.000
```

7.172E-07	1.172	15.000
6.166E-07	1.563	20.000
5.420E-07	1.954	25.000
4.861E-07	2.345	30.000
4.423E-07	2.736	35.000
4.068E-07	3.126	40.000
3.775E-07	3.517	45.000
3.531E-07	3.908	50.000
3.319E-07	4.299	55.000
3.052E-07	4.690	60.000
2.789E-07	5.080	65.000
2.562E-07	5.471	70.000
2.270E-07	5.862	75.000
1.923E-07	6.253	80.000
1.600E-07	6.644	85.000
1.341E-07	7.034	90.000
1.076E-06	0.5	6.40

ANNUAL AVERAGE = 1.17E-08

K= 13 FIVEXQ(K)= 1.076E-06 FIVEPR(K)= 6.397

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01
1.693E-02					
1.376	3.440	7.777	42.957	58.074	95.154
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	4.4	0.08	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.08	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.19	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.13	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
A	10.8	0.05	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.100E-08
A	26.5	0.13	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.261E-08
B	3.3	0.03	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.13	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.05	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.21	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.40	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.32	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
B	26.5	0.27	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.148E-08
C	3.3	0.05	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	0.16	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.35	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07
C	6.5	0.56	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07
C	8.7	1.21	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.992E-07

AT 131.4 METERS
CA=1292.SQ.METERS

C	10.8	0.72	6000.	0.	131.	539.5		
312.6	0.0	0.000E+00	0.000E+00	1.604E-07				
C	26.5	0.89	6000.	0.	131.	539.5		
312.6	0.0	0.000E+00	0.000E+00	6.522E-08				
D	0.2	0.00	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	1.458E-05				
D	1.1	0.51	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	3.103E-06				
D	1.7	0.51	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	2.101E-06				
D	2.2	0.51	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	1.589E-06				
D	3.3	1.58	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	1.069E-06				
D	4.4	3.09	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	8.049E-07				
D	5.4	4.29	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	6.453E-07				
D	6.5	5.26	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	5.390E-07				
D	8.7	14.57	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	4.049E-07				
D	10.8	10.52	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	3.260E-07				
D	26.5	6.09	6000.	0.	131.	379.9		
99.2	0.0	0.000E+00	0.000E+00	1.326E-07				
E	0.3	0.01	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.835E-06				
E	1.2	0.46	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.880E-06				
E	1.8	0.51	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.273E-06				
E	2.4	0.62	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	9.624E-07				
E	3.5	2.20	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	6.477E-07				
E	4.7	3.11	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	4.876E-07				
E	5.9	4.32	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.909E-07				
E	7.0	6.23	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	3.265E-07				
E	9.3	11.84	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	2.453E-07				
E	11.6	3.33	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	1.975E-07				
E	28.5	0.32	9000.	0.	131.	389.6		
74.2	0.0	0.000E+00	0.000E+00	8.032E-08				
F	0.3	0.01	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	4.813E-06				
F	1.2	0.35	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	1.024E-06				
F	1.8	0.40	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	6.935E-07				
F	2.4	0.48	90000.	0.	131.	1000.0		
92.1	0.0	0.000E+00	0.000E+00	5.243E-07				
F	3.5	1.05	90000.	0.	131.	1000.0		

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.32	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.99	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.48	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	2.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.62	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.16	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.21	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.59	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.70	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.54	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.86	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.05	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.273E-06	1.069E-06	1.024E-06	
0.004	0.013	0.022	0.532	1.042	1.498	2.008	2.518	4.102	4.451	
0.00037	0.00113	0.00192	0.04634	0.09076	0.13051	0.17493	0.21936	0.35730	0.38769	

9.624E-07	8.049E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	5.243E-07	4.876E-07	4.049E-07	
5.068	8.154	8.557	10.758	15.052	20.313	20.367	20.850	23.963	38.537	
0.44147	0.71034	0.74541	0.93713	1.31122	1.76947	1.77415	1.81623	2.08744	3.35700	

3.960E-07	3.909E-07	3.528E-07	3.265E-07	3.260E-07	3.175E-07	2.656E-07	2.651E-07	2.453E-07	2.130E-07	
38.698	43.019	44.066	50.293	60.814	61.163	62.478	63.042	74.878	76.864	
3.37102	3.74745	3.83863	4.38105	5.29756	5.32796	5.44252	5.49162	6.52269	6.69571	

1.992E-07	1.975E-07	1.779E-07	1.732E-07	1.604E-07	1.336E-07	1.326E-07	1.304E-07	1.076E-07	1.046E-07	
78.072	81.400	82.876	82.903	83.628	86.419	92.512	92.646	93.263	93.317	
6.80092	7.09083	7.21943	7.22176	7.28489	7.52805	8.05878	8.07047	8.12424	8.12892	

9.605E-08	8.733E-08	8.032E-08	7.655E-08	6.560E-08	6.522E-08	6.505E-08	6.137E-08	5.282E-08	5.126E-08	
93.532	93.746	94.068	94.149	94.552	95.437	95.598	95.679	96.001	96.189	
8.14762	8.16633	8.19438	8.20140	8.23647	8.31362	8.32765	8.33467	8.36272	8.37909	

```
   4.918E-08   3.851E-08   3.310E-08   3.100E-08   2.491E-08   2.148E-08
1.998E-08   1.668E-08   1.261E-08   1.253E-08
      96.403      96.538      97.128      97.182      97.880      98.148
98.685      98.953      99.087      99.946
     8.39779     8.40948     8.46092     8.46560     8.52639     8.54977
8.59653     8.61991     8.63160     8.70641

   1.009E-08
     100.000
     8.71109

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.046
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.710
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.744
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   5.294
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   6.519
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   7.087
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   8.055

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1     -11.13557 -17.05575  -1.32021
 14  2     -12.68313 -17.88229  -1.56976
 14  3     -14.03259 -16.39760  -0.96436
 14  4     -14.25352 -16.77379  -1.13357
 14  5     -14.75472 -16.72639  -1.10695
 14  6     -14.93644 -19.34182  -2.72440
 14  7     -15.22084 -22.79842  -5.00958
 14  8     -15.43763 -24.05096  -5.86202
 14  9     -15.83605     NUMXQ(K)=  9
    2.336E-06              0.087              1.000
    1.374E-06              0.261              3.000
    1.053E-06              0.436              5.000
    7.492E-07              0.871             10.000
    6.462E-07              1.307             15.000
    5.679E-07              1.742             20.000
```

5.118E-07	2.178	25.000
4.688E-07	2.613	30.000
4.344E-07	3.049	35.000
4.059E-07	3.484	40.000
3.821E-07	3.920	45.000
3.618E-07	4.356	50.000
3.441E-07	4.791	55.000
3.284E-07	5.227	60.000
2.980E-07	5.662	65.000
2.693E-07	6.098	70.000
2.443E-07	6.533	75.000
2.066E-07	6.969	80.000
1.728E-07	7.404	85.000
1.446E-07	7.840	90.000
9.775E-07	0.5	5.74

ANNUAL AVERAGE = 1.35E-08

K= 14 FIVEXQ(K)= 9.775E-07 FIVEPR(K)= 5.740

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 9.858E-01 9.154E-01 4.157E-01 3.613E-01 2.081E-01
1.693E-02
0.671 2.093 6.039 52.986 63.462 96.403
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	6.5	0.06	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.04	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
A	26.5	0.02	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.261E-08
B	2.2	0.02	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.574E-07
B	3.3	0.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.02	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.02	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.06	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.13	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.11	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
C	3.3	0.06	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	0.17	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.19	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07
C	6.5	0.38	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07
C	8.7	0.56	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.992E-07
C	10.8	0.47	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.604E-07
C	26.5	0.26	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	6.522E-08
D	0.2	0.00	6000.	0.	131.	379.9					

99.2	0.0	0.000E+00	0.000E+00	1.458E-05		
D	1.1	0.17	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.103E-06		
D	1.7	0.60	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	2.101E-06		
D	2.2	0.85	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.589E-06		
D	3.3	2.52	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.069E-06		
D	4.4	3.97	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	8.049E-07		
D	5.4	5.02	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	6.453E-07		
D	6.5	7.09	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	5.390E-07		
D	8.7	17.54	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	4.049E-07		
D	10.8	10.45	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.260E-07		
D	26.5	5.47	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.326E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.49	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	0.34	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	0.64	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	2.39	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	3.29	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	5.45	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		
E	7.0	5.92	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	10.53	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	2.16	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.21	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.38	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.28	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.47	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.86	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.43	90000.	0.	131.	1000.0

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92.1      0.0      0.000E+00   0.000E+00   1.779E-07
   F        9.3       1.30     90000.        0.        131.      1000.0
92.1      0.0      0.000E+00   0.000E+00   1.336E-07

   G        1.2       0.15     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   9.605E-08
   G        1.8       0.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   6.505E-08
   G        2.4       0.24     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   4.918E-08
   G        3.5       0.94     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   3.310E-08
   G        4.7       1.13     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   2.491E-08
   G        5.9       0.88     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.998E-08
   G        7.0       0.36     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.668E-08
   G        9.3       0.11     90000.        0.        131.      1000.0
46.0      0.0      0.000E+00   0.000E+00   1.253E-08
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
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LOW POPULATION ZONE CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05 8.835E-06 4.813E-06 3.103E-06 2.101E-06 1.880E-06 1.589E-06 1.273E-06 1.069E-06 1.024E-06
0.001 0.011 0.018 0.189 0.787 1.279 2.134 2.475 4.997 5.275
0.00015 0.00118 0.00198 0.02068 0.08615 0.13992 0.23344 0.27085 0.54674 0.57713

9.624E-07 8.049E-07 6.935E-07 6.477E-07 6.453E-07 5.390E-07 5.260E-07 5.243E-07 4.876E-07 4.049E-07
5.916 9.890 10.168 12.561 17.583 24.677 24.741 25.126 28.416 45.960
0.64727 1.08215 1.11254 1.37440 1.92384 2.70007 2.70708 2.74917 3.10922 5.02875

3.960E-07 3.909E-07 3.528E-07 3.265E-07 3.260E-07 3.175E-07 2.656E-07 2.651E-07 2.574E-07 2.453E-07
46.131 51.580 52.862 58.781 69.230 69.422 70.896 71.281 71.302 81.837
5.04745 5.64365 5.78393 6.43157 7.57486 7.59591 7.75723 7.79932 7.80165 8.95430

2.130E-07 1.992E-07 1.975E-07 1.779E-07 1.732E-07 1.604E-07 1.336E-07 1.326E-07 1.304E-07 1.046E-07
83.696 84.252 86.410 87.841 87.884 88.354 89.658 95.128 95.149 95.171
9.15771 9.21850 9.45464 9.61129 9.61597 9.66740 9.81002 10.40856 10.41090 10.41324

9.605E-08 8.733E-08 8.032E-08 6.560E-08 6.522E-08 6.505E-08 5.282E-08 5.126E-08 4.918E-08 3.851E-08
95.320 95.384 95.598 95.726 95.983 96.111 96.218 96.282 96.517 96.560
10.42960 10.43662 10.46000 10.47403 10.50208 10.51611 10.52780 10.53481 10.56053 10.56521

3.310E-08	2.491E-08	1.998E-08	1.668E-08	1.261E-08	1.253E-08
97.500	98.632	99.509	99.872	99.893	100.000
10.66808	10.79200	10.88786	10.92760	10.92994	10.94163

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

```
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.001
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.233
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.922
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   5.640
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.571
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   8.951
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   9.451
```

K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
15	1	-11.13557	-16.46799	-1.14299
15	2	-11.63677	-16.82661	-1.22783
15	3	-13.35260	-16.71011	-1.18665
15	4	-14.25352	-16.39533	-1.03460
15	5	-14.75472	-16.66035	-1.20173
15	6	-14.93644	-19.43266	-3.13428
15	7	-15.22084	-24.82752	-7.14895
15	8	-15.43763		

NUMXQ(K)= 8

2.118E-06	0.109	1.000
1.393E-06	0.328	3.000
1.134E-06	0.547	5.000
8.405E-07	1.094	10.000
6.966E-07	1.641	15.000
6.106E-07	2.188	20.000
5.534E-07	2.735	25.000
5.092E-07	3.282	30.000
4.736E-07	3.830	35.000
4.441E-07	4.377	40.000
4.190E-07	4.924	45.000
3.972E-07	5.471	50.000
3.761E-07	6.018	55.000
3.566E-07	6.565	60.000

3.393E-07	7.112	65.000
3.200E-07	7.659	70.000
2.849E-07	8.206	75.000
2.551E-07	8.753	80.000
2.109E-07	9.300	85.000
1.176E-06	0.5	4.57

ANNUAL AVERAGE = 1.83E-08

K= 15 FIVEXQ(K)= 1.176E-06 FIVEPR(K)= 4.570

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01
1.693E-02					
0.128	0.534	2.628	56.328	64.626	96.068
100.000					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 131.4 METERS
CA=1292.SQ.METERS

A	3.3	0.02	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	5.4	0.11	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.09	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.30	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
A	10.8	0.02	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.100E-08
A	26.5	0.02	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.261E-08
B	3.3	0.06	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.15	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.26	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.32	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.43	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.13	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
C	2.2	0.02	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	7.816E-07
C	3.3	0.35	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	5.260E-07
C	4.4	0.76	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.960E-07
C	5.4	0.97	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	3.175E-07
C	6.5	0.93	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	2.651E-07
C	8.7	1.60	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.992E-07

C	10.8	0.30	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	1.604E-07
C	26.5	0.09	6000.	0.	131.	539.5	312.6	0.0	0.000E+00	0.000E+00	6.522E-08
D	0.2	0.00	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.458E-05
D	1.1	0.22	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	3.103E-06
D	1.7	0.86	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	2.101E-06
D	2.2	1.08	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.589E-06
D	3.3	4.99	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.069E-06
D	4.4	8.43	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	8.049E-07
D	5.4	9.47	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	6.453E-07
D	6.5	8.78	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	5.390E-07
D	8.7	15.00	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	4.049E-07
D	10.8	4.97	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	3.260E-07
D	26.5	2.03	6000.	0.	131.	379.9	99.2	0.0	0.000E+00	0.000E+00	1.326E-07
E	0.3	0.00	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.835E-06
E	1.2	0.24	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.880E-06
E	1.8	0.50	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.273E-06
E	2.4	0.78	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	9.624E-07
E	3.5	2.49	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	6.477E-07
E	4.7	4.32	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	4.876E-07
E	5.9	4.60	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.909E-07
E	7.0	5.97	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	3.265E-07
E	9.3	7.26	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	2.453E-07
E	11.6	1.04	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	1.975E-07
E	28.5	0.30	9000.	0.	131.	389.6	74.2	0.0	0.000E+00	0.000E+00	8.032E-08
F	0.3	0.00	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	4.813E-06
F	1.2	0.15	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	1.024E-06
F	1.8	0.32	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	6.935E-07
F	2.4	0.43	90000.	0.	131.	1000.0	92.1	0.0	0.000E+00	0.000E+00	5.243E-07
F	3.5	1.28	90000.	0.	131.	1000.0					

92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.15	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.23	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	0.41	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.11	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
G	1.2	0.22	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.73	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	1.34	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.63	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.17	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.09	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 6000.0 METERS
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05	8.835E-06	4.813E-06	3.103E-06	2.101E-06	1.880E-06	1.589E-06	1.273E-06	1.069E-06	1.024E-06
0.002	0.006	0.010	0.226	1.091	1.329	2.410	2.907	7.900	8.051
0.00019	0.00069	0.00111	0.02449	0.11801	0.14373	0.26063	0.31441	0.85449	0.87086

9.624E-07	8.049E-07	7.816E-07	6.935E-07	6.477E-07	6.453E-07	5.390E-07	5.260E-07	5.243E-07	4.876E-07
8.829	17.259	17.280	17.605	20.090	29.558	38.333	38.679	39.111	43.434
0.95503	1.86686	1.86920	1.90427	2.17314	3.19720	4.14644	4.18385	4.23061	4.69822

4.049E-07	3.960E-07	3.909E-07	3.528E-07	3.265E-07	3.260E-07	3.175E-07	2.656E-07	2.651E-07	2.453E-07
58.435	59.191	63.795	65.071	71.036	76.008	76.980	78.126	79.055	86.318
6.32081	6.40265	6.90065	7.03859	7.68389	8.22163	8.32685	8.45076	8.55130	9.33688

2.130E-07	1.992E-07	1.975E-07	1.779E-07	1.732E-07	1.604E-07	1.336E-07	1.326E-07	1.304E-07	1.076E-07
87.550	89.149	90.187	91.203	91.268	91.570	91.981	94.013	94.164	94.272
9.47015	9.64316	9.75539	9.86527	9.87229	9.90502	9.94944	10.16922	10.18558	10.19727

1.046E-07	1.017E-07	9.605E-08	8.733E-08	8.032E-08	6.560E-08	6.522E-08	6.505E-08	6.137E-08	5.282E-08
94.531	94.553	94.769	95.093	95.396	95.828	95.915	96.109	96.217	96.347
10.22533	10.22767	10.25105	10.28612	10.31885	10.36561	10.37496	10.39601	10.40770	10.42172

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   5.126E-08   4.918E-08   3.851E-08   3.310E-08   3.100E-08   2.491E-08
1.998E-08   1.668E-08   1.261E-08   1.253E-08
      96.434      96.693      96.996      97.730      97.752      99.092
99.719      99.892      99.914     100.000
    10.43108    10.45913    10.49187    10.57136    10.57370    10.71865
10.78646    10.80516    10.80750    10.81685

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 2)=   0.853
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   6.897
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   8.218
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   8.323
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   9.334
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   9.752
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   9.862

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 16  1     -11.13557 -16.53836  -1.16962
 16  2     -13.74858 -15.98648  -0.93825
 16  3     -14.03259 -16.03723  -0.96261
 16  4     -14.25352 -16.76720  -1.35656
 16  5     -14.75472 -17.65468  -1.95478
 16  6     -14.93644 -20.26661  -3.83311
 16  7     -14.96290 -20.61342  -4.08376
 16  8     -15.22084 -26.81511  -8.78025
 16  9     -15.43763 -36.78389 -16.47339
 16 10     -15.54231     NUMXQ(K)= 10
    2.374E-06              0.108              1.000
    1.586E-06              0.325              3.000
    1.295E-06              0.541              5.000
    9.845E-07              1.082             10.000
    8.489E-07              1.623             15.000
    7.590E-07              2.163             20.000
    6.927E-07              2.704             25.000
    6.395E-07              3.245             30.000
    5.817E-07              3.786             35.000
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5.347E-07	4.327	40.000
4.955E-07	4.868	45.000
4.621E-07	5.408	50.000
4.333E-07	5.949	55.000
4.081E-07	6.490	60.000
3.836E-07	7.031	65.000
3.554E-07	7.572	70.000
3.306E-07	8.113	75.000
2.913E-07	8.653	80.000
2.541E-07	9.194	85.000
1.995E-07	9.735	90.000
1.337E-06	0.5	4.62

ANNUAL AVERAGE = 2.24E-08

K= 16 FIVEXQ(K)= 1.337E-06 FIVEPR(K)= 4.622

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01 9.858E-01 9.154E-01 4.157E-01 3.613E-01 2.081E-01
1.693E-02
0.562 1.924 6.938 62.771 68.870 96.369
100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					
			AT 131.4 METERS							
CA=1292.SQ.METERS										
A	1.7	0.01	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.999E-07
A	2.2	0.09	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.511E-07
A	3.3	0.31	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.017E-07
A	4.4	0.33	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	7.655E-08
A	5.4	0.22	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	6.137E-08
A	6.5	0.18	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	5.126E-08
A	8.7	0.20	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.851E-08
A	10.8	0.05	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	3.100E-08
A	26.5	0.04	6000.	0.	131.	944.7	1000.0	0.0	0.000E+00	0.000E+00	1.261E-08
B	1.1	0.00	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.028E-07
B	1.7	0.04	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	3.405E-07
B	2.2	0.12	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	2.574E-07
B	3.3	0.29	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.732E-07
B	4.4	0.26	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.304E-07
B	5.4	0.26	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	1.046E-07
B	6.5	0.22	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	8.733E-08
B	8.7	0.30	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	6.560E-08
B	10.8	0.12	6000.	0.	131.	710.5	776.1	0.0	0.000E+00	0.000E+00	5.282E-08
B	26.5	0.05	6000.	0.	131.	710.5					

776.1	0.0	0.000E+00	0.000E+00	2.148E-08		
C	1.1	0.01	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	1.527E-06		
C	1.7	0.07	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	1.034E-06		
C	2.2	0.21	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	7.816E-07		
C	3.3	0.42	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	5.260E-07		
C	4.4	0.56	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	3.960E-07		
C	5.4	0.63	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	3.175E-07		
C	6.5	0.52	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	2.651E-07		
C	8.7	0.79	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	1.992E-07		
C	10.8	0.27	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	1.604E-07		
C	26.5	0.17	6000.	0.	131.	539.5
312.6	0.0	0.000E+00	0.000E+00	6.522E-08		
D	0.2	0.00	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.458E-05		
D	1.1	0.57	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.103E-06		
D	1.7	1.50	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	2.101E-06		
D	2.2	2.03	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.589E-06		
D	3.3	5.42	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.069E-06		
D	4.4	7.33	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	8.049E-07		
D	5.4	7.08	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	6.453E-07		
D	6.5	6.11	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	5.390E-07		
D	8.7	9.08	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	4.049E-07		
D	10.8	3.90	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	3.260E-07		
D	26.5	1.98	6000.	0.	131.	379.9
99.2	0.0	0.000E+00	0.000E+00	1.326E-07		
E	0.3	0.01	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.835E-06		
E	1.2	0.73	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.880E-06		
E	1.8	1.24	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.273E-06		
E	2.4	1.88	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	9.624E-07		
E	3.5	5.25	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	6.477E-07		
E	4.7	6.52	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	4.876E-07		
E	5.9	6.35	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.909E-07		

E	7.0	5.18	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	3.265E-07		
E	9.3	6.91	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	2.453E-07		
E	11.6	1.44	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	1.975E-07		
E	28.5	0.26	9000.	0.	131.	389.6
74.2	0.0	0.000E+00	0.000E+00	8.032E-08		
F	0.3	0.01	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.813E-06		
F	1.2	0.45	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.024E-06		
F	1.8	0.56	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	6.935E-07		
F	2.4	0.84	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	5.243E-07		
F	3.5	1.79	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	3.528E-07		
F	4.7	1.87	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.656E-07		
F	5.9	1.57	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	2.130E-07		
F	7.0	1.04	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.779E-07		
F	9.3	1.10	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.336E-07		
F	11.6	0.18	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	1.076E-07		
F	28.5	0.02	90000.	0.	131.	1000.0
92.1	0.0	0.000E+00	0.000E+00	4.375E-08		
G	1.2	0.25	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	9.605E-08		
G	1.8	0.19	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	6.505E-08		
G	2.4	0.26	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	4.918E-08		
G	3.5	0.72	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	3.310E-08		
G	4.7	0.69	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	2.491E-08		
G	5.9	0.48	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.998E-08		
G	7.0	0.27	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.668E-08		
G	9.3	0.20	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.253E-08		
G	11.6	0.01	90000.	0.	131.	1000.0
46.0	0.0	0.000E+00	0.000E+00	1.009E-08		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 6000.0 METERS.
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05 8.835E-06 4.813E-06 3.103E-06 2.101E-06 1.880E-06 1.589E-06 1.527E-06 1.273E-06 1.069E-06
0.005 0.019 0.030 0.599 2.102 2.834 4.865 4.877 6.116 11.541
0.00468 0.01870 0.03039 0.59854 2.10189 2.83370 4.86545 4.87714 6.11629 11.54053

1.034E-06 1.024E-06 9.624E-07 8.049E-07 7.816E-07 6.935E-07 6.477E-07 6.453E-07 5.390E-07 5.260E-07
11.606 12.055 13.939 21.264 21.475 22.038 27.290 34.371 40.478 40.897
11.60599 12.05490 13.93935 21.26441 21.47483 22.03830 27.28952 34.37142 40.47836 40.89687

5.243E-07 5.028E-07 4.876E-07 4.049E-07 3.960E-07 3.909E-07 3.528E-07 3.405E-07 3.265E-07 3.260E-07
41.734 41.739 48.257 57.340 57.897 64.244 66.033 66.075 71.252 75.151
41.73389 41.73856 48.25700 57.34025 57.89670 64.24446 66.03306 66.07514 71.25154 75.15138

3.175E-07 2.656E-07 2.651E-07 2.574E-07 2.453E-07 2.130E-07 1.999E-07 1.992E-07 1.975E-07 1.779E-07
75.778 77.651 78.174 78.291 85.203 86.769 86.776 87.566 89.007 90.045
75.77798 77.65074 78.17446 78.29137 85.20259 86.76907 86.77608 87.56634 89.00657 90.04465

1.732E-07 1.604E-07 1.511E-07 1.336E-07 1.326E-07 1.304E-07 1.076E-07 1.046E-07 1.017E-07 9.605E-08
90.337 90.610 90.704 91.808 93.783 94.047 94.227 94.485 94.798 95.046
90.33691 90.61046 90.70398 91.80753 93.78317 94.04737 94.22740 94.48459 94.79788 95.04572

8.733E-08 8.032E-08 7.655E-08 6.560E-08 6.522E-08 6.505E-08
6.137E-08 5.282E-08 5.126E-08 4.918E-08
95.263 95.523 95.850 96.147 96.320 96.507
96.724 96.844 97.021 97.283
95.26315 95.52267 95.85000 96.14693 96.31995 96.50699
96.72443 96.84367 97.02135 97.28321

4.375E-08 3.851E-08 3.310E-08 3.100E-08 2.491E-08 2.148E-08
1.998E-08 1.668E-08 1.261E-08 1.253E-08
97.300 97.496 98.214 98.260 98.953 99.002
99.481 99.747 99.785 99.988
97.29958 97.49597 98.21375 98.26051 98.95256 99.00166
99.48095 99.74748 99.78489 99.98830

1.009E-08
100.000
99.99998

BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.

CHI/Q = 1.556E-05 DISTANCE = 4000.000

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE ORDERED X/Q-FREQUENCY VALUES, AND AS PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY
3.176E-06	1.000	1.000
2.066E-06	3.000	3.000
1.645E-06	5.000	5.000
1.159E-06	10.000	10.000
9.649E-07	15.000	15.000
8.527E-07	20.000	20.000
7.669E-07	25.000	25.000
6.973E-07	30.000	30.000
6.382E-07	35.000	35.000
5.854E-07	40.000	40.000
5.386E-07	45.000	45.000
4.962E-07	50.000	50.000
4.571E-07	55.000	55.000
4.205E-07	60.000	60.000
3.864E-07	65.000	65.000
3.565E-07	70.000	70.000
3.269E-07	75.000	75.000
2.873E-07	80.000	80.000
2.470E-07	85.000	85.000
1.857E-07	90.000	90.000
1.645E-06	5.0	5.00

K= 17 FIVEXQ(K)= 1.645E-06 FIVEPR(K)= 5.000

FUMIGATION X/Q AT THE BOUNDARY: 8.14E-06

EXPONENTIAL TERM AND FREQUENCIES

9.914E-01	9.858E-01	9.154E-01	4.157E-01	3.613E-01	2.081E-01	1.693E-02
1.417	3.077	6.727	51.731	61.158	96.932	100.000

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

LOW POPULATION ZONE CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT IS NOT INCLUDED.
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.458E-05 8.835E-06 4.813E-06 3.103E-06 2.101E-06 1.880E-06 1.589E-06 1.527E-06 1.273E-06 1.069E-06
0.005 0.019 0.030 0.599 2.102 2.834 4.865 4.877 6.116 11.541
0.00468 0.01870 0.03039 0.59854 2.10189 2.83370 4.86545 4.87714 6.11629 11.54053

1.034E-06 1.024E-06 9.624E-07 8.049E-07 7.816E-07 6.935E-07 6.477E-07 6.453E-07 5.390E-07 5.260E-07
11.606 12.055 13.939 21.264 21.475 22.038 27.290 34.371 40.478 40.897
11.60599 12.05489 13.93935 21.26440 21.47483 22.03829 27.28952 34.37142 40.47836 40.89687

5.243E-07 5.028E-07 4.876E-07 4.049E-07 3.960E-07 3.909E-07 3.528E-07 3.405E-07 3.265E-07 3.260E-07
41.734 41.739 48.257 57.340 57.897 64.244 66.033 66.075 71.252 75.151
41.73389 41.73856 48.25700 57.34026 57.89671 64.24446 66.03307 66.07515 71.25156 75.15141

3.175E-07 2.656E-07 2.651E-07 2.574E-07 2.453E-07 2.130E-07 1.999E-07 1.992E-07 1.975E-07 1.779E-07
75.778 77.651 78.174 78.291 85.203 86.769 86.776 87.566 89.007 90.045
75.77800 77.65076 78.17448 78.29137 85.20261 86.76909 86.77610 87.56635 89.00659 90.04468

1.732E-07 1.604E-07 1.511E-07 1.336E-07 1.326E-07 1.304E-07 1.076E-07 1.046E-07 1.017E-07 9.605E-08
90.337 90.610 90.704 91.808 93.783 94.047 94.227 94.485 94.798 95.046
90.33691 90.61045 90.70398 91.80753 93.78316 94.04736 94.22736 94.48454 94.79784 95.04568

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   8.733E-08   8.032E-08   7.655E-08   6.560E-08   6.522E-08   6.505E-08
6.137E-08   5.282E-08   5.126E-08   4.918E-08
      95.263      95.523      95.850      96.147      96.320      96.507
96.724      96.844      97.021      97.283
    95.26311    95.52263    95.84995    96.14687    96.31987    96.50690
96.72434    96.84356    97.02125    97.28311

   4.375E-08   3.851E-08   3.310E-08   3.100E-08   2.491E-08   2.148E-08
1.998E-08   1.668E-08   1.261E-08   1.253E-08
      97.299      97.496      98.214      98.260      98.952      99.001
99.481      99.747      99.785      99.988
    97.29947    97.49586    98.21364    98.26039    98.95245    99.00153
99.48082    99.74736    99.78475    99.98814

   1.009E-08
    100.000
    99.99983

  BELOW IS PRINTED THE MAXIMUM VALUE OF CHI/Q AND THE DISTANCE IN METERS
FROM THE STACK AT WHICH THE VALUE OCCURRED.
THIS DISTANCE MAY BE WITHIN THE SITE BOUNDARY.


 CHI/Q =  1.556E-05      DISTANCE =   4000.000


          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY


  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1     -11.13557 -14.90473  -0.96475
 18  2     -13.74858 -14.50831  -0.63396
 18  3     -14.25352 -14.51633  -0.65391
 18  4     -14.75472 -14.54401  -0.57798
 18  5     -14.93644 -14.40914  -0.77663
 18  6     -15.22084 -13.97485  -1.19214
 18  7     -15.43763 -14.05611  -1.12592
 18  8     -18.19490     NUMXQ(K)=  8
    3.176E-06              1.000              1.000
    2.066E-06              3.000              3.000
    1.645E-06              5.000              5.000
    1.159E-06             10.000             10.000
    9.649E-07             15.000             15.000
    8.527E-07             20.000             20.000
    7.669E-07             25.000             25.000
    6.973E-07             30.000             30.000
    6.382E-07             35.000             35.000
    5.854E-07             40.000             40.000
    5.386E-07             45.000             45.000
    4.962E-07             50.000             50.000
    4.571E-07             55.000             55.000
    4.205E-07             60.000             60.000
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3.864E-07	65.000	65.000
3.565E-07	70.000	70.000
3.269E-07	75.000	75.000
2.873E-07	80.000	80.000
2.470E-07	85.000	85.000
1.857E-07	90.000	90.000
1.645E-06	5.0	5.00

K= 18 FIVEXQ(K)= 1.645E-06 FIVEPR(K)= 5.000

K	HIGHPR	PR	GRNDVT(K)
1	-2.75766	0.29109	6.22377
2	-1.70724	4.38891	3.53187
3	-2.66587	0.38395	3.10925
4	-2.61673	0.44389	3.53945
5	-2.57624	0.49942	4.77421
6	-2.71252	0.33388	4.27580
7	-2.80217	0.25381	5.37250
8	-2.87428	0.20248	5.06821
9	-2.83541	0.22884	10.01358
10	-2.95607	0.15580	5.86067
11	-2.95903	0.15431	4.97718
12	-3.00854	0.13126	4.96786
13	-2.94510	0.16143	7.81606
14	-2.94607	0.16093	8.71109
15	-2.90670	0.18263	10.94163
16	-2.80491	0.25166	10.81685

K	HOURS(K)	TOTHRS
1	25.49959	25.49959
2	384.46850	409.96810
3	33.63396	443.60210
4	38.88456	482.48670
5	43.74879	526.23550
6	29.24749	555.48300
7	22.23362	577.71660
8	17.73750	595.45410
9	20.04639	615.50050
10	13.64813	629.14860
11	13.51760	642.66620
12	11.49849	654.16470
13	14.14155	668.30620
14	14.09717	682.40340
15	15.99879	698.40220
16	22.04513	720.44730

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	1.400E-06	1.562E-08	-0.5362	-13.1075			
					1	8.0	-14.22247
					2	16.0	-14.59411
					3	72.0	-15.40056
					4	624.0	-16.55842
2	1.243E-06	1.055E-08	-0.5687	-13.2038			
					1	8.0	-14.38643
					2	16.0	-14.78065
					3	72.0	-15.63606
					4	624.0	-16.86423
3	1.528E-06	1.121E-08	-0.5861	-12.9850			
					1	8.0	-14.20390

					2	16.0	-14.61018
					3	72.0	-15.49179
					4	624.0	-16.75756
4	1.664E-06	1.354E-08	-0.5738	-12.9086			
					1	8.0	-14.10183
					2	16.0	-14.49957
					3	72.0	-15.36263
					4	624.0	-16.60177
5	1.747E-06	1.628E-08	-0.5576	-12.8712			
					1	8.0	-14.03068
					2	16.0	-14.41718
					3	72.0	-15.25587
					4	624.0	-16.46001
6	1.466E-06	1.307E-08	-0.5630	-13.0424			
					1	8.0	-14.21311
					2	16.0	-14.60334
					3	72.0	-15.45011
					4	624.0	-16.66587
7	1.328E-06	1.406E-08	-0.5424	-13.1562			
					1	8.0	-14.28403
					2	16.0	-14.65997
					3	72.0	-15.47574
					4	624.0	-16.64698
8	1.202E-06	1.210E-08	-0.5484	-13.2518			
					1	8.0	-14.39205
					2	16.0	-14.77214
					3	72.0	-15.59691
					4	624.0	-16.78108
9	1.275E-06	1.954E-08	-0.4983	-13.2273			
					1	8.0	-14.26343
					2	16.0	-14.60880
					3	72.0	-15.35823
					4	624.0	-16.43422
10	1.107E-06	1.146E-08	-0.5451	-13.3361			
					1	8.0	-14.46955
					2	16.0	-14.84738
					3	72.0	-15.66724
					4	624.0	-16.84435
11	1.078E-06	9.401E-09	-0.5655	-13.3486			
					1	8.0	-14.52458
					2	16.0	-14.91656
					3	72.0	-15.76713
					4	624.0	-16.98834
12	1.003E-06	7.771E-09	-0.5797	-13.4103			
					1	8.0	-14.61576
					2	16.0	-15.01757
					3	72.0	-15.88946
					4	624.0	-17.14129
13	1.076E-06	1.170E-08	-0.5393	-13.3680			
					1	8.0	-14.48948
					2	16.0	-14.86330
					3	72.0	-15.67445
					4	624.0	-16.83906
14	9.775E-07	1.346E-08	-0.5111	-13.4840			
					1	8.0	-14.54670
					2	16.0	-14.90094
					3	72.0	-15.66961
					4	624.0	-16.77324
15	1.176E-06	1.828E-08	-0.4967	-13.3087			
					1	8.0	-14.34155

					2	16.0	-14.68582
					3	72.0	-15.43286
					4	624.0	-16.50543
16	1.337E-06	2.238E-08	-0.4878	-13.1871			
					1	8.0	-14.20131
					2	16.0	-14.53939
					3	72.0	-15.27301
					4	624.0	-16.32630
17	1.645E-06	2.238E-08	-0.5125	-12.9623			
					1	8.0	-14.02801
					2	16.0	-14.38325
					3	72.0	-15.15411
					4	624.0	-16.26088
18	1.645E-06	2.238E-08	-0.5125	-12.9623			
					1	8.0	-14.02801
					2	16.0	-14.38325
					3	72.0	-15.15411
					4	624.0	-16.26088

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 04/20/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 97.5 meters
TYPE OF RELEASE: Stack Release DELTA-T HEIGHTS: 10.1-96.3 meters
SOURCE OF DATA:
COMMENTS: Peach Bottom, Tower 2 1984-1988 met data, 320 ft wind, 33-316 ft Delta T
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

0-2 HR X/Q IS DOWNWIND DISTANCE EXCEEDED DOWNWIND

SECTOR	(METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS	1-4 DAYS	4-30 DAYS	ANNUAL AVERAGE	IN SECTOR	SECTOR
S	6000.	1.40E-06	6.66E-07	4.59E-07	2.05E-07	6.44E-08	1.56E-08	25.5	S
SSW	6000.	1.24E-06	5.65E-07	3.81E-07	1.62E-07	4.74E-08	1.06E-08	384.5	SSW
SW	6000.	1.53E-06	6.78E-07	4.52E-07	1.87E-07	5.28E-08	1.12E-08	33.6	SW
WSW	6000.	1.66E-06	7.51E-07	5.05E-07	2.13E-07	6.17E-08	1.35E-08	38.9	WSW
W	6000.	1.75E-06	8.06E-07	5.48E-07	2.37E-07	7.10E-08	1.63E-08	43.7	W
WNW	6000.	1.47E-06	6.72E-07	4.55E-07	1.95E-07	5.78E-08	1.31E-08	29.2	WNW
NW	6000.	1.33E-06	6.26E-07	4.30E-07	1.90E-07	5.89E-08	1.41E-08	22.2	NW
NNW	6000.	1.20E-06	5.62E-07	3.84E-07	1.68E-07	5.15E-08	1.21E-08	17.7	NNW
N	6000.	1.27E-06	6.39E-07	4.52E-07	2.14E-07	7.29E-08	1.95E-08	20.0	N
NNE	6000.	1.11E-06	5.20E-07	3.56E-07	1.57E-07	4.84E-08	1.15E-08	13.6	NNE
NE	6000.	1.08E-06	4.92E-07	3.33E-07	1.42E-07	4.19E-08	9.40E-09	13.5	NE
ENE	6000.	1.00E-06	4.49E-07	3.01E-07	1.26E-07	3.59E-08	7.77E-09	11.5	ENE
E	6000.	1.08E-06	5.10E-07	3.51E-07	1.56E-07	4.86E-08	1.17E-08	14.1	E
ESE	6000.	9.78E-07	4.81E-07	3.38E-07	1.57E-07	5.19E-08	1.35E-08	14.1	ESE
SE	6000.	1.18E-06	5.91E-07	4.19E-07	1.98E-07	6.79E-08	1.83E-08	16.0	SE
SSE	6000.	1.34E-06	6.80E-07	4.85E-07	2.33E-07	8.12E-08	2.24E-08	22.0	SSE
MAX X/Q		1.75E-06							
TOTAL HOURS AROUND SITE:		720.4							
SRP 2.3.4	6000.	1.65E-06	8.09E-07	5.67E-07					

2.62E-07 8.67E-08 2.24E-08
SITE LIMIT 1.65E-06 8.09E-07 5.67E-07
2.62E-07 8.67E-08 2.24E-08

THE FIVE-PERCENT-FOR-THE-ENTIRE-SITE X/Q IS LIMITING.

X/Q VALUES (SEC/CUBIC METER) FOR FUMIGATION AT THE BOUNDARY:

SECTOR	DOWNWIND DISTANCE (METERS)	FUMIGATION X/Q
S	6000.	8.14E-06
SSW	6000.	8.14E-06
SW	6000.	8.14E-06
WSW	6000.	8.14E-06
W	6000.	8.14E-06
WNW	6000.	8.14E-06
NW	6000.	8.14E-06
NNW	6000.	8.14E-06
N	6000.	8.14E-06
NNE	6000.	8.14E-06
NE	6000.	8.14E-06
ENE	6000.	8.14E-06
E	6000.	8.14E-06
ESE	6000.	8.14E-06
SE	6000.	8.14E-06
SSE	6000.	8.14E-06

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY.
CHECK THE REASONABLENESS OF THE ENVELOPES
COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY
FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.

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   1  1111
Peach Bottom                                   Ground Release
13.7 meters          10.4-21.1 meters

PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
   11    0
2584. 54.3 10.0 13.7
    0    0    1    1    4    4    4
  48.  50.  50.  45.  40.  42.  35.  23.  28.  17.  14.  25.  18.  22.
18.  33.
  41.  33.  31.  44.  82.  90.  88.  27.  30.  14.  15.   8.  19.  20.
14.  38.
  42.  26.  26.  32.  88.  99.  88.  58.  18.   8.   4.   0.   9.  17.
24.  36.
  78.  51.  47.  63.  92. 184. 249.  79.  39.  15.   9.   9.  14.  12.
105.  89.
 112.  45.  26.  31.  58.  83. 240. 112.  64.  22.  13.  12.  19.  18.
146. 153.
 103.  19.  17.   7.  22.  26. 121. 131.  77.  19.  23.  20.  27.  39.
151. 189.
  90.  11.   2.   8.   3.  10.  27. 135.  50.   9.   1.   4.  21.  29.
160. 217.
  78.  11.   4.   1.   1.   9.  10. 103.  44.   7.   0.   1.  22.  76.
267. 348.
  24.   1.   1.   0.   0.   2.   0.  11.   0.   1.   0.   0.   0.  26.
131. 105.
   5.   0.   0.   0.   0.   0.   0.   2.   0.   0.   0.   0.   0.  11.
72.  43.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.   0.
0.   0.
  16.  17.  18.   7.  14.  17.  19.   8.   7.   3.   3.   6.   7.   6.
11.  10.
  19.  16.  15.  22.  22.  27.  29.  11.   6.   1.   2.   4.   3.   7.
13.  21.
  15.  10.  10.  30.  44.  30.  26.   8.   5.   1.   3.   4.   2.   8.
13.  22.
  40.  18.  25.  29.  62.  73.  86.  39.  16.  14.  10.   9.  13.  12.
60.  42.
  47.  28.  30.  14.  28.  51.  70.  41.  22.   9.  19.  12.  26.  21.
54.  48.
  45.  10.   9.   5.  20.  41.  48.  41.  31.  10.  23.  17.  32.  51.
71.  73.
```

42. 9. 5. 1. 6. 13. 20. 48. 18. 2. 6. 5. 20. 44.
81. 66.
34. 0. 3. 1. 0. 10. 8. 26. 7. 3. 3. 4. 16. 112.
172. 128.
5. 0. 1. 0. 0. 2. 3. 7. 0. 1. 0. 1. 1. 55.
68. 47.
0. 0. 0. 0. 0. 0. 0. 2. 0. 0. 0. 0. 0. 15.
51. 26.
58. 32. 23. 45. 46. 55. 42. 25. 16. 9. 15. 13. 17. 15.
30. 42.
34. 30. 47. 36. 46. 39. 62. 24. 18. 8. 10. 15. 16. 25.
31. 28.
27. 30. 63. 55. 73. 71. 94. 32. 23. 17. 17. 19. 16. 36.
58. 43.
110. 60. 83. 93. 119. 162. 213. 98. 74. 39. 37. 48. 67. 68.
122. 90.
120. 53. 42. 39. 80. 125. 219. 146. 75. 39. 39. 70. 95. 105.
181. 120.
93. 32. 18. 21. 58. 89. 97. 197. 60. 17. 36. 27. 87. 161.
234. 126.
60. 21. 7. 6. 17. 48. 45. 112. 47. 15. 22. 10. 55. 229.
219. 152.
45. 14. 4. 1. 13. 29. 32. 99. 23. 7. 5. 6. 64. 432.
422. 237.
7. 2. 0. 0. 3. 4. 6. 41. 1. 0. 0. 0. 6. 124.
259. 111.
3. 1. 0. 0. 0. 0. 1. 4. 0. 0. 0. 0. 1. 31.
107. 43.
65. 28. 29. 24. 36. 50. 69. 44. 27. 27. 27. 29. 32. 29.
48. 78.
40. 32. 16. 32. 28. 59. 86. 36. 10. 18. 34. 20. 33. 33.
34. 83.
38. 25. 30. 35. 34. 68. 127. 45. 48. 30. 35. 25. 45. 35.
56. 59.
87. 27. 35. 50. 47. 90. 171. 127. 87. 16. 43. 53. 73. 81.
148. 71.
97. 21. 18. 22. 36. 80. 143. 160. 72. 23. 23. 30. 63. 131.
164. 70.
71. 25. 12. 8. 19. 49. 84. 158. 40. 4. 18. 6. 22. 134.
192. 90.
39. 7. 4. 1. 9. 13. 16. 90. 13. 2. 3. 1. 11. 120.
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29. 1. 0. 2. 14. 20. 18. 68. 9. 1. 1. 1. 2. 87.
150. 70.
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44. 20.
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6. 3.
64. 37. 30. 19. 36. 63. 88. 71. 53. 21. 33. 28. 61. 54.
103. 102.
27. 15. 18. 23. 24. 33. 80. 48. 46. 30. 42. 60. 60. 45.
70. 74.
29. 14. 15. 6. 22. 37. 93. 73. 44. 21. 28. 41. 65. 45.
67. 58.
53. 14. 17. 11. 17. 52. 111. 135. 73. 17. 21. 33. 53. 105.
119. 69.
28. 4. 11. 8. 4. 30. 70. 127. 44. 15. 8. 15. 25. 81.
128. 60.
14. 1. 1. 1. 4. 11. 20. 85. 26. 5. 0. 4. 5. 74.
104. 46.

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45. 19.
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99. 41. 38. 36. 46. 74. 121. 147. 179. 127. 221. 290. 403. 351.
423. 265.
95. 37. 25. 45. 43. 59. 147. 167. 178. 146. 223. 304. 520. 448.
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303. 218.
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191. 78.
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90. 17.
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101. 0.50 2.35 3.47 4.59 6.82 9.06 11.313.5318.0122.37 55.0
0823.0823.0823.0823.0823.0823.0823.0823.0823.0823.0823.0823.0823.08
23.0823.
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PRINTOUT OF INPUT CARDS

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   1     00010 01111 00000 00000 00000 00000 00000 00000 00000 00000
00000 00000 00000 00000 00000 00000   2     Peach Bottom
Ground Release
   3     13.7 meters         10.4-21.1 meters
   4
   5     PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB
Stack to EAB            6         11 42043     0
   7          0.500  2584.000    54.300    10.000    13.700
   8        0.000  0.000  1.000  1.000  4.000  4.000  4.000
   9       48.000 50.000 50.000 45.000 40.000 42.000 35.000 23.000 28.000
17.000 14.000 25.000 18.000 22.000 18.000 33.000
   9       41.000 33.000 31.000 44.000 82.000 90.000 88.000 27.000 30.000
14.000 15.000  8.000 19.000 20.000 14.000 38.000
   9       42.000 26.000 26.000 32.000 88.000 99.000 88.000 58.000 18.000
8.000  4.000  0.000  9.000 17.000 24.000 36.000
   9       78.000 51.000 47.000 63.000 92.000184.000249.000 79.000 39.000
15.000  9.000  9.000 14.000 12.000105.000 89.000
   9      112.000 45.000 26.000 31.000 58.000 83.000240.000112.000 64.000
22.000 13.000 12.000 19.000 18.000146.000153.000
   9      103.000 19.000 17.000  7.000 22.000 26.000121.000131.000 77.000
19.000 23.000 20.000 27.000 39.000151.000189.000
   9       90.000 11.000  2.000  8.000  3.000 10.000 27.000135.000 50.000
9.000  1.000  4.000 21.000 29.000160.000217.000
   9       78.000 11.000  4.000  1.000  1.000  9.000 10.000103.000 44.000
7.000  0.000  1.000 22.000 76.000267.000348.000
   9       24.000  1.000  1.000  0.000  0.000  2.000  0.000 11.000  0.000
1.000  0.000  0.000  0.000 26.000131.000105.000
   9        5.000  0.000  0.000  0.000  0.000  0.000  0.000  2.000  0.000
0.000  0.000  0.000  0.000 11.000 72.000 43.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9        0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       16.000 17.000 18.000  7.000 14.000 17.000 19.000  8.000  7.000
3.000  3.000  6.000  7.000  6.000 11.000 10.000
   9       19.000 16.000 15.000 22.000 22.000 27.000 29.000 11.000  6.000
1.000  2.000  4.000  3.000  7.000 13.000 21.000
   9       15.000 10.000 10.000 30.000 44.000 30.000 26.000  8.000  5.000
1.000  3.000  4.000  2.000  8.000 13.000 22.000
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9 40.000 18.000 25.000 29.000 62.000 73.000 86.000 39.000 16.000
14.000 10.000 9.000 13.000 12.000 60.000 42.000
9 47.000 28.000 30.000 14.000 28.000 51.000 70.000 41.000 22.000
9.000 19.000 12.000 26.000 21.000 54.000 48.000
9 45.000 10.000 9.000 5.000 20.000 41.000 48.000 41.000 31.000
10.000 23.000 17.000 32.000 51.000 71.000 73.000
9 42.000 9.000 5.000 1.000 6.000 13.000 20.000 48.000 18.000
2.000 6.000 5.000 20.000 44.000 81.000 66.000
9 34.000 0.000 3.000 1.000 0.000 10.000 8.000 26.000 7.000
3.000 3.000 4.000 16.000112.000172.000128.000
9 5.000 0.000 1.000 0.000 0.000 2.000 3.000 7.000 0.000
1.000 0.000 1.000 1.000 55.000 68.000 47.000
9 0.000 0.000 0.000 0.000 0.000 0.000 0.000 2.000 0.000
0.000 0.000 0.000 0.000 15.000 51.000 26.000
9 58.000 32.000 23.000 45.000 46.000 55.000 42.000 25.000 16.000
9.000 15.000 13.000 17.000 15.000 30.000 42.000
9 34.000 30.000 47.000 36.000 46.000 39.000 62.000 24.000 18.000
8.000 10.000 15.000 16.000 25.000 31.000 28.000
9 27.000 30.000 63.000 55.000 73.000 71.000 94.000 32.000 23.000
17.000 17.000 19.000 16.000 36.000 58.000 43.000
9 110.000 60.000 83.000 93.000119.000162.000213.000 98.000 74.000
39.000 37.000 48.000 67.000 68.000122.000 90.000
9 120.000 53.000 42.000 39.000 80.000125.000219.000146.000 75.000
39.000 39.000 70.000 95.000105.000181.000120.000
9 93.000 32.000 18.000 21.000 58.000 89.000 97.000197.000 60.000
17.000 36.000 27.000 87.000161.000234.000126.000
9 60.000 21.000 7.000 6.000 17.000 48.000 45.000112.000 47.000
15.000 22.000 10.000 55.000229.000219.000152.000
9 45.000 14.000 4.000 1.000 13.000 29.000 32.000 99.000 23.000
7.000 5.000 6.000 64.000432.000422.000237.000
9 7.000 2.000 0.000 0.000 3.000 4.000 6.000 41.000 1.000
0.000 0.000 0.000 6.000124.000259.000111.000
9 3.000 1.000 0.000 0.000 0.000 0.000 1.000 4.000 0.000
0.000 0.000 0.000 1.000 31.000107.000 43.000
9 65.000 28.000 29.000 24.000 36.000 50.000 69.000 44.000 27.000
27.000 27.000 29.000 32.000 29.000 48.000 78.000
9 40.000 32.000 16.000 32.000 28.000 59.000 86.000 36.000 10.000
18.000 34.000 20.000 33.000 33.000 34.000 83.000
9 38.000 25.000 30.000 35.000 34.000 68.000127.000 45.000 48.000
30.000 35.000 25.000 45.000 35.000 56.000 59.000
9 87.000 27.000 35.000 50.000 47.000 90.000171.000127.000 87.000
16.000 43.000 53.000 73.000 81.000148.000 71.000
9 97.000 21.000 18.000 22.000 36.000 80.000143.000160.000 72.000
23.000 23.000 30.000 63.000131.000164.000 70.000
9 71.000 25.000 12.000 8.000 19.000 49.000 84.000158.000 40.000
4.000 18.000 6.000 22.000134.000192.000 90.000
9 39.000 7.000 4.000 1.000 9.000 13.000 16.000 90.000 13.000
2.000 3.000 1.000 11.000120.000137.000 74.000
9 29.000 1.000 0.000 2.000 14.000 20.000 18.000 68.000 9.000
1.000 1.000 1.000 2.000 87.000150.000 70.000
9 2.000 0.000 0.000 0.000 7.000 0.000 0.000 25.000 6.000
0.000 0.000 0.000 0.000 10.000 44.000 20.000
9 0.000 0.000 0.000 0.000 0.000 2.000 1.000 1.000 0.000
0.000 0.000 0.000 0.000 10.000 6.000 3.000
9 64.000 37.000 30.000 19.000 36.000 63.000 88.000 71.000 53.000
21.000 33.000 28.000 61.000 54.000103.000102.000
9 27.000 15.000 18.000 23.000 24.000 33.000 80.000 48.000 46.000
30.000 42.000 60.000 60.000 45.000 70.000 74.000
9 29.000 14.000 15.000 6.000 22.000 37.000 93.000 73.000 44.000
21.000 28.000 41.000 65.000 45.000 67.000 58.000

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   9      53.000 14.000 17.000 11.000 17.000 52.000111.000135.000 73.000
17.000 21.000 33.000 53.000105.000119.000 69.000
   9      28.000  4.000 11.000  8.000  4.000 30.000 70.000127.000 44.000
15.000  8.000 15.000 25.000 81.000128.000 60.000
   9      14.000  1.000  1.000  1.000  4.000 11.000 20.000 85.000 26.000
5.000  0.000  4.000  5.000 74.000104.000 46.000
   9       2.000  0.000  0.000  1.000  1.000  0.000  1.000 19.000  9.000
0.000  0.000  0.000  2.000 28.000 45.000 19.000
   9       0.000  0.000  0.000  1.000 10.000  0.000  0.000 10.000  3.000
0.000  0.000  0.000  0.000  5.000  7.000  9.000
   9       0.000  0.000  0.000  0.000  3.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  1.000  0.000  0.000  2.000
   9       0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000  0.000
0.000  0.000  0.000  0.000  0.000  2.000  0.000
   9      99.000 41.000 38.000 36.000 46.000
74.000121.000147.000179.000127.000221.000290.000403.000351.000423.000265
.000
   9      95.000 37.000 25.000 45.000 43.000
59.000147.000167.000178.000146.000223.000304.000520.000448.000491.000325
.000
   9      57.000 21.000 27.000  7.000 27.000 52.000151.000137.000121.000
82.000122.000218.000443.000286.000303.000218.000
   9      63.000 22.000  9.000  4.000 20.000 54.000147.000160.000102.000
53.000 78.000125.000315.000264.000346.000209.000
   9      49.000  6.000  4.000  2.000  1.000 28.000 32.000 63.000 29.000
10.000  6.000 16.000 90.000142.000191.000 78.000
   9      10.000  1.000  1.000  0.000  0.000  4.000  5.000 12.000 12.000
3.000  0.000  1.000  6.000 81.000 90.000 17.000
   9       1.000  1.000  2.000  0.000  0.000  0.000  0.000  6.000  4.000
0.000  0.000  2.000  0.000 16.000 21.000 10.000
   9       0.000  0.000  0.000  0.000  0.000  0.000  0.000  7.000  3.000
0.000  0.000  0.000  0.000  3.000  6.000  4.000
   9       0.000  0.000  0.000  0.000  0.000  0.000  0.000  1.000  2.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000
   9       0.000  0.000  0.000  0.000  0.000  0.000  0.000  1.000  0.000
0.000  0.000  0.000  0.000  0.000  0.000  0.000  10        101.  0.500
2.350  3.470  4.590  6.820  9.060 11.300 13.530 18.010 22.370 55.000
0.000  0.000  0.000  11        823.   823.   823.   823.   823.   823.
823.   823.   823.   823.   823.   823.   823.   823.   823.   823.  11
-100.  7300.  7300.  7300.  7300.  7300.  7300.  7300.  7300.  7300.
7300.  7300.  7300.  7300.  7300.  7300.  12         1.0    1.0    1.0
1.0    1.0    1.0    1.0    1.0    1.0    1.0    1.0    1.0    1.0
1.0    1.0    1.0
  12         1.0    1.0    1.0    1.0    1.0    1.0    1.0    1.0    1.0
1.0    1.0    1.0    1.0    1.0    1.0    1.0
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS A
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22	0.21	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05	0.97	0.114	0.119	0.119	0.107	0.095	0.100	0.083	0.055	0.067	0.040	0.033	0.059	0.043	0.052	0.043	0.078	1.208
1.55	1.43	0.098	0.078	0.074	0.105	0.195	0.214	0.209	0.064	0.071	0.033	0.036	0.019	0.045	0.048	0.033	0.090	1.413
2.05	1.90	0.100	0.062	0.062	0.076	0.209	0.235	0.209	0.138	0.043	0.019	0.010	0.000	0.021	0.040	0.057	0.086	1.368
3.05	2.82	0.186	0.121	0.112	0.150	0.219	0.438	0.592	0.188	0.093	0.036	0.021	0.021	0.033	0.029	0.250	0.212	2.700
4.05	3.74	0.266	0.107	0.062	0.074	0.138	0.197	0.571	0.266	0.152	0.052	0.031	0.029	0.045	0.043	0.347	0.364	2.745
5.05	4.67	0.245	0.045	0.040	0.017	0.052	0.062	0.288	0.312	0.183	0.045	0.055	0.048	0.064	0.093	0.359	0.450	2.357
6.05	5.59	0.214	0.026	0.005	0.019	0.007	0.024	0.064	0.321	0.119	0.021	0.002	0.010	0.050	0.069	0.381	0.516	1.848
8.05	7.44	0.186	0.026	0.010	0.002	0.002	0.021	0.024	0.245	0.105	0.017	0.000	0.002	0.052	0.181	0.635	0.828	2.336
10.00	9.24	0.057	0.002	0.002	0.000	0.000	0.005	0.000	0.026	0.000	0.002	0.000	0.000	0.000	0.062	0.312	0.250	0.718
24.59	22.73	0.012	0.000	0.000	0.000	0.000	0.000	0.000	0.005	0.000	0.000	0.000	0.000	0.000	0.026	0.171	0.102	0.316
TOTAL		1.48	0.59	0.49	0.55	0.92	1.30	2.04	1.62	0.83	0.27	0.19	0.19	0.35	0.64	2.59	2.98	17.01

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS B
WIND SPEED (M/S)

TOWER RELEASE	N	NNE	NE	ENE	E	ESE	SE	SSE	S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL
0.22	0.21	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.05	0.97	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
1.55	1.43	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
2.05	1.90	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
3.05	2.82	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000

4.05	3.74	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
5.05	4.67	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
6.05	5.59	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
8.05	7.44	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
10.00	9.24	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
24.59	22.73	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	
TOTAL		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS C
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.21	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.002	
1.05	0.97	0.038	0.040	0.043	0.017	0.033	0.040	0.045	0.019
0.017	0.007	0.007	0.014	0.017	0.014	0.026	0.024	0.402	
1.55	1.43	0.045	0.038	0.036	0.052	0.052	0.064	0.069	0.026
0.014	0.002	0.005	0.010	0.007	0.017	0.031	0.050	0.519	
2.05	1.90	0.036	0.024	0.024	0.071	0.105	0.071	0.062	0.019
0.012	0.002	0.007	0.010	0.005	0.019	0.031	0.052	0.549	
3.05	2.82	0.095	0.043	0.059	0.069	0.147	0.174	0.205	0.093
0.038	0.033	0.024	0.021	0.031	0.029	0.143	0.100	1.303	
4.05	3.74	0.112	0.067	0.071	0.033	0.067	0.121	0.166	0.098
0.052	0.021	0.045	0.029	0.062	0.050	0.128	0.114	1.237	
5.05	4.67	0.107	0.024	0.021	0.012	0.048	0.098	0.114	0.098
0.074	0.024	0.055	0.040	0.076	0.121	0.169	0.174	1.253	
6.05	5.59	0.100	0.021	0.012	0.002	0.014	0.031	0.048	0.114
0.043	0.005	0.014	0.012	0.048	0.105	0.193	0.157	0.918	
8.05	7.44	0.081	0.000	0.007	0.002	0.000	0.024	0.019	0.062
0.017	0.007	0.007	0.010	0.038	0.266	0.409	0.304	1.253	
10.00	9.24	0.012	0.000	0.002	0.000	0.000	0.005	0.007	0.017
0.000	0.002	0.000	0.002	0.002	0.131	0.162	0.112	0.454	
24.59	22.73	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.005
0.000	0.000	0.000	0.000	0.000	0.036	0.121	0.062	0.224	
TOTAL		0.63	0.26	0.28	0.26	0.47	0.63	0.74	0.55
0.27	0.10	0.16	0.15	0.29	0.79	1.41	1.15	8.12	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS D
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.21	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.002	
1.05	0.97	0.138	0.076	0.055	0.107	0.109	0.131	0.100	0.059
0.038	0.021	0.036	0.031	0.040	0.036	0.071	0.100	1.149	
1.55	1.43	0.081	0.071	0.112	0.086	0.109	0.093	0.147	0.057
0.043	0.019	0.024	0.036	0.038	0.059	0.074	0.067	1.116	
2.05	1.90	0.064	0.071	0.150	0.131	0.174	0.169	0.224	0.076
0.055	0.040	0.040	0.045	0.038	0.086	0.138	0.102	1.603	

3.05	2.82	0.262	0.143	0.197	0.221	0.283	0.385	0.507	0.233
0.176	0.093	0.088	0.114	0.159	0.162	0.290	0.214	3.527	
4.05	3.74	0.285	0.126	0.100	0.093	0.190	0.297	0.521	0.347
0.178	0.093	0.093	0.166	0.226	0.250	0.431	0.285	3.682	
5.05	4.67	0.221	0.076	0.043	0.050	0.138	0.212	0.231	0.469
0.143	0.040	0.086	0.064	0.207	0.383	0.557	0.300	3.218	
6.05	5.59	0.143	0.050	0.017	0.014	0.040	0.114	0.107	0.266
0.112	0.036	0.052	0.024	0.131	0.545	0.521	0.362	2.533	
8.05	7.44	0.107	0.033	0.010	0.002	0.031	0.069	0.076	0.235
0.055	0.017	0.012	0.014	0.152	1.028	1.004	0.564	3.408	
10.00	9.24	0.017	0.005	0.000	0.000	0.007	0.010	0.014	0.098
0.002	0.000	0.000	0.000	0.014	0.295	0.616	0.264	1.341	
24.59	22.73	0.007	0.002	0.000	0.000	0.000	0.000	0.002	0.010
0.000	0.000	0.000	0.000	0.002	0.074	0.255	0.102	0.454	
TOTAL		1.33	0.65	0.68	0.70	1.08	1.48	1.93	1.85
0.80	0.36	0.43	0.49	1.01	2.92	3.96	2.36	22.03	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS E
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.19	0.001	0.000	0.000	0.000	0.001	0.001	0.001	0.001
0.000	0.000	0.000	0.000	0.000	0.000	0.001	0.001	0.010	
1.05	0.90	0.155	0.067	0.069	0.057	0.086	0.119	0.164	0.105
0.064	0.064	0.064	0.069	0.076	0.069	0.114	0.186	1.527	
1.55	1.33	0.095	0.076	0.038	0.076	0.067	0.140	0.205	0.086
0.024	0.043	0.081	0.048	0.078	0.078	0.081	0.197	1.413	
2.05	1.75	0.090	0.059	0.071	0.083	0.081	0.162	0.302	0.107
0.114	0.071	0.083	0.059	0.107	0.083	0.133	0.140	1.748	
3.05	2.60	0.207	0.064	0.083	0.119	0.112	0.214	0.407	0.302
0.207	0.038	0.102	0.126	0.174	0.193	0.352	0.169	2.868	
4.05	3.46	0.231	0.050	0.043	0.052	0.086	0.190	0.340	0.381
0.171	0.055	0.055	0.071	0.150	0.312	0.390	0.166	2.742	
5.05	4.32	0.169	0.059	0.029	0.019	0.045	0.117	0.200	0.376
0.095	0.010	0.043	0.014	0.052	0.319	0.457	0.214	2.217	
6.05	5.17	0.093	0.017	0.010	0.002	0.021	0.031	0.038	0.214
0.031	0.005	0.007	0.002	0.026	0.285	0.326	0.176	1.284	
8.05	6.88	0.069	0.002	0.000	0.005	0.033	0.048	0.043	0.162
0.021	0.002	0.002	0.002	0.005	0.207	0.357	0.166	1.125	
10.00	8.54	0.005	0.000	0.000	0.000	0.017	0.000	0.000	0.059
0.014	0.000	0.000	0.000	0.000	0.024	0.105	0.048	0.271	
24.59	21.01	0.000	0.000	0.000	0.000	0.000	0.005	0.002	0.002
0.000	0.000	0.000	0.000	0.000	0.024	0.014	0.007	0.055	
TOTAL		1.11	0.40	0.34	0.41	0.55	1.03	1.70	1.79
0.74	0.29	0.44	0.39	0.67	1.59	2.33	1.47	15.26	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS F
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.19	0.001	0.000	0.000	0.000	0.000	0.001	0.001	0.001
0.001	0.000	0.000	0.000	0.001	0.001	0.001	0.001	0.010	
1.05	0.90	0.152	0.088	0.071	0.045	0.086	0.150	0.209	0.169
0.126	0.050	0.078	0.067	0.145	0.128	0.245	0.243	2.053	
1.55	1.33	0.064	0.036	0.043	0.055	0.057	0.078	0.190	0.114
0.109	0.071	0.100	0.143	0.143	0.107	0.166	0.176	1.653	

2.05	1.75	0.069	0.033	0.036	0.014	0.052	0.088	0.221	0.174
0.105	0.050	0.067	0.098	0.155	0.107	0.159	0.138	1.565	
3.05	2.60	0.126	0.033	0.040	0.026	0.040	0.124	0.264	0.321
0.174	0.040	0.050	0.078	0.126	0.250	0.283	0.164	2.141	
4.05	3.46	0.067	0.010	0.026	0.019	0.010	0.071	0.166	0.302
0.105	0.036	0.019	0.036	0.059	0.193	0.304	0.143	1.565	
5.05	4.32	0.033	0.002	0.002	0.002	0.010	0.026	0.048	0.202
0.062	0.012	0.000	0.010	0.012	0.176	0.247	0.109	0.954	
6.05	5.17	0.005	0.000	0.000	0.002	0.002	0.000	0.002	0.045
0.021	0.000	0.000	0.000	0.005	0.067	0.107	0.045	0.302	
8.05	6.88	0.000	0.000	0.000	0.002	0.024	0.000	0.000	0.024
0.007	0.000	0.000	0.000	0.000	0.012	0.017	0.021	0.107	
10.00	8.54	0.000	0.000	0.000	0.000	0.007	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.002	0.000	0.000	0.005	0.014	
24.59	21.01	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.000	0.000	0.000	0.000	0.000	0.000	0.005	0.000	0.005	
TOTAL		0.52	0.20	0.22	0.17	0.29	0.54	1.10	1.35
0.71	0.26	0.31	0.43	0.65	1.04	1.54	1.05	10.37	

JOINT FREQUENCY DISTRIBUTION OF WIND SPEED AND DIRECTION
ATMOSPHERIC STABILITY CLASS G
WIND SPEED (M/S)

TOWER RELEASE		N	NNE	NE	ENE	E	ESE	SE	SSE
S	SSW	SW	WSW	W	WNW	NW	NNW	TOTAL	
0.22	0.19	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
0.001	0.000	0.001	0.001	0.001	0.001	0.001	0.001	0.010	
1.05	0.90	0.235	0.098	0.090	0.086	0.109	0.176	0.288	0.350
0.426	0.302	0.526	0.690	0.959	0.835	1.006	0.630	6.805	
1.55	1.33	0.226	0.088	0.059	0.107	0.102	0.140	0.350	0.397
0.423	0.347	0.530	0.723	1.237	1.066	1.168	0.773	7.737	
2.05	1.75	0.136	0.050	0.064	0.017	0.064	0.124	0.359	0.326
0.288	0.195	0.290	0.519	1.054	0.680	0.721	0.519	5.404	
3.05	2.60	0.150	0.052	0.021	0.010	0.048	0.128	0.350	0.381
0.243	0.126	0.186	0.297	0.749	0.628	0.823	0.497	4.688	
4.05	3.46	0.117	0.014	0.010	0.005	0.002	0.067	0.076	0.150
0.069	0.024	0.014	0.038	0.214	0.338	0.454	0.186	1.777	
5.05	4.32	0.024	0.002	0.002	0.000	0.000	0.010	0.012	0.029
0.029	0.007	0.000	0.002	0.014	0.193	0.214	0.040	0.578	
6.05	5.17	0.002	0.002	0.005	0.000	0.000	0.000	0.000	0.014
0.010	0.000	0.000	0.005	0.000	0.038	0.050	0.024	0.150	
8.05	6.88	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.017
0.007	0.000	0.000	0.000	0.000	0.007	0.014	0.010	0.055	
10.00	8.54	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.002
0.005	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.007	
24.59	21.01	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.002
0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.002	
TOTAL		0.89	0.31	0.25	0.22	0.33	0.64	1.43	1.67
1.50	1.00	1.55	2.27	4.23	3.79	4.45	2.68	27.21	

WIND MEASURED AT 13.7 METERS.
WIND SPEED CORRECTED TO THE RELEASE HEIGHT OF 10.0 METERS.

OVERALL WIND DIRECTION FREQUENCY

WIND DIRECTION:	N	NNE	NE	ENE	E	ESE	SE	SSE
S SSW SW WSW	W	WNW	NW	NNW				
FREQUENCY:	5.9	2.4	2.3	2.3	3.6	5.6	8.9	8.8
4.9 2.3 3.1 3.9	7.2	10.8	16.3	11.7				

OVERALL WIND SPEED FREQUENCY AS MEASURED ON THE TOWER:
MAX.WIND SPEED (M/S): 0.224 1.051 1.551 2.052 3.049 4.050
5.052 6.048 8.051 10.000 24.587
WIND SPEED FREQUENCY: 0.03 13.14 13.85 12.24 17.23 13.75 10.58
7.04 8.28 2.81 1.06

BUILDING AND RELEASE CHARACTERISTICS:
RELEASE HEIGHT: 10.00 METERS
MIXING VOLUME COEFFICIENT: 0.50
BUILDING CROSS-SECTIONAL AREA: 2584.00 SQUARE METERS

BOUNDARY DISTANCES (METERS) FROM THE SOURCE FOR EACH DOWNWIND SECTOR:

DOWNWIND SECTOR	S	SSW	SW	WSW	W	WNW	NW	NNW
N	NNE	NE	ENE	E	ESE	SE	SSE	
BOUNDARY 1	823.	823.	823.	823.	823.	823.	823.	823.
823.	823.	823.	823.	823.	823.	823.	823.	
BOUNDARY 2	-100.	7300.	7300.	7300.	7300.	7300.	7300.	7300.
7300.	7300.	7300.	7300.	7300.	7300.	7300.	7300.	

THE CONVERSION FACTOR APPLIED TO THE WIND SPEED CLASSES IS 0.447

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

WINDSPEEDS ADJUSTED TO 10.0 METERS.

PERCENT OF THE TIME A GIVEN WINDSPEED IS LOWER:

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.19	0.03
0.21	0.03
0.90	10.42
0.97	13.18
1.33	23.98
1.43	27.03
1.75	35.74
1.90	39.26
2.60	48.96
2.82	56.49
3.46	62.58
3.74	70.24
4.32	73.99
4.67	80.82
5.17	82.55
5.59	87.85
6.88	89.14
7.44	96.14
8.54	96.43
9.24	98.94
21.01	99.01
22.73	100.00

WINDSPEED (INTERPOLATED) (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.19	0.03
0.91	13.18
1.35	27.03
1.79	39.26
2.70	56.49
3.62	70.24
4.54	80.82
5.49	87.85
7.35	96.14
9.17	98.94
22.63	100.00

LOG-NORMAL INTERPOLATION PERCENTILES

WINDSPEED (METER/SEC)	CUMULATIVE FREQUENCY (PERCENT)
0.40	1.00
0.54	3.00
0.64	5.00
0.82	10.00
0.97	15.00
1.13	20.00
1.28	25.00
1.45	30.00
1.63	35.00
1.83	40.00
2.06	45.00
2.32	50.00
2.60	55.00
2.90	60.00
3.22	65.00
3.60	70.00
3.98	75.00
4.46	80.00
5.19	85.00
5.80	90.00

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

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TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
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PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE S SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 10.0 METERS
CA=1292.SQ.METERS

A	1.0	1.92	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	1.64	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	1.68	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	3.12	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	4.48	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	4.12	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	3.60	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	3.12	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	0.96	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
A	22.7	0.20	823.	0.	0.	157.1	310.1	157.1	2.875E-07	2.851E-07	2.851E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.64	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.76	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.60	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	1.60	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	1.88	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.80	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	1.68	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05

C	7.4	1.36	823.	0.	0.	89.7	51.2	89.7
		9.318E-06	8.552E-06	8.552E-06				
C	9.2	0.20	823.	0.	0.	89.7	51.2	89.7
		7.502E-06	6.885E-06	6.885E-06				
D	0.2	0.00	823.	0.	0.	63.2	27.1	124.7
		4.551E-04	7.248E-04	4.551E-04				
D	1.0	2.32	823.	0.	0.	63.2	27.1	124.7
		9.682E-05	1.542E-04	9.682E-05				
D	1.4	1.36	823.	0.	0.	63.2	27.1	124.7
		6.557E-05	1.044E-04	6.557E-05				
D	1.9	1.08	823.	0.	0.	63.2	27.1	124.7
		4.957E-05	7.895E-05	4.957E-05				
D	2.8	4.40	823.	0.	0.	63.2	27.1	100.8
		4.129E-05	5.313E-05	4.129E-05				
D	3.7	4.80	823.	0.	0.	63.2	27.1	84.5
		3.707E-05	4.000E-05	3.707E-05				
D	4.7	3.72	823.	0.	0.	63.2	27.1	73.7
		3.407E-05	3.207E-05	3.207E-05				
D	5.6	2.40	823.	0.	0.	63.2	27.1	66.0
		3.180E-05	2.678E-05	2.678E-05				
D	7.4	1.80	823.	0.	0.	63.2	27.1	63.2
		2.495E-05	2.012E-05	2.012E-05				
D	9.2	0.28	823.	0.	0.	63.2	27.1	63.2
		2.009E-05	1.620E-05	1.620E-05				
D	22.7	0.12	823.	0.	0.	63.2	27.1	63.2
		8.169E-06	6.589E-06	6.589E-06				
E	0.2	0.02	823.	0.	0.	44.9	18.7	132.5
		6.730E-04	1.332E-03	6.730E-04				
E	0.9	2.60	823.	0.	0.	44.9	18.7	132.5
		1.432E-04	2.835E-04	1.432E-04				
E	1.3	1.60	823.	0.	0.	44.9	18.7	132.5
		9.697E-05	1.920E-04	9.697E-05				
E	1.8	1.52	823.	0.	0.	44.9	18.7	132.5
		7.331E-05	1.451E-04	7.331E-05				
E	2.6	3.48	823.	0.	0.	44.9	18.7	102.0
		6.409E-05	9.768E-05	6.409E-05				
E	3.5	3.88	823.	0.	0.	44.9	18.7	77.1
		6.385E-05	7.353E-05	6.385E-05				
E	4.3	2.84	823.	0.	0.	44.9	18.7	62.0
		6.362E-05	5.896E-05	5.896E-05				
E	5.2	1.56	823.	0.	0.	44.9	18.7	52.0
		6.339E-05	4.924E-05	4.924E-05				
E	6.9	1.16	823.	0.	0.	44.9	18.7	44.9
		5.511E-05	3.699E-05	3.699E-05				
E	8.5	0.08	823.	0.	0.	44.9	18.7	44.9
		4.436E-05	2.978E-05	2.978E-05				
F	0.2	0.01	823.	0.	0.	31.0	12.0	121.7
		1.141E-03	2.127E-03	1.141E-03				
F	0.9	2.56	823.	0.	0.	31.0	12.0	121.7
		2.428E-04	4.526E-04	2.428E-04				
F	1.3	1.08	823.	0.	0.	31.0	12.0	121.7
		1.644E-04	3.065E-04	1.644E-04				
F	1.8	1.16	823.	0.	0.	31.0	12.0	121.7
		1.243E-04	2.317E-04	1.243E-04				
F	2.6	2.12	823.	0.	0.	31.0	12.0	87.4
		1.165E-04	1.560E-04	1.165E-04				
F	3.5	1.12	823.	0.	0.	31.0		

12.0	61.3	1.250E-04	1.174E-04	1.174E-04			
F	4.3	0.56	823.	0.	0.	31.0	
12.0	46.6	1.319E-04	9.413E-05	9.413E-05			
F	5.2	0.08	823.	0.	0.	31.0	
12.0	37.3	1.376E-04	7.862E-05	7.862E-05			
G	0.2	0.01	823.	0.	0.	21.4	
7.7	125.7	1.720E-03	3.367E-03	1.720E-03			
G	0.9	3.96	823.	0.	0.	21.4	
7.7	125.7	3.659E-04	7.163E-04	3.659E-04			
G	1.3	3.80	823.	0.	0.	21.4	
7.7	125.7	2.478E-04	4.851E-04	2.478E-04			
G	1.8	2.28	823.	0.	0.	21.4	
7.7	125.7	1.873E-04	3.667E-04	1.873E-04			
G	2.6	2.52	823.	0.	0.	21.4	
7.7	81.9	1.935E-04	2.468E-04	1.935E-04			
G	3.5	1.96	823.	0.	0.	21.4	
7.7	51.7	2.306E-04	1.858E-04	1.858E-04			
G	4.3	0.40	823.	0.	0.	21.4	
7.7	36.2	2.639E-04	1.490E-04	1.490E-04			
G	5.2	0.04	823.	0.	0.	21.4	
7.7	27.2	2.942E-04	1.244E-04	1.244E-04			

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

S SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03	1.141E-03	6.730E-04	4.551E-04	3.659E-04	3.080E-04	2.478E-04	2.428E-04	1.935E-04	1.873E-04		
0.006	0.017	0.034	0.038	3.997	4.001	7.799	10.358	12.877	15.156		
0.00033	0.00103	0.00200	0.00228	0.23776	0.23798	0.46394	0.61617	0.76601	0.90159		
1.858E-04	1.644E-04	1.490E-04	1.432E-04	1.244E-04	1.243E-04	1.174E-04	1.165E-04	9.697E-05	9.682E-05		
17.115	18.195	18.594	21.193	21.233	22.393	23.512	25.631	27.231	29.550		
1.01814	1.08236	1.10614	1.26074	1.26312	1.33210	1.39870	1.52476	1.61990	1.75785		
9.413E-05	7.862E-05	7.331E-05	6.557E-05	6.554E-05	6.409E-05	6.385E-05	5.896E-05	4.957E-05	4.924E-05		
30.109	30.189	31.709	33.068	33.708	37.186	41.065	43.904	44.983	46.543		
1.79115	1.79591	1.88629	1.96716	2.00522	2.21215	2.44287	2.61174	2.67596	2.76872		
4.439E-05	4.129E-05	3.707E-05	3.699E-05	3.356E-05	3.207E-05	2.978E-05	2.678E-05	2.258E-05	2.012E-05		
47.302	51.700	56.498	57.658	58.258	61.976	62.056	64.455	66.054	67.854		
2.81392	3.07555	3.36097	3.42995	3.46563	3.68683	3.69159	3.83430	3.92944	4.03647		
1.700E-05	1.620E-05	1.363E-05	1.138E-05	8.552E-06	6.885E-06	6.673E-06	6.589E-06	4.519E-06	3.416E-06		

```
      69.733       70.013       71.812       73.491       74.851       75.051
76.970       77.090       78.729       80.408
     4.14826      4.16491      4.27195      4.37184      4.45271      4.46461
4.57878      4.58591      4.68343      4.78333

   2.299E-06    1.731E-06    1.388E-06    1.159E-06    8.707E-07    7.010E-07
2.851E-07
      83.527       88.005       92.123       95.722       98.840       99.800
100.000
     4.96885      5.23525      5.48023      5.69430      5.87982      5.93691
5.94880

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q       WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.615
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.017
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.523
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.440
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.609
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.427
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   3.684

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  1  1      -6.36563 -10.50940  -0.91949
  1  2      -7.91319 -11.52855  -1.28044
  1  3      -8.32339 -11.97962  -1.46064
  1  4      -8.59088 -15.53834  -2.99455
  1  5      -9.05801 -15.76857  -3.10094
  1  6      -9.65890 -15.15049  -2.78723
  1  7      -9.73874 -17.27049  -3.87911
  1  8     -10.20486 -18.12899  -4.35043
  1  9     -10.34762     NUMXQ(K)=  9
    5.374E-04              0.059              1.000
    3.977E-04              0.178              3.000
    3.334E-04              0.297              5.000
    2.467E-04              0.595             10.000
    1.996E-04              0.892             15.000
    1.556E-04              1.190             20.000
    1.200E-04              1.487             25.000
    9.573E-05              1.785             30.000
    7.866E-05              2.082             35.000
    6.611E-05              2.380             40.000
    5.657E-05              2.677             45.000
    4.733E-05              2.974             50.000
    4.016E-05              3.272             55.000
    3.420E-05              3.569             60.000
```

```
    2.666E-04                0.5                8.41
ANNUAL AVERAGE =   3.34E-06
K=  1     FIVEXQ(K)= 2.666E-04     FIVEPR(K)= 8.405
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.0	4.95	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	3.27	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	2.57	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	5.05	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	4.45	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	1.88	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	1.09	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	1.09	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	0.10	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
C	0.2	0.01	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	1.68	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	1.58	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.99	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	1.78	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	2.77	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	0.99	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.89	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
D	0.2	0.01	823.	0.	0.	63.2					

AT 10.0 METERS
CA=1292.SQ.METERS

27.1	124.7	4.551E-04	7.248E-04	4.551E-04		
D	1.0	3.17	823.	0.	0.	63.2
27.1	124.7	9.682E-05	1.542E-04	9.682E-05		
D	1.4	2.97	823.	0.	0.	63.2
27.1	124.7	6.557E-05	1.044E-04	6.557E-05		
D	1.9	2.97	823.	0.	0.	63.2
27.1	124.7	4.957E-05	7.895E-05	4.957E-05		
D	2.8	5.94	823.	0.	0.	63.2
27.1	100.8	4.129E-05	5.313E-05	4.129E-05		
D	3.7	5.24	823.	0.	0.	63.2
27.1	84.5	3.707E-05	4.000E-05	3.707E-05		
D	4.7	3.17	823.	0.	0.	63.2
27.1	73.7	3.407E-05	3.207E-05	3.207E-05		
D	5.6	2.08	823.	0.	0.	63.2
27.1	66.0	3.180E-05	2.678E-05	2.678E-05		
D	7.4	1.39	823.	0.	0.	63.2
27.1	63.2	2.495E-05	2.012E-05	2.012E-05		
D	9.2	0.20	823.	0.	0.	63.2
27.1	63.2	2.009E-05	1.620E-05	1.620E-05		
D	22.7	0.10	823.	0.	0.	63.2
27.1	63.2	8.169E-06	6.589E-06	6.589E-06		
E	0.2	0.02	823.	0.	0.	44.9
18.7	132.5	6.730E-04	1.332E-03	6.730E-04		
E	0.9	2.77	823.	0.	0.	44.9
18.7	132.5	1.432E-04	2.835E-04	1.432E-04		
E	1.3	3.17	823.	0.	0.	44.9
18.7	132.5	9.697E-05	1.920E-04	9.697E-05		
E	1.8	2.47	823.	0.	0.	44.9
18.7	132.5	7.331E-05	1.451E-04	7.331E-05		
E	2.6	2.67	823.	0.	0.	44.9
18.7	102.0	6.409E-05	9.768E-05	6.409E-05		
E	3.5	2.08	823.	0.	0.	44.9
18.7	77.1	6.385E-05	7.353E-05	6.385E-05		
E	4.3	2.47	823.	0.	0.	44.9
18.7	62.0	6.362E-05	5.896E-05	5.896E-05		
E	5.2	0.69	823.	0.	0.	44.9
18.7	52.0	6.339E-05	4.924E-05	4.924E-05		
E	6.9	0.10	823.	0.	0.	44.9
18.7	44.9	5.511E-05	3.699E-05	3.699E-05		
F	0.2	0.02	823.	0.	0.	31.0
12.0	121.7	1.141E-03	2.127E-03	1.141E-03		
F	0.9	3.66	823.	0.	0.	31.0
12.0	121.7	2.428E-04	4.526E-04	2.428E-04		
F	1.3	1.48	823.	0.	0.	31.0
12.0	121.7	1.644E-04	3.065E-04	1.644E-04		
F	1.8	1.39	823.	0.	0.	31.0
12.0	121.7	1.243E-04	2.317E-04	1.243E-04		
F	2.6	1.39	823.	0.	0.	31.0
12.0	87.4	1.165E-04	1.560E-04	1.165E-04		
F	3.5	0.40	823.	0.	0.	31.0
12.0	61.3	1.250E-04	1.174E-04	1.174E-04		
F	4.3	0.10	823.	0.	0.	31.0
12.0	46.6	1.319E-04	9.413E-05	9.413E-05		
G	0.2	0.01	823.	0.	0.	21.4
7.7	125.7	1.720E-03	3.367E-03	1.720E-03		
G	0.9	4.06	823.	0.	0.	21.4
7.7	125.7	3.659E-04	7.163E-04	3.659E-04		

```
   G          1.3        3.66       823.        0.          0.         21.4
7.7    125.7       2.478E-04   4.851E-04   2.478E-04
   G          1.8        2.08       823.        0.          0.         21.4
7.7    125.7       1.873E-04   3.667E-04   1.873E-04
   G          2.6        2.18       823.        0.          0.         21.4
7.7     81.9       1.935E-04   2.468E-04   1.935E-04
   G          3.5        0.59       823.        0.          0.         21.4
7.7     51.7       2.306E-04   1.858E-04   1.858E-04
   G          4.3        0.10       823.        0.          0.         21.4
7.7     36.2       2.639E-04   1.490E-04   1.490E-04
   G          5.2        0.10       823.        0.          0.         21.4
7.7     27.2       2.942E-04   1.244E-04   1.244E-04
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSW SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.006 0.023 0.040 0.046 4.104 4.114 7.775 11.436 13.613 15.691
0.00014 0.00054 0.00096 0.00112 0.09864 0.09888 0.18688 0.27489 0.32721 0.37716

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.244E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05
16.285 17.769 17.868 20.639 20.738 22.123 22.519 23.904 27.071 30.237
0.39143 0.42711 0.42949 0.49609 0.49847 0.53177 0.54128 0.57458 0.65069 0.72680

9.413E-05 7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.896E-05 4.957E-05 4.924E-05 4.439E-05
30.336 32.810 35.779 37.461 40.133 42.211 44.685 47.653 48.346 49.929
0.72918 0.78865 0.86000 0.90044 0.96466 1.01460 1.07407 1.14542 1.16207 1.20013

4.129E-05 3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.678E-05 2.258E-05 2.012E-05 1.700E-05 1.620E-05
55.867 61.111 61.210 62.200 65.366 67.444 69.225 70.611 73.381 73.579
1.34284 1.46890 1.47128 1.49506 1.57118 1.62113 1.66394 1.69724 1.76384 1.76859

1.363E-05 1.138E-05 6.673E-06 6.589E-06 4.519E-06 3.416E-06 2.299E-06 1.731E-06 1.388E-06 1.159E-06

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      74.569      75.459      80.407      80.506      83.772      86.344
91.391      95.844      97.724      98.813
     1.79238     1.81379     1.93271     1.93509     2.01358     2.07542
2.19673     2.30376     2.34895     2.37512

   8.707E-07   7.010E-07
      99.901     100.000
     2.40128     2.40366

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.275
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.391
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.726
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.013
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.073
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   1.470

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  2  1      -6.36563 -10.91455  -0.96987
  2  2      -7.91319 -11.90626  -1.29034
  2  3      -8.32339 -14.67535  -2.28760
  2  4      -8.59088 -16.63149  -3.02305
  2  5      -9.24266 -17.52586  -3.38898
  2  6      -9.65890 -18.28483  -3.71593
  2  7      -9.73874 -18.54931  -3.83093
  2  8     -10.20486     NUMXQ(K)=  8
    5.377E-04             0.024              1.000
    3.999E-04             0.072              3.000
    3.390E-04             0.120              5.000
    2.567E-04             0.240             10.000
    1.979E-04             0.361             15.000
    1.504E-04             0.481             20.000
    1.189E-04             0.601             25.000
    9.766E-05             0.721             30.000
    8.084E-05             0.841             35.000
    6.837E-05             0.961             40.000
    5.836E-05             1.082             45.000
    5.003E-05             1.202             50.000
    4.344E-05             1.322             55.000
    3.812E-05             1.442             60.000

    1.443E-04             0.5               20.80

ANNUAL AVERAGE =   1.50E-06

K=  2     FIVEXQ(K)= 1.443E-04     FIVEPR(K)=20.802
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.0	5.27	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	3.26	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	2.74	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	4.95	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	2.74	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	1.79	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.21	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	0.42	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	0.11	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
C	0.2	0.01	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	1.90	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	1.58	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	1.05	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	2.63	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	3.16	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	0.95	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.53	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
C	7.4	0.32	823.	0.	0.	89.7	51.2	89.7	9.318E-06	8.552E-06	8.552E-06

AT 10.0 METERS
CA=1292.SQ.METERS

```
   C          9.2        0.11       823.         0.          0.          89.7
51.2     89.7       7.502E-06   6.885E-06   6.885E-06

   D          0.2        0.01       823.         0.          0.          63.2
27.1    124.7       4.551E-04   7.248E-04   4.551E-04
   D          1.0        2.42       823.         0.          0.          63.2
27.1    124.7       9.682E-05   1.542E-04   9.682E-05
   D          1.4        4.95       823.         0.          0.          63.2
27.1    124.7       6.557E-05   1.044E-04   6.557E-05
   D          1.9        6.63       823.         0.          0.          63.2
27.1    124.7       4.957E-05   7.895E-05   4.957E-05
   D          2.8        8.74       823.         0.          0.          63.2
27.1    100.8       4.129E-05   5.313E-05   4.129E-05
   D          3.7        4.42       823.         0.          0.          63.2
27.1     84.5       3.707E-05   4.000E-05   3.707E-05
   D          4.7        1.90       823.         0.          0.          63.2
27.1     73.7       3.407E-05   3.207E-05   3.207E-05
   D          5.6        0.74       823.         0.          0.          63.2
27.1     66.0       3.180E-05   2.678E-05   2.678E-05
   D          7.4        0.42       823.         0.          0.          63.2
27.1     63.2       2.495E-05   2.012E-05   2.012E-05

   E          0.2        0.02       823.         0.          0.          44.9
18.7    132.5       6.730E-04   1.332E-03   6.730E-04
   E          0.9        3.05       823.         0.          0.          44.9
18.7    132.5       1.432E-04   2.835E-04   1.432E-04
   E          1.3        1.69       823.         0.          0.          44.9
18.7    132.5       9.697E-05   1.920E-04   9.697E-05
   E          1.8        3.16       823.         0.          0.          44.9
18.7    132.5       7.331E-05   1.451E-04   7.331E-05
   E          2.6        3.69       823.         0.          0.          44.9
18.7    102.0       6.409E-05   9.768E-05   6.409E-05
   E          3.5        1.90       823.         0.          0.          44.9
18.7     77.1       6.385E-05   7.353E-05   6.385E-05
   E          4.3        1.26       823.         0.          0.          44.9
18.7     62.0       6.362E-05   5.896E-05   5.896E-05
   E          5.2        0.42       823.         0.          0.          44.9
18.7     52.0       6.339E-05   4.924E-05   4.924E-05

   F          0.2        0.01       823.         0.          0.          31.0
12.0    121.7       1.141E-03   2.127E-03   1.141E-03
   F          0.9        3.16       823.         0.          0.          31.0
12.0    121.7       2.428E-04   4.526E-04   2.428E-04
   F          1.3        1.90       823.         0.          0.          31.0
12.0    121.7       1.644E-04   3.065E-04   1.644E-04
   F          1.8        1.58       823.         0.          0.          31.0
12.0    121.7       1.243E-04   2.317E-04   1.243E-04
   F          2.6        1.79       823.         0.          0.          31.0
12.0     87.4       1.165E-04   1.560E-04   1.165E-04
   F          3.5        1.16       823.         0.          0.          31.0
12.0     61.3       1.250E-04   1.174E-04   1.174E-04
   F          4.3        0.11       823.         0.          0.          31.0
12.0     46.6       1.319E-04   9.413E-05   9.413E-05

   G          0.2        0.01       823.         0.          0.          21.4
7.7     125.7       1.720E-03   3.367E-03   1.720E-03
   G          0.9        4.00       823.         0.          0.          21.4
7.7     125.7       3.659E-04   7.163E-04   3.659E-04
   G          1.3        2.63       823.         0.          0.          21.4
7.7     125.7       2.478E-04   4.851E-04   2.478E-04
```

G	1.8	2.84	823.	0.	0.	21.4	7.7	125.7	1.873E-04	3.667E-04	1.873E-04
G	2.6	0.95	823.	0.	0.	21.4	7.7	81.9	1.935E-04	2.468E-04	1.935E-04
G	3.5	0.42	823.	0.	0.	21.4	7.7	51.7	2.306E-04	1.858E-04	1.858E-04
G	4.3	0.11	823.	0.	0.	21.4	7.7	36.2	2.639E-04	1.490E-04	1.490E-04
G	5.2	0.21	823.	0.	0.	21.4	7.7	27.2	2.942E-04	1.244E-04	1.244E-04

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SW SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03	1.141E-03	6.730E-04	4.551E-04	3.659E-04	3.080E-04	2.478E-04	2.428E-04	1.935E-04	1.873E-04	
0.006	0.020	0.039	0.044	4.046	4.057	6.690	9.850	10.798	13.641	
0.00013	0.00046	0.00089	0.00100	0.09138	0.09164	0.15110	0.22246	0.24386	0.30808	

1.858E-04	1.644E-04	1.490E-04	1.432E-04	1.244E-04	1.243E-04	1.174E-04	1.165E-04	9.697E-05	9.682E-05	
14.062	15.958	16.063	19.118	19.328	20.908	22.066	23.857	25.542	27.964	
0.31760	0.36041	0.36279	0.43177	0.43652	0.47220	0.49836	0.53880	0.57685	0.63156	

9.413E-05	7.331E-05	6.557E-05	6.554E-05	6.409E-05	6.385E-05	5.896E-05	4.957E-05	4.924E-05	4.439E-05	
28.069	31.229	36.179	38.074	41.760	43.656	44.920	51.555	51.976	53.556	
0.63394	0.70529	0.81708	0.85990	0.94315	0.98596	1.01450	1.16435	1.17386	1.20954	

4.129E-05	3.707E-05	3.356E-05	3.207E-05	2.678E-05	2.258E-05	2.012E-05	1.700E-05	1.363E-05	1.138E-05	
62.297	66.720	67.773	69.669	70.406	73.039	73.460	76.620	77.568	78.094	
1.40696	1.50685	1.53064	1.57345	1.59010	1.64957	1.65908	1.73044	1.75184	1.76373	

8.552E-06	6.885E-06	6.673E-06	4.519E-06	3.416E-06	2.299E-06	1.731E-06	1.388E-06	1.159E-06	8.707E-07

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     78.410      78.516      83.781      87.046      89.784      94.734
97.472      99.263      99.473      99.895
     1.77087     1.77325     1.89217     1.96591     2.02775     2.13954
2.20138     2.24182     2.24657     2.25609

   7.010E-07
     100.000
     2.25847

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.222
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.317
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.431
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.538
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   0.985
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   1.405

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  3  1      -6.36563 -10.94988  -0.97418
  3  2      -7.91319 -12.60739  -1.50591
  3  3      -8.32339 -14.91943  -2.31865
  3  4      -8.59088 -15.50353  -2.53265
  3  5      -8.85138 -15.96740  -2.70925
  3  6      -9.05801 -16.08085  -2.75374
  3  7      -9.65890 -17.11714  -3.19810
  3  8     -10.09480     NUMXQ(K)=  8
    5.354E-04              0.023              1.000
    3.983E-04              0.068              3.000
    3.328E-04              0.113              5.000
    2.401E-04              0.226             10.000
    1.760E-04              0.339             15.000
    1.373E-04              0.452             20.000
    1.113E-04              0.565             25.000
    9.319E-05              0.678             30.000
    7.995E-05              0.790             35.000
    6.985E-05              0.903             40.000
    6.157E-05              1.016             45.000
    5.420E-05              1.129             50.000
    4.822E-05              1.242             55.000
    4.328E-05              1.355             60.000

    1.249E-04              0.5               22.14

ANNUAL AVERAGE =   1.41E-06

K=  3     FIVEXQ(K)= 1.249E-04     FIVEPR(K)=22.139
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WSW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.0	4.62	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	4.52	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	3.28	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	6.47	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	3.18	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	0.72	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.82	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	0.10	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.72	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	2.26	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	3.08	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	2.98	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	1.44	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	0.51	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.10	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
C	7.4	0.10	823.	0.	0.	89.7	51.2	89.7	9.318E-06	8.552E-06	8.552E-06
D	0.2	0.01	823.	0.	0.	63.2					

CA=1292.SQ.METERS AT 10.0 METERS

27.1	124.7	4.551E-04	7.248E-04	4.551E-04		
D	1.0	4.62	823.	0.	0.	63.2
27.1	124.7	9.682E-05	1.542E-04	9.682E-05		
D	1.4	3.69	823.	0.	0.	63.2
27.1	124.7	6.557E-05	1.044E-04	6.557E-05		
D	1.9	5.64	823.	0.	0.	63.2
27.1	124.7	4.957E-05	7.895E-05	4.957E-05		
D	2.8	9.54	823.	0.	0.	63.2
27.1	100.8	4.129E-05	5.313E-05	4.129E-05		
D	3.7	4.00	823.	0.	0.	63.2
27.1	84.5	3.707E-05	4.000E-05	3.707E-05		
D	4.7	2.16	823.	0.	0.	63.2
27.1	73.7	3.407E-05	3.207E-05	3.207E-05		
D	5.6	0.62	823.	0.	0.	63.2
27.1	66.0	3.180E-05	2.678E-05	2.678E-05		
D	7.4	0.10	823.	0.	0.	63.2
27.1	63.2	2.495E-05	2.012E-05	2.012E-05		
E	0.2	0.02	823.	0.	0.	44.9
18.7	132.5	6.730E-04	1.332E-03	6.730E-04		
E	0.9	2.46	823.	0.	0.	44.9
18.7	132.5	1.432E-04	2.835E-04	1.432E-04		
E	1.3	3.28	823.	0.	0.	44.9
18.7	132.5	9.697E-05	1.920E-04	9.697E-05		
E	1.8	3.59	823.	0.	0.	44.9
18.7	132.5	7.331E-05	1.451E-04	7.331E-05		
E	2.6	5.13	823.	0.	0.	44.9
18.7	102.0	6.409E-05	9.768E-05	6.409E-05		
E	3.5	2.26	823.	0.	0.	44.9
18.7	77.1	6.385E-05	7.353E-05	6.385E-05		
E	4.3	0.82	823.	0.	0.	44.9
18.7	62.0	6.362E-05	5.896E-05	5.896E-05		
E	5.2	0.10	823.	0.	0.	44.9
18.7	52.0	6.339E-05	4.924E-05	4.924E-05		
E	6.9	0.21	823.	0.	0.	44.9
18.7	44.9	5.511E-05	3.699E-05	3.699E-05		
F	0.2	0.01	823.	0.	0.	31.0
12.0	121.7	1.141E-03	2.127E-03	1.141E-03		
F	0.9	1.95	823.	0.	0.	31.0
12.0	121.7	2.428E-04	4.526E-04	2.428E-04		
F	1.3	2.36	823.	0.	0.	31.0
12.0	121.7	1.644E-04	3.065E-04	1.644E-04		
F	1.8	0.62	823.	0.	0.	31.0
12.0	121.7	1.243E-04	2.317E-04	1.243E-04		
F	2.6	1.13	823.	0.	0.	31.0
12.0	87.4	1.165E-04	1.560E-04	1.165E-04		
F	3.5	0.82	823.	0.	0.	31.0
12.0	61.3	1.250E-04	1.174E-04	1.174E-04		
F	4.3	0.10	823.	0.	0.	31.0
12.0	46.6	1.319E-04	9.413E-05	9.413E-05		
F	5.2	0.10	823.	0.	0.	31.0
12.0	37.3	1.376E-04	7.862E-05	7.862E-05		
F	6.9	0.10	823.	0.	0.	31.0
12.0	31.0	1.243E-04	5.906E-05	5.906E-05		
G	0.2	0.01	823.	0.	0.	21.4
7.7	125.7	1.720E-03	3.367E-03	1.720E-03		
G	0.9	3.69	823.	0.	0.	21.4
7.7	125.7	3.659E-04	7.163E-04	3.659E-04		

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   G          1.3        4.62       823.        0.          0.        21.4
7.7    125.7       2.478E-04   4.851E-04   2.478E-04
   G          1.8        0.72       823.        0.          0.        21.4
7.7    125.7       1.873E-04   3.667E-04   1.873E-04
   G          2.6        0.41       823.        0.          0.        21.4
7.7     81.9       1.935E-04   2.468E-04   1.935E-04
   G          3.5        0.21       823.        0.          0.        21.4
7.7     51.7       2.306E-04   1.858E-04   1.858E-04
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WSW SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03	1.141E-03	6.730E-04	4.551E-04	3.659E-04	3.080E-04	2.478E-04	2.428E-04	1.935E-04	1.873E-04	
0.005	0.014	0.030	0.039	3.734	3.738	8.356	10.306	10.716	11.435	
0.00012	0.00033	0.00068	0.00091	0.08653	0.08663	0.19366	0.23886	0.24837	0.26502	

1.858E-04	1.644E-04	1.432E-04	1.243E-04	1.174E-04	1.165E-04	9.697E-05	9.682E-05	9.413E-05	7.862E-05	
11.640	14.000	16.463	17.079	17.900	19.029	22.313	26.931	27.034	27.136	
0.26978	0.32448	0.38157	0.39584	0.41487	0.44103	0.51714	0.62418	0.62655	0.62893	

7.331E-05	6.557E-05	6.554E-05	6.409E-05	6.385E-05	5.906E-05	5.896E-05	4.957E-05	4.924E-05	4.439E-05	
30.728	34.423	35.141	40.272	42.530	42.633	43.454	49.098	49.201	51.458	
0.71218	0.79781	0.81446	0.93338	0.98571	0.98809	1.00712	1.13794	1.14031	1.19264	

4.129E-05	3.707E-05	3.699E-05	3.356E-05	3.207E-05	2.678E-05	2.258E-05	2.012E-05	1.700E-05	1.363E-05	
61.003	65.005	65.210	68.289	70.444	71.060	74.036	74.139	75.575	76.088	
1.41384	1.50661	1.51136	1.58272	1.63267	1.64694	1.71592	1.71829	1.75159	1.76349	

1.138E-05	8.552E-06	6.673E-06	4.519E-06	3.416E-06	2.299E-06	1.731E-06	1.388E-06	1.159E-06	8.707E-07

```
      76.191       76.294       80.912       85.427       88.711       95.177
98.358       99.076       99.897      100.000
     1.76586      1.76824      1.87528      1.97993      2.05604      2.20589
2.27962      2.29627      2.31530      2.31768

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q       WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.239
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.381
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.623
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.985
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.412
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   1.510

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  4  1      -6.36563 -10.97519  -0.97727
  4  2      -7.91319 -12.04361  -1.31827
  4  3      -8.32339 -18.01765  -3.43518
  4  4      -8.85138 -15.00181  -2.30496
  4  5      -9.24266 -15.49225  -2.50125
  4  6      -9.65890 -17.00895  -3.15158
  4  7     -10.09480 -19.26735  -4.18100
  4  8     -10.20486     NUMXQ(K)=  8
    5.242E-04              0.023              1.000
    3.894E-04              0.070              3.000
    3.264E-04              0.116              5.000
    2.459E-04              0.232             10.000
    1.593E-04              0.348             15.000
    1.230E-04              0.464             20.000
    1.029E-04              0.579             25.000
    8.793E-05              0.695             30.000
    7.647E-05              0.811             35.000
    6.762E-05              0.927             40.000
    5.972E-05              1.043             45.000
    5.265E-05              1.159             50.000
    4.690E-05              1.275             55.000
    4.215E-05              1.391             60.000
    3.719E-05              1.506             65.000

    1.158E-04              0.5               21.57

ANNUAL AVERAGE =   1.40E-06

K=  4     FIVEXQ(K)= 1.158E-04     FIVEPR(K)=21.573
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE W SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS METERS
AT 10.0 METERS
CA=1292.SQ.METERS

A	1.0	2.62	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	5.37	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	5.77	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	6.03	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	3.80	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	1.44	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.20	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	0.07	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
C	0.2	0.01	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.92	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	1.44	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	2.88	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	4.06	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	1.84	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.31	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.39	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
D	0.2	0.01	823.	0.	0.	63.2	27.1	124.7	4.551E-04	7.248E-04	4.551E-04
D	1.0	3.02	823.	0.	0.	63.2					

27.1	124.7	9.682E-05	1.542E-04	9.682E-05		
D	1.4	3.02	823.	0.	0.	63.2
27.1	124.7	6.557E-05	1.044E-04	6.557E-05		
D	1.9	4.78	823.	0.	0.	63.2
27.1	124.7	4.957E-05	7.895E-05	4.957E-05		
D	2.8	7.80	823.	0.	0.	63.2
27.1	100.8	4.129E-05	5.313E-05	4.129E-05		
D	3.7	5.24	823.	0.	0.	63.2
27.1	84.5	3.707E-05	4.000E-05	3.707E-05		
D	4.7	3.80	823.	0.	0.	63.2
27.1	73.7	3.407E-05	3.207E-05	3.207E-05		
D	5.6	1.11	823.	0.	0.	63.2
27.1	66.0	3.180E-05	2.678E-05	2.678E-05		
D	7.4	0.85	823.	0.	0.	63.2
27.1	63.2	2.495E-05	2.012E-05	2.012E-05		
D	9.2	0.20	823.	0.	0.	63.2
27.1	63.2	2.009E-05	1.620E-05	1.620E-05		
E	0.2	0.01	823.	0.	0.	44.9
18.7	132.5	6.730E-04	1.332E-03	6.730E-04		
E	0.9	2.36	823.	0.	0.	44.9
18.7	132.5	1.432E-04	2.835E-04	1.432E-04		
E	1.3	1.84	823.	0.	0.	44.9
18.7	132.5	9.697E-05	1.920E-04	9.697E-05		
E	1.8	2.23	823.	0.	0.	44.9
18.7	132.5	7.331E-05	1.451E-04	7.331E-05		
E	2.6	3.08	823.	0.	0.	44.9
18.7	102.0	6.409E-05	9.768E-05	6.409E-05		
E	3.5	2.36	823.	0.	0.	44.9
18.7	77.1	6.385E-05	7.353E-05	6.385E-05		
E	4.3	1.25	823.	0.	0.	44.9
18.7	62.0	6.362E-05	5.896E-05	5.896E-05		
E	5.2	0.59	823.	0.	0.	44.9
18.7	52.0	6.339E-05	4.924E-05	4.924E-05		
E	6.9	0.92	823.	0.	0.	44.9
18.7	44.9	5.511E-05	3.699E-05	3.699E-05		
E	8.5	0.46	823.	0.	0.	44.9
18.7	44.9	4.436E-05	2.978E-05	2.978E-05		
F	0.2	0.01	823.	0.	0.	31.0
12.0	121.7	1.141E-03	2.127E-03	1.141E-03		
F	0.9	2.36	823.	0.	0.	31.0
12.0	121.7	2.428E-04	4.526E-04	2.428E-04		
F	1.3	1.57	823.	0.	0.	31.0
12.0	121.7	1.644E-04	3.065E-04	1.644E-04		
F	1.8	1.44	823.	0.	0.	31.0
12.0	121.7	1.243E-04	2.317E-04	1.243E-04		
F	2.6	1.11	823.	0.	0.	31.0
12.0	87.4	1.165E-04	1.560E-04	1.165E-04		
F	3.5	0.26	823.	0.	0.	31.0
12.0	61.3	1.250E-04	1.174E-04	1.174E-04		
F	4.3	0.26	823.	0.	0.	31.0
12.0	46.6	1.319E-04	9.413E-05	9.413E-05		
F	5.2	0.07	823.	0.	0.	31.0
12.0	37.3	1.376E-04	7.862E-05	7.862E-05		
F	6.9	0.66	823.	0.	0.	31.0
12.0	31.0	1.243E-04	5.906E-05	5.906E-05		
F	8.5	0.20	823.	0.	0.	31.0
12.0	31.0	1.001E-04	4.755E-05	4.755E-05		

```
   G          0.2        0.00       823.        0.          0.         21.4
7.7    125.7       1.720E-03   3.367E-03   1.720E-03
   G          0.9        3.02       823.        0.          0.         21.4
7.7    125.7       3.659E-04   7.163E-04   3.659E-04
   G          1.3        2.82       823.        0.          0.         21.4
7.7    125.7       2.478E-04   4.851E-04   2.478E-04
   G          1.8        1.77       823.        0.          0.         21.4
7.7    125.7       1.873E-04   3.667E-04   1.873E-04
   G          2.6        1.31       823.        0.          0.         21.4
7.7     81.9       1.935E-04   2.468E-04   1.935E-04
   G          3.5        0.07       823.        0.          0.         21.4
7.7     51.7       2.306E-04   1.858E-04   1.858E-04
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

W SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.004 0.015 0.030 0.036 3.051 3.057 5.875 8.235 9.546 11.316
0.00015 0.00055 0.00108 0.00131 0.11072 0.11092 0.21319 0.29882 0.34639 0.41061

1.858E-04 1.644E-04 1.432E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05 9.413E-05 7.862E-05
11.381 12.954 15.314 16.756 17.018 18.132 19.968 22.983 23.245 23.311
0.41299 0.47007 0.55570 0.60803 0.61754 0.65798 0.72458 0.83399 0.84350 0.84588

7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.906E-05 5.896E-05 4.957E-05 4.924E-05 4.755E-05
25.539 28.554 29.472 32.553 34.912 35.568 36.813 41.598 42.188 42.385
0.92675 1.03616 1.06946 1.18125 1.26688 1.29066 1.33586 1.50949 1.53089 1.53803

4.439E-05 4.129E-05 3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.978E-05 2.678E-05 2.258E-05 2.012E-05
43.827 51.627 56.870 57.788 60.672 64.474 64.933 66.047 70.111 70.963
1.59036 1.87340 2.06368 2.09698 2.20164 2.33959 2.35624 2.39667 2.54414 2.57506

1.700E-05 1.620E-05 1.363E-05 1.138E-05 6.673E-06 4.519E-06 3.416E-06 2.299E-06 1.731E-06 1.388E-06

```
      72.798       72.995       74.306       74.699       77.321       82.696
88.464       94.494       98.296       99.738
     2.64166      2.64880      2.69637      2.71064      2.80578      3.00082
3.21013      3.42895      3.56690      3.61923

   1.159E-06   8.707E-07
      99.934     100.000
     3.62637     3.62875

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q       WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.298
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.410
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   0.555
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   0.833
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.265
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.095
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.337

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  5  1      -6.36563 -10.86109  -0.96332
  5  2      -7.91319 -11.95326  -1.32022
  5  3      -8.32339 -15.05874  -2.44971
  5  4      -8.58265 -15.40637  -2.58121
  5  5      -8.85138 -15.68623  -2.69141
  5  6      -9.24266 -15.57123  -2.64338
  5  7      -9.65890 -15.70107  -2.70143
  5  8     -10.20486 -16.52685  -3.10730
  5  9     -10.34762     NUMXQ(K)=  9
    4.979E-04              0.036              1.000
    3.677E-04              0.109              3.000
    2.997E-04              0.181              5.000
    2.074E-04              0.363             10.000
    1.459E-04              0.544             15.000
    1.109E-04              0.726             20.000
    8.920E-05              0.907             25.000
    7.445E-05              1.089             30.000
    6.369E-05              1.270             35.000
    5.532E-05              1.451             40.000
    4.874E-05              1.633             45.000
    4.345E-05              1.814             50.000
    3.910E-05              1.996             55.000
    3.523E-05              2.177             60.000

    1.574E-04              0.5               13.78
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ANNUAL AVERAGE =   1.91E-06

K=  5     FIVEXQ(K)= 1.574E-04     FIVEPR(K)=13.779
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE WNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.0	1.78	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	3.81	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	4.20	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	7.80	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	3.52	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	1.10	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.42	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	0.38	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	0.08	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.72	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	1.14	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	1.27	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	3.09	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	2.16	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.74	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.55	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
C	7.4	0.42	823.	0.	0.	89.7	51.2	89.7	9.318E-06	8.552E-06	8.552E-06

AT 10.0 METERS
CA=1292.SQ.METERS

C	9.2	0.08	823.	0.	0.	89.7	51.2	89.7
		7.502E-06	6.885E-06	6.885E-06				
D	0.2	0.00	823.	0.	0.	63.2	27.1	124.7
		4.551E-04	7.248E-04	4.551E-04				
D	1.0	2.33	823.	0.	0.	63.2	27.1	124.7
		9.682E-05	1.542E-04	9.682E-05				
D	1.4	1.65	823.	0.	0.	63.2	27.1	124.7
		6.557E-05	1.044E-04	6.557E-05				
D	1.9	3.01	823.	0.	0.	63.2	27.1	124.7
		4.957E-05	7.895E-05	4.957E-05				
D	2.8	6.86	823.	0.	0.	63.2	27.1	100.8
		4.129E-05	5.313E-05	4.129E-05				
D	3.7	5.30	823.	0.	0.	63.2	27.1	84.5
		3.707E-05	4.000E-05	3.707E-05				
D	4.7	3.77	823.	0.	0.	63.2	27.1	73.7
		3.407E-05	3.207E-05	3.207E-05				
D	5.6	2.03	823.	0.	0.	63.2	27.1	66.0
		3.180E-05	2.678E-05	2.678E-05				
D	7.4	1.23	823.	0.	0.	63.2	27.1	63.2
		2.495E-05	2.012E-05	2.012E-05				
D	9.2	0.17	823.	0.	0.	63.2	27.1	63.2
		2.009E-05	1.620E-05	1.620E-05				
E	0.2	0.01	823.	0.	0.	44.9	18.7	132.5
		6.730E-04	1.332E-03	6.730E-04				
E	0.9	2.12	823.	0.	0.	44.9	18.7	132.5
		1.432E-04	2.835E-04	1.432E-04				
E	1.3	2.50	823.	0.	0.	44.9	18.7	132.5
		9.697E-05	1.920E-04	9.697E-05				
E	1.8	2.88	823.	0.	0.	44.9	18.7	132.5
		7.331E-05	1.451E-04	7.331E-05				
E	2.6	3.81	823.	0.	0.	44.9	18.7	102.0
		6.409E-05	9.768E-05	6.409E-05				
E	3.5	3.39	823.	0.	0.	44.9	18.7	77.1
		6.385E-05	7.353E-05	6.385E-05				
E	4.3	2.08	823.	0.	0.	44.9	18.7	62.0
		6.362E-05	5.896E-05	5.896E-05				
E	5.2	0.55	823.	0.	0.	44.9	18.7	52.0
		6.339E-05	4.924E-05	4.924E-05				
E	6.9	0.85	823.	0.	0.	44.9	18.7	44.9
		5.511E-05	3.699E-05	3.699E-05				
E	21.0	0.08	823.	0.	0.	44.9	18.7	44.9
		1.804E-05	1.211E-05	1.211E-05				
F	0.2	0.01	823.	0.	0.	31.0	12.0	121.7
		1.141E-03	2.127E-03	1.141E-03				
F	0.9	2.67	823.	0.	0.	31.0	12.0	121.7
		2.428E-04	4.526E-04	2.428E-04				
F	1.3	1.40	823.	0.	0.	31.0	12.0	121.7
		1.644E-04	3.065E-04	1.644E-04				
F	1.8	1.57	823.	0.	0.	31.0	12.0	121.7
		1.243E-04	2.317E-04	1.243E-04				
F	2.6	2.20	823.	0.	0.	31.0	12.0	87.4
		1.165E-04	1.560E-04	1.165E-04				
F	3.5	1.27	823.	0.	0.	31.0	12.0	61.3
		1.250E-04	1.174E-04	1.174E-04				
F	4.3	0.47	823.	0.	0.	31.0	12.0	46.6
		1.319E-04	9.413E-05	9.413E-05				

G		0.2	0.00	823.	0.	0.	21.4	7.7	125.7
	1.720E-03	3.367E-03	1.720E-03						
G		0.9	3.14	823.	0.	0.	21.4	7.7	125.7
	3.659E-04	7.163E-04	3.659E-04						
G		1.3	2.50	823.	0.	0.	21.4	7.7	125.7
	2.478E-04	4.851E-04	2.478E-04						
G		1.8	2.20	823.	0.	0.	21.4	7.7	125.7
	1.873E-04	3.667E-04	1.873E-04						
G		2.6	2.29	823.	0.	0.	21.4	7.7	81.9
	1.935E-04	2.468E-04	1.935E-04						
G		3.5	1.19	823.	0.	0.	21.4	7.7	51.7
	2.306E-04	1.858E-04	1.858E-04						
G		4.3	0.17	823.	0.	0.	21.4	7.7	36.2
	2.639E-04	1.490E-04	1.490E-04						

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

WNW SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.004 0.017 0.030 0.035 3.170 3.175 5.675 8.344 10.633 12.836
0.00025 0.00094 0.00168 0.00195 0.17796 0.17820 0.31853 0.46838 0.59682 0.72050

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05 9.413E-05
14.023 15.421 15.590 17.709 19.277 20.548 22.752 25.252 27.582 28.048
0.78710 0.86559 0.87511 0.99403 1.08204 1.15339 1.27708 1.41741 1.54823 1.57439

7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.896E-05 4.957E-05 4.924E-05 4.439E-05 4.129E-05
30.930 32.583 33.303 37.117 40.507 42.583 45.591 46.142 47.286 54.151
1.73613 1.82889 1.86933 2.08339 2.27368 2.39022 2.55910 2.59002 2.65424 3.03956

3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.678E-05 2.258E-05 2.012E-05 1.700E-05 1.620E-05 1.363E-05
59.448 60.295 61.567 65.338 67.372 70.465 71.694 73.855 74.025 75.762
3.33687 3.38444 3.45580 3.66749 3.78166 3.95529 4.02426 4.14557 4.15508 4.25260

1.211E-05 1.138E-05 8.552E-06 6.885E-06 6.673E-06 4.519E-06 3.416E-06 2.299E-06 1.731E-06 1.388E-06

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      75.847      76.398      76.821      76.906      78.686      82.499
86.695      94.491      98.008      99.110
     4.25736     4.28828     4.31206     4.31682     4.41672     4.63079
4.86626     5.30391     5.50132     5.56316

   1.159E-06   8.707E-07   7.010E-07
      99.534      99.915     100.000
     5.58695     5.60836     5.61311

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
      CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.468
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   0.786
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.546
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.271
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.381
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.664

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  6  1      -6.36563 -10.64262  -0.93630
  6  2      -7.91319 -11.69273  -1.29653
  6  3      -8.32339 -12.11222  -1.45795
  6  4      -8.59088 -14.70911  -2.53314
  6  5      -9.24266 -14.95337  -2.64633
  6  6      -9.65890 -15.96542  -3.15219
  6  7     -10.20486 -17.36584  -3.91850
  6  8     -10.34762     NUMXQ(K)=  8
    5.044E-04              0.056              1.000
    3.718E-04              0.168              3.000
    3.031E-04              0.281              5.000
    2.215E-04              0.561             10.000
    1.745E-04              0.842             15.000
    1.329E-04              1.123             20.000
    1.068E-04              1.403             25.000
    8.858E-05              1.684             30.000
    7.502E-05              1.965             35.000
    6.476E-05              2.245             40.000
    5.546E-05              2.526             45.000
    4.805E-05              2.807             50.000
    4.210E-05              3.087             55.000
    3.725E-05              3.368             60.000
    3.237E-05              3.649             65.000

    2.349E-04              0.5                8.91

ANNUAL AVERAGE =   3.03E-06
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K=  6     FIVEXQ(K)= 2.349E-04     FIVEPR(K)= 8.908
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 10.0 METERS
CA=1292.SQ.METERS

A	1.0	0.93	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	2.34	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	2.34	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	6.62	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	6.38	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	3.22	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.72	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	0.27	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.51	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.77	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.69	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	2.29	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	1.86	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.28	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.53	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
C	7.4	0.21	823.	0.	0.	89.7	51.2	89.7	9.318E-06	8.552E-06	8.552E-06
C	9.2	0.08	823.	0.	0.	89.7	51.2	89.7	7.502E-06	6.885E-06	6.885E-06

D	0.2	0.00	823.	0.	0.	63.2	
27.1	124.7	4.551E-04	7.248E-04	4.551E-04			
D	1.0	1.12	823.	0.	0.	63.2	
27.1	124.7	9.682E-05	1.542E-04	9.682E-05			
D	1.4	1.65	823.	0.	0.	63.2	
27.1	124.7	6.557E-05	1.044E-04	6.557E-05			
D	1.9	2.50	823.	0.	0.	63.2	
27.1	124.7	4.957E-05	7.895E-05	4.957E-05			
D	2.8	5.66	823.	0.	0.	63.2	
27.1	100.8	4.129E-05	5.313E-05	4.129E-05			
D	3.7	5.82	823.	0.	0.	63.2	
27.1	84.5	3.707E-05	4.000E-05	3.707E-05			
D	4.7	2.58	823.	0.	0.	63.2	
27.1	73.7	3.407E-05	3.207E-05	3.207E-05			
D	5.6	1.20	823.	0.	0.	63.2	
27.1	66.0	3.180E-05	2.678E-05	2.678E-05			
D	7.4	0.85	823.	0.	0.	63.2	
27.1	63.2	2.495E-05	2.012E-05	2.012E-05			
D	9.2	0.16	823.	0.	0.	63.2	
27.1	63.2	2.009E-05	1.620E-05	1.620E-05			
D	22.7	0.03	823.	0.	0.	63.2	
27.1	63.2	8.169E-06	6.589E-06	6.589E-06			
E	0.2	0.01	823.	0.	0.	44.9	
18.7	132.5	6.730E-04	1.332E-03	6.730E-04			
E	0.9	1.84	823.	0.	0.	44.9	
18.7	132.5	1.432E-04	2.835E-04	1.432E-04			
E	1.3	2.29	823.	0.	0.	44.9	
18.7	132.5	9.697E-05	1.920E-04	9.697E-05			
E	1.8	3.38	823.	0.	0.	44.9	
18.7	132.5	7.331E-05	1.451E-04	7.331E-05			
E	2.6	4.55	823.	0.	0.	44.9	
18.7	102.0	6.409E-05	9.768E-05	6.409E-05			
E	3.5	3.80	823.	0.	0.	44.9	
18.7	77.1	6.385E-05	7.353E-05	6.385E-05			
E	4.3	2.23	823.	0.	0.	44.9	
18.7	62.0	6.362E-05	5.896E-05	5.896E-05			
E	5.2	0.43	823.	0.	0.	44.9	
18.7	52.0	6.339E-05	4.924E-05	4.924E-05			
E	6.9	0.48	823.	0.	0.	44.9	
18.7	44.9	5.511E-05	3.699E-05	3.699E-05			
E	21.0	0.03	823.	0.	0.	44.9	
18.7	44.9	1.804E-05	1.211E-05	1.211E-05			
F	0.2	0.01	823.	0.	0.	31.0	
12.0	121.7	1.141E-03	2.127E-03	1.141E-03			
F	0.9	2.34	823.	0.	0.	31.0	
12.0	121.7	2.428E-04	4.526E-04	2.428E-04			
F	1.3	2.13	823.	0.	0.	31.0	
12.0	121.7	1.644E-04	3.065E-04	1.644E-04			
F	1.8	2.47	823.	0.	0.	31.0	
12.0	121.7	1.243E-04	2.317E-04	1.243E-04			
F	2.6	2.95	823.	0.	0.	31.0	
12.0	87.4	1.165E-04	1.560E-04	1.165E-04			
F	3.5	1.86	823.	0.	0.	31.0	
12.0	61.3	1.250E-04	1.174E-04	1.174E-04			
F	4.3	0.53	823.	0.	0.	31.0	
12.0	46.6	1.319E-04	9.413E-05	9.413E-05			
F	5.2	0.03	823.	0.	0.	31.0	

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12.0     37.3      1.376E-04   7.862E-05   7.862E-05

   G         0.2       0.00      823.        0.          0.        21.4
7.7    125.7      1.720E-03   3.367E-03   1.720E-03
   G         0.9       3.22      823.        0.          0.        21.4
7.7    125.7      3.659E-04   7.163E-04   3.659E-04
   G         1.3       3.91      823.        0.          0.        21.4
7.7    125.7      2.478E-04   4.851E-04   2.478E-04
   G         1.8       4.02      823.        0.          0.        21.4
7.7    125.7      1.873E-04   3.667E-04   1.873E-04
   G         2.6       3.91      823.        0.          0.        21.4
7.7     81.9      1.935E-04   2.468E-04   1.935E-04
   G         3.5       0.85      823.        0.          0.        21.4
7.7     51.7      2.306E-04   1.858E-04   1.858E-04
   G         4.3       0.13      823.        0.          0.        21.4
7.7     36.2      2.639E-04   1.490E-04   1.490E-04
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NW SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03	1.141E-03	6.730E-04	4.551E-04	3.659E-04	3.080E-04	2.478E-04	2.428E-04	1.935E-04	1.873E-04		
0.004	0.015	0.027	0.029	3.247	3.250	7.159	9.500	13.409	17.425		
0.00040	0.00137	0.00240	0.00260	0.29040	0.29067	0.64031	0.84962	1.19926	1.55842		

1.858E-04	1.644E-04	1.490E-04	1.432E-04	1.243E-04	1.174E-04	1.165E-04	9.697E-05	9.682E-05	9.413E-05		
18.276	20.403	20.536	22.371	24.845	26.706	29.658	31.945	33.062	33.594		
1.63453	1.82481	1.83671	2.00082	2.22203	2.38852	2.65254	2.85709	2.95699	3.00456		

7.862E-05	7.331E-05	6.557E-05	6.554E-05	6.409E-05	6.385E-05	5.896E-05	4.957E-05	4.924E-05	4.439E-05		
33.621	36.998	38.647	39.152	43.700	47.503	49.737	52.237	52.662	53.433		
3.00694	3.30901	3.45648	3.50167	3.90839	4.24852	4.44832	4.67190	4.70995	4.77893		

4.129E-05	3.707E-05	3.699E-05	3.356E-05	3.207E-05	2.678E-05	2.258E-05	2.012E-05	1.700E-05	1.620E-05		
59.098	64.922	65.401	66.092	68.672	69.869	72.156	73.007	74.868	75.028		
5.28556	5.80645	5.84927	5.91111	6.14182	6.24886	6.45341	6.52952	6.69602	6.71029		

1.363E-05	1.211E-05	1.138E-05	8.552E-06	6.885E-06	6.673E-06	6.589E-06	4.519E-06	3.416E-06	2.299E-06		

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      76.304      76.331      76.863      77.076      77.156      78.086
78.113      80.453      82.793      89.415
     6.82446     6.82684     6.87441     6.89343     6.90057     6.98382
6.98620     7.19551     7.40482     7.99707

   1.731E-06   1.388E-06   1.159E-06   8.707E-07
      95.798      99.016      99.734     100.000
     8.56791     8.85571     8.91993     8.94372

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.633
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.650
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   4.245
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   5.845
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   6.138

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  7  1      -6.36563 -10.41721  -0.90765
  7  2      -7.91319 -10.91663  -1.08868
  7  3      -8.59088 -13.54659  -2.31975
  7  4      -9.05801 -14.54217  -2.83429
  7  5      -9.65890 -15.72579  -3.52127
  7  6     -10.20486 -19.30825  -5.80617
  7  7     -10.34762     NUMXQ(K)=  7
    5.095E-04              0.089              1.000
    3.745E-04              0.268              3.000
    3.127E-04              0.447              5.000
    2.392E-04              0.894             10.000
    2.023E-04              1.342             15.000
    1.708E-04              1.789             20.000
    1.379E-04              2.236             25.000
    1.148E-04              2.683             30.000
    9.481E-05              3.130             35.000
    7.998E-05              3.577             40.000
    6.860E-05              4.025             45.000
    5.864E-05              4.472             50.000
    4.994E-05              4.919             55.000
    4.301E-05              5.366             60.000
    3.739E-05              5.813             65.000

    2.999E-04              0.5                5.59

ANNUAL AVERAGE =   5.19E-06

K=  7     FIVEXQ(K)= 2.999E-04     FIVEPR(K)= 5.591
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNW SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 10.0 METERS
CA=1292.SQ.METERS

A	1.0	0.62	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	0.73	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	1.56	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	2.13	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	3.02	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	3.53	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	3.63	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	2.77	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	0.30	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
A	22.7	0.05	823.	0.	0.	157.1	310.1	157.1	2.875E-07	2.851E-07	2.851E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.22	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.30	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.22	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	1.05	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	1.10	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.10	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	1.29	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05

C	7.4	0.70	823.	0.	0.	89.7	51.2	89.7
		9.318E-06	8.552E-06	8.552E-06				
C	9.2	0.19	823.	0.	0.	89.7	51.2	89.7
		7.502E-06	6.885E-06	6.885E-06				
C	22.7	0.05	823.	0.	0.	89.7	51.2	89.7
		3.051E-06	2.800E-06	2.800E-06				
D	0.2	0.00	823.	0.	0.	63.2	27.1	124.7
		4.551E-04	7.248E-04	4.551E-04				
D	1.0	0.67	823.	0.	0.	63.2	27.1	124.7
		9.682E-05	1.542E-04	9.682E-05				
D	1.4	0.65	823.	0.	0.	63.2	27.1	124.7
		6.557E-05	1.044E-04	6.557E-05				
D	1.9	0.86	823.	0.	0.	63.2	27.1	124.7
		4.957E-05	7.895E-05	4.957E-05				
D	2.8	2.64	823.	0.	0.	63.2	27.1	100.8
		4.129E-05	5.313E-05	4.129E-05				
D	3.7	3.93	823.	0.	0.	63.2	27.1	84.5
		3.707E-05	4.000E-05	3.707E-05				
D	4.7	5.30	823.	0.	0.	63.2	27.1	73.7
		3.407E-05	3.207E-05	3.207E-05				
D	5.6	3.02	823.	0.	0.	63.2	27.1	66.0
		3.180E-05	2.678E-05	2.678E-05				
D	7.4	2.67	823.	0.	0.	63.2	27.1	63.2
		2.495E-05	2.012E-05	2.012E-05				
D	9.2	1.10	823.	0.	0.	63.2	27.1	63.2
		2.009E-05	1.620E-05	1.620E-05				
D	22.7	0.11	823.	0.	0.	63.2	27.1	63.2
		8.169E-06	6.589E-06	6.589E-06				
E	0.2	0.01	823.	0.	0.	44.9	18.7	132.5
		6.730E-04	1.332E-03	6.730E-04				
E	0.9	1.18	823.	0.	0.	44.9	18.7	132.5
		1.432E-04	2.835E-04	1.432E-04				
E	1.3	0.97	823.	0.	0.	44.9	18.7	132.5
		9.697E-05	1.920E-04	9.697E-05				
E	1.8	1.21	823.	0.	0.	44.9	18.7	132.5
		7.331E-05	1.451E-04	7.331E-05				
E	2.6	3.42	823.	0.	0.	44.9	18.7	102.0
		6.409E-05	9.768E-05	6.409E-05				
E	3.5	4.31	823.	0.	0.	44.9	18.7	77.1
		6.385E-05	7.353E-05	6.385E-05				
E	4.3	4.25	823.	0.	0.	44.9	18.7	62.0
		6.362E-05	5.896E-05	5.896E-05				
E	5.2	2.42	823.	0.	0.	44.9	18.7	52.0
		6.339E-05	4.924E-05	4.924E-05				
E	6.9	1.83	823.	0.	0.	44.9	18.7	44.9
		5.511E-05	3.699E-05	3.699E-05				
E	8.5	0.67	823.	0.	0.	44.9	18.7	44.9
		4.436E-05	2.978E-05	2.978E-05				
E	21.0	0.03	823.	0.	0.	44.9	18.7	44.9
		1.804E-05	1.211E-05	1.211E-05				
F	0.2	0.01	823.	0.	0.	31.0	12.0	121.7
		1.141E-03	2.127E-03	1.141E-03				
F	0.9	1.91	823.	0.	0.	31.0	12.0	121.7
		2.428E-04	4.526E-04	2.428E-04				
F	1.3	1.29	823.	0.	0.	31.0	12.0	121.7
		1.644E-04	3.065E-04	1.644E-04				
F	1.8	1.97	823.	0.	0.	31.0		

12.0	121.7	1.243E-04	2.317E-04	1.243E-04			
F	2.6	3.63	823.	0.		0.	31.0
12.0	87.4	1.165E-04	1.560E-04	1.165E-04			
F	3.5	3.42	823.	0.		0.	31.0
12.0	61.3	1.250E-04	1.174E-04	1.174E-04			
F	4.3	2.29	823.	0.		0.	31.0
12.0	46.6	1.319E-04	9.413E-05	9.413E-05			
F	5.2	0.51	823.	0.		0.	31.0
12.0	37.3	1.376E-04	7.862E-05	7.862E-05			
F	6.9	0.27	823.	0.		0.	31.0
12.0	31.0	1.243E-04	5.906E-05	5.906E-05			
G	0.2	0.01	823.	0.		0.	21.4
7.7	125.7	1.720E-03	3.367E-03	1.720E-03			
G	0.9	3.96	823.	0.		0.	21.4
7.7	125.7	3.659E-04	7.163E-04	3.659E-04			
G	1.3	4.50	823.	0.		0.	21.4
7.7	125.7	2.478E-04	4.851E-04	2.478E-04			
G	1.8	3.69	823.	0.		0.	21.4
7.7	125.7	1.873E-04	3.667E-04	1.873E-04			
G	2.6	4.31	823.	0.		0.	21.4
7.7	81.9	1.935E-04	2.468E-04	1.935E-04			
G	3.5	1.70	823.	0.		0.	21.4
7.7	51.7	2.306E-04	1.858E-04	1.858E-04			
G	4.3	0.32	823.	0.		0.	21.4
7.7	36.2	2.639E-04	1.490E-04	1.490E-04			
G	5.2	0.16	823.	0.		0.	21.4
7.7	27.2	2.942E-04	1.244E-04	1.244E-04			
G	6.9	0.19	823.	0.		0.	21.4
7.7	21.4	2.804E-04	9.346E-05	9.346E-05			
G	8.5	0.03	823.	0.		0.	21.4
7.7	21.4	2.258E-04	7.525E-05	7.525E-05			
G	21.0	0.03	823.	0.		0.	21.4
7.7	21.4	9.182E-05	3.061E-05	3.061E-05			

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NNW SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03	1.141E-03	6.730E-04	4.551E-04	3.659E-04	3.080E-04	2.478E-04	2.428E-04	1.935E-04	1.873E-04
0.006	0.014	0.022	0.023	3.981	3.983	8.479	10.391	14.699	18.388
0.00049	0.00127	0.00192	0.00205	0.35169	0.35180	0.74901	0.91789	1.29845	1.62431

1.858E-04	1.644E-04	1.490E-04	1.432E-04	1.244E-04	1.243E-04	1.174E-04	1.165E-04	9.697E-05	9.682E-05
20.084	21.377	21.700	22.884	23.046	25.012	28.431	32.066	33.035	33.709
1.77415	1.88832	1.91687	2.02152	2.03579	2.20942	2.51149	2.83259	2.91822	2.97768

9.413E-05	9.346E-05	7.862E-05	7.525E-05	7.331E-05	6.557E-05	6.554E-05	6.409E-05	6.385E-05	5.906E-05
35.997	36.186	36.697	36.724	37.936	38.582	38.798	42.217	46.525	46.795
3.17986	3.19651	3.24170	3.24408	3.35111	3.40820	3.42722	3.72930	4.10986	4.13364

5.896E-05	4.957E-05	4.924E-05	4.439E-05	4.129E-05	3.707E-05	3.699E-05	3.356E-05	3.207E-05	3.061E-05
51.049	51.910	54.334	54.630	57.269	61.200	63.031	63.246	68.551	68.578
4.50945	4.58556	4.79963	4.82579	5.05889	5.40615	5.56789	5.58692	6.05549	6.05786

2.978E-05	2.678E-05	2.258E-05	2.012E-05	1.700E-05	1.620E-05	1.363E-05	1.211E-05	1.138E-05	8.552E-06

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      69.251       72.266       73.317       75.982       77.086       78.190
79.294       79.321       80.613       81.313
     6.11733      6.38372      6.47648      6.71196      6.80948      6.90700
7.00451      7.00689      7.12106      7.18290

   6.885E-06    6.673E-06    6.589E-06    4.519E-06    3.416E-06    2.800E-06
2.299E-06    1.731E-06    1.388E-06    1.159E-06
      81.502       82.121       82.229       82.956       84.518       84.572
86.699       89.714       93.242       96.877
     7.19955      7.25426      7.26377      7.32799      7.46595      7.47070
7.65861      7.92500      8.23659      8.55769

   8.707E-07    7.010E-07    2.851E-07
      99.650       99.946      100.000
     8.80267      8.82884      8.83359

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q       WITH RESPECT TO      WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME       INTO THIS SECTOR ONLY

                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.772
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.830
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.194
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.506
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   6.052
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   6.380

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  8  1      -6.36563 -10.32966  -0.89644
  8  2      -7.91319 -10.99702  -1.14401
  8  3      -8.59088 -13.58234  -2.37322
  8  4      -9.05801 -16.91991  -4.12393
  8  5      -9.27794 -14.67191  -2.91081
  8  6      -9.73874 -16.88886  -4.21892
  8  7     -10.34762 -20.76447  -6.71858
  8  8     -10.52773     NUMXQ(K)=  8
    5.387E-04              0.088              1.000
    3.977E-04              0.265              3.000
    3.351E-04              0.442              5.000
    2.529E-04              0.883             10.000
    2.122E-04              1.325             15.000
    1.862E-04              1.767             20.000
    1.499E-04              2.208             25.000
    1.247E-04              2.650             30.000
    9.935E-05              3.092             35.000
    8.197E-05              3.533             40.000
    7.004E-05              3.975             45.000
    6.067E-05              4.417             50.000
    5.072E-05              4.858             55.000
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4.242E-05	5.300	60.000
3.589E-05	5.742	65.000
2.987E-05	6.184	70.000
3.192E-04	0.5	5.66

ANNUAL AVERAGE = 4.94E-06

K= 8 FIVEXQ(K)= 3.192E-04 FIVEPR(K)= 5.660

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE N SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.0	1.37	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	1.47	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	0.88	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	1.91	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	3.14	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	3.77	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	2.45	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	2.16	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.34	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.29	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.25	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	0.78	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	1.08	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.52	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.88	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
C	7.4	0.34	823.	0.	0.	89.7	51.2	89.7	9.318E-06	8.552E-06	8.552E-06
D	0.2	0.00	823.	0.	0.	63.2					

AT 10.0 METERS
CA=1292.SQ.METERS

27.1	124.7	4.551E-04	7.248E-04	4.551E-04		
D	1.0	0.78	823.	0.	0.	63.2
27.1	124.7	9.682E-05	1.542E-04	9.682E-05		
D	1.4	0.88	823.	0.	0.	63.2
27.1	124.7	6.557E-05	1.044E-04	6.557E-05		
D	1.9	1.13	823.	0.	0.	63.2
27.1	124.7	4.957E-05	7.895E-05	4.957E-05		
D	2.8	3.63	823.	0.	0.	63.2
27.1	100.8	4.129E-05	5.313E-05	4.129E-05		
D	3.7	3.68	823.	0.	0.	63.2
27.1	84.5	3.707E-05	4.000E-05	3.707E-05		
D	4.7	2.94	823.	0.	0.	63.2
27.1	73.7	3.407E-05	3.207E-05	3.207E-05		
D	5.6	2.30	823.	0.	0.	63.2
27.1	66.0	3.180E-05	2.678E-05	2.678E-05		
D	7.4	1.13	823.	0.	0.	63.2
27.1	63.2	2.495E-05	2.012E-05	2.012E-05		
D	9.2	0.05	823.	0.	0.	63.2
27.1	63.2	2.009E-05	1.620E-05	1.620E-05		
E	0.2	0.01	823.	0.	0.	44.9
18.7	132.5	6.730E-04	1.332E-03	6.730E-04		
E	0.9	1.32	823.	0.	0.	44.9
18.7	132.5	1.432E-04	2.835E-04	1.432E-04		
E	1.3	0.49	823.	0.	0.	44.9
18.7	132.5	9.697E-05	1.920E-04	9.697E-05		
E	1.8	2.35	823.	0.	0.	44.9
18.7	132.5	7.331E-05	1.451E-04	7.331E-05		
E	2.6	4.27	823.	0.	0.	44.9
18.7	102.0	6.409E-05	9.768E-05	6.409E-05		
E	3.5	3.53	823.	0.	0.	44.9
18.7	77.1	6.385E-05	7.353E-05	6.385E-05		
E	4.3	1.96	823.	0.	0.	44.9
18.7	62.0	6.362E-05	5.896E-05	5.896E-05		
E	5.2	0.64	823.	0.	0.	44.9
18.7	52.0	6.339E-05	4.924E-05	4.924E-05		
E	6.9	0.44	823.	0.	0.	44.9
18.7	44.9	5.511E-05	3.699E-05	3.699E-05		
E	8.5	0.29	823.	0.	0.	44.9
18.7	44.9	4.436E-05	2.978E-05	2.978E-05		
F	0.2	0.01	823.	0.	0.	31.0
12.0	121.7	1.141E-03	2.127E-03	1.141E-03		
F	0.9	2.60	823.	0.	0.	31.0
12.0	121.7	2.428E-04	4.526E-04	2.428E-04		
F	1.3	2.26	823.	0.	0.	31.0
12.0	121.7	1.644E-04	3.065E-04	1.644E-04		
F	1.8	2.16	823.	0.	0.	31.0
12.0	121.7	1.243E-04	2.317E-04	1.243E-04		
F	2.6	3.58	823.	0.	0.	31.0
12.0	87.4	1.165E-04	1.560E-04	1.165E-04		
F	3.5	2.16	823.	0.	0.	31.0
12.0	61.3	1.250E-04	1.174E-04	1.174E-04		
F	4.3	1.27	823.	0.	0.	31.0
12.0	46.6	1.319E-04	9.413E-05	9.413E-05		
F	5.2	0.44	823.	0.	0.	31.0
12.0	37.3	1.376E-04	7.862E-05	7.862E-05		
F	6.9	0.15	823.	0.	0.	31.0
12.0	31.0	1.243E-04	5.906E-05	5.906E-05		

G		0.2	0.01	823.	0.	0.	21.4		
7.7	125.7	1.720E-03	3.367E-03	1.720E-03					
G		0.9	8.78	823.	0.	0.	21.4		
7.7	125.7	3.659E-04	7.163E-04	3.659E-04					
G		1.3	8.73	823.	0.	0.	21.4		
7.7	125.7	2.478E-04	4.851E-04	2.478E-04					
G		1.8	5.93	823.	0.	0.	21.4		
7.7	125.7	1.873E-04	3.667E-04	1.873E-04					
G		2.6	5.00	823.	0.	0.	21.4		
7.7	81.9	1.935E-04	2.468E-04	1.935E-04					
G		3.5	1.42	823.	0.	0.	21.4		
7.7	51.7	2.306E-04	1.858E-04	1.858E-04					
G		4.3	0.59	823.	0.	0.	21.4		
7.7	36.2	2.639E-04	1.490E-04	1.490E-04					
G		5.2	0.20	823.	0.	0.	21.4		
7.7	27.2	2.942E-04	1.244E-04	1.244E-04					
G		6.9	0.15	823.	0.	0.	21.4		
7.7	21.4	2.804E-04	9.346E-05	9.346E-05					
G		8.5	0.10	823.	0.	0.	21.4		
7.7	21.4	2.258E-04	7.525E-05	7.525E-05					

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

N SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.012 0.024 0.033 0.034 8.810 8.812 17.538 20.137 25.137 31.070
0.00060 0.00118 0.00158 0.00166 0.42741 0.42751 0.85089 0.97695 1.21956 1.50736

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.244E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05
32.491 34.747 35.335 36.659 36.855 39.012 41.169 44.748 45.238 46.022
1.57634 1.68575 1.71429 1.77851 1.78802 1.89268 1.99733 2.17096 2.19475 2.23281

9.413E-05 9.346E-05 7.862E-05 7.525E-05 7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.906E-05
47.297 47.444 47.885 47.984 50.337 51.219 51.562 55.828 59.358 59.505
2.29465 2.30178 2.32319 2.32795 2.44212 2.48493 2.50158 2.70851 2.87976 2.88690

5.896E-05 4.957E-05 4.924E-05 4.439E-05 4.129E-05 3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.978E-05
61.466 62.593 63.231 63.525 67.153 70.830 71.271 71.516 74.458 74.752
2.98204 3.03674 3.06767 3.08194 3.25795 3.43634 3.45774 3.46964 3.61235 3.62662

2.678E-05 2.258E-05 2.012E-05 1.700E-05 1.620E-05 1.363E-05 1.138E-05 8.552E-06 6.673E-06 4.519E-06

```
      77.056      77.840      78.968      80.046      80.095      81.615
82.498      82.841      84.214      85.684
     3.73841     3.77646     3.83117     3.88350     3.88588     3.95961
4.00242     4.01907     4.08567     4.15703

   3.416E-06   2.299E-06   1.731E-06   1.388E-06   1.159E-06   8.707E-07
      86.567      88.479      91.617      95.392      97.843     100.000
     4.19984     4.29260     4.44483     4.62797     4.74690     4.85155

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.976
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.575
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.169
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.299
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.877
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.979

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
  9  1      -6.36563 -10.23998  -0.88471
  9  2      -7.91319 -11.57664  -1.39294
  9  3      -8.32339 -11.70546  -1.44810
  9  4      -8.59088 -16.27722  -3.57370
  9  5      -9.05801 -27.12543  -8.94387
  9  6      -9.27794 -17.17094  -3.95540
  9  7      -9.65890 -19.55072  -5.20845
  9  8      -9.73874     NUMXQ(K)=  8
    6.614E-04              0.049              1.000
    4.975E-04              0.146              3.000
    4.317E-04              0.243              5.000
    3.444E-04              0.485             10.000
    2.823E-04              0.728             15.000
    2.436E-04              0.970             20.000
    2.156E-04              1.213             25.000
    1.945E-04              1.455             30.000
    1.670E-04              1.698             35.000
    1.375E-04              1.941             40.000
    1.140E-04              2.183             45.000
    8.559E-05              2.426             50.000
    7.281E-05              2.668             55.000
    6.230E-05              2.911             60.000

    3.395E-04              0.5               10.31

ANNUAL AVERAGE =   4.08E-06

K=  9     FIVEXQ(K)= 3.395E-04     FIVEPR(K)=10.306
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NNE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 10.0 METERS
CA=1292.SQ.METERS

A	1.0	1.77	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	1.46	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	0.83	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	1.56	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	2.30	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	1.98	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.94	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	0.73	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	0.10	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.31	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.10	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.10	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	1.46	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	0.94	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.04	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.21	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
C	7.4	0.31	823.	0.	0.	89.7	51.2	89.7	9.318E-06	8.552E-06	8.552E-06

C	9.2	0.10	823.	0.	0.	89.7	51.2	89.7	7.502E-06	6.885E-06	6.885E-06
D	0.2	0.00	823.	0.	0.	63.2	27.1	124.7	4.551E-04	7.248E-04	4.551E-04
D	1.0	0.94	823.	0.	0.	63.2	27.1	124.7	9.682E-05	1.542E-04	9.682E-05
D	1.4	0.83	823.	0.	0.	63.2	27.1	124.7	6.557E-05	1.044E-04	6.557E-05
D	1.9	1.77	823.	0.	0.	63.2	27.1	124.7	4.957E-05	7.895E-05	4.957E-05
D	2.8	4.07	823.	0.	0.	63.2	27.1	100.8	4.129E-05	5.313E-05	4.129E-05
D	3.7	4.07	823.	0.	0.	63.2	27.1	84.5	3.707E-05	4.000E-05	3.707E-05
D	4.7	1.77	823.	0.	0.	63.2	27.1	73.7	3.407E-05	3.207E-05	3.207E-05
D	5.6	1.56	823.	0.	0.	63.2	27.1	66.0	3.180E-05	2.678E-05	2.678E-05
D	7.4	0.73	823.	0.	0.	63.2	27.1	63.2	2.495E-05	2.012E-05	2.012E-05
E	0.2	0.02	823.	0.	0.	44.9	18.7	132.5	6.730E-04	1.332E-03	6.730E-04
E	0.9	2.82	823.	0.	0.	44.9	18.7	132.5	1.432E-04	2.835E-04	1.432E-04
E	1.3	1.88	823.	0.	0.	44.9	18.7	132.5	9.697E-05	1.920E-04	9.697E-05
E	1.8	3.13	823.	0.	0.	44.9	18.7	132.5	7.331E-05	1.451E-04	7.331E-05
E	2.6	1.67	823.	0.	0.	44.9	18.7	102.0	6.409E-05	9.768E-05	6.409E-05
E	3.5	2.40	823.	0.	0.	44.9	18.7	77.1	6.385E-05	7.353E-05	6.385E-05
E	4.3	0.42	823.	0.	0.	44.9	18.7	62.0	6.362E-05	5.896E-05	5.896E-05
E	5.2	0.21	823.	0.	0.	44.9	18.7	52.0	6.339E-05	4.924E-05	4.924E-05
E	6.9	0.10	823.	0.	0.	44.9	18.7	44.9	5.511E-05	3.699E-05	3.699E-05
F	0.2	0.01	823.	0.	0.	31.0	12.0	121.7	1.141E-03	2.127E-03	1.141E-03
F	0.9	2.19	823.	0.	0.	31.0	12.0	121.7	2.428E-04	4.526E-04	2.428E-04
F	1.3	3.13	823.	0.	0.	31.0	12.0	121.7	1.644E-04	3.065E-04	1.644E-04
F	1.8	2.19	823.	0.	0.	31.0	12.0	121.7	1.243E-04	2.317E-04	1.243E-04
F	2.6	1.77	823.	0.	0.	31.0	12.0	87.4	1.165E-04	1.560E-04	1.165E-04
F	3.5	1.56	823.	0.	0.	31.0	12.0	61.3	1.250E-04	1.174E-04	1.174E-04
F	4.3	0.52	823.	0.	0.	31.0	12.0	46.6	1.319E-04	9.413E-05	9.413E-05
G	0.2	0.02	823.	0.	0.	21.4	7.7	125.7	1.720E-03	3.367E-03	1.720E-03
G	0.9	13.25	823.	0.	0.	21.4	7.7	125.7	3.659E-04	7.163E-04	3.659E-04

```
   G          1.3       15.23       823.        0.          0.         21.4
7.7    125.7       2.478E-04   4.851E-04   2.478E-04
   G          1.8        8.56       823.        0.          0.         21.4
7.7    125.7       1.873E-04   3.667E-04   1.873E-04
   G          2.6        5.53       823.        0.          0.         21.4
7.7     81.9       1.935E-04   2.468E-04   1.935E-04
   G          3.5        1.04       823.        0.          0.         21.4
7.7     51.7       2.306E-04   1.858E-04   1.858E-04
   G          4.3        0.31       823.        0.          0.         21.4
7.7     36.2       2.639E-04   1.490E-04   1.490E-04
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NNE SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.019 0.029 0.046 0.048 13.298 13.300 28.533 30.724 36.253 44.808
0.00042 0.00065 0.00105 0.00110 0.30317 0.30321 0.65048 0.70042 0.82649 1.02152

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05 9.413E-05
45.852 48.982 49.295 52.112 54.303 55.868 57.641 59.519 60.458 60.980
1.04531 1.11667 1.12380 1.18802 1.23797 1.27365 1.31408 1.35690 1.37830 1.39019

7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.896E-05 4.957E-05 4.924E-05 4.439E-05 4.129E-05
64.110 64.944 65.257 66.927 69.326 69.744 71.517 71.726 71.830 75.899
1.46155 1.48058 1.48771 1.52577 1.58048 1.58999 1.63042 1.63518 1.63756 1.73032

3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.678E-05 2.258E-05 2.012E-05 1.700E-05 1.363E-05 1.138E-05
79.968 80.073 80.177 81.951 83.516 84.976 85.707 86.646 87.689 87.898
1.82308 1.82546 1.82784 1.86828 1.90395 1.93725 1.95390 1.97531 1.99910 2.00385

8.552E-06 6.885E-06 6.673E-06 4.519E-06 3.416E-06 2.299E-06 1.731E-06 1.388E-06 1.159E-06 8.707E-07

```
     88.211      88.315      90.089      91.549      92.384      93.949
96.244      98.226      99.165      99.896
    2.01099     2.01337     2.05380     2.08710     2.10613     2.14181
2.19413     2.23933     2.26073     2.27738

   7.010E-07
     100.000
     2.27976

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q       WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   0.700
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.044
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.115
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.313
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   1.579
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   1.823
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   1.866

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 10  1      -6.36563 -10.39901  -0.90568
 10  2      -7.91319 -11.83290  -1.42810
 10  3      -8.32339 -12.78431  -1.81525
 10  4      -8.59088 -19.87746  -4.88573
 10  5      -8.71313 -21.29750  -5.50716
 10  6      -9.05801 -27.42469  -8.26409
 10  7      -9.65890 -29.85804  -9.39601
 10  8     -10.20486 -41.76177 -15.08708
 10  9     -10.34762     NUMXQ(K)=  9
    7.288E-04              0.023              1.000
    5.534E-04              0.068              3.000
    4.830E-04              0.114              5.000
    3.978E-04              0.228             10.000
    3.457E-04              0.342             15.000
    3.010E-04              0.456             20.000
    2.695E-04              0.570             25.000
    2.458E-04              0.684             30.000
    2.228E-04              0.798             35.000
    2.038E-04              0.912             40.000
    1.882E-04              1.026             45.000
    1.575E-04              1.140             50.000
    1.287E-04              1.254             55.000
    1.023E-04              1.368             60.000
    7.890E-05              1.482             65.000
    6.158E-05              1.596             70.000
    4.747E-05              1.710             75.000
```

3.712E-05	1.824	80.000
2.876E-04	0.5	21.93

ANNUAL AVERAGE = 2.60E-06

K= 10 FIVEXQ(K)= 2.876E-04 FIVEPR(K)=21.932

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE NE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 10.0 METERS
CA=1292.SQ.METERS

A	1.0	1.08	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	1.16	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	0.31	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	0.69	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	1.00	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	1.78	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.08	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.23	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.15	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.23	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	0.77	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	1.47	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.78	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.46	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
C	7.4	0.23	823.	0.	0.	89.7	51.2	89.7	9.318E-06	8.552E-06	8.552E-06
D	0.2	0.00	823.	0.	0.	63.2	27.1	124.7	4.551E-04	7.248E-04	4.551E-04
D	1.0	1.16	823.	0.	0.	63.2					

27.1	124.7	9.682E-05	1.542E-04	9.682E-05		
D	1.4	0.77	823.	0.	0.	63.2
27.1	124.7	6.557E-05	1.044E-04	6.557E-05		
D	1.9	1.31	823.	0.	0.	63.2
27.1	124.7	4.957E-05	7.895E-05	4.957E-05		
D	2.8	2.86	823.	0.	0.	63.2
27.1	100.8	4.129E-05	5.313E-05	4.129E-05		
D	3.7	3.01	823.	0.	0.	63.2
27.1	84.5	3.707E-05	4.000E-05	3.707E-05		
D	4.7	2.78	823.	0.	0.	63.2
27.1	73.7	3.407E-05	3.207E-05	3.207E-05		
D	5.6	1.70	823.	0.	0.	63.2
27.1	66.0	3.180E-05	2.678E-05	2.678E-05		
D	7.4	0.39	823.	0.	0.	63.2
27.1	63.2	2.495E-05	2.012E-05	2.012E-05		
E	0.2	0.01	823.	0.	0.	44.9
18.7	132.5	6.730E-04	1.332E-03	6.730E-04		
E	0.9	2.08	823.	0.	0.	44.9
18.7	132.5	1.432E-04	2.835E-04	1.432E-04		
E	1.3	2.62	823.	0.	0.	44.9
18.7	132.5	9.697E-05	1.920E-04	9.697E-05		
E	1.8	2.70	823.	0.	0.	44.9
18.7	132.5	7.331E-05	1.451E-04	7.331E-05		
E	2.6	3.32	823.	0.	0.	44.9
18.7	102.0	6.409E-05	9.768E-05	6.409E-05		
E	3.5	1.78	823.	0.	0.	44.9
18.7	77.1	6.385E-05	7.353E-05	6.385E-05		
E	4.3	1.39	823.	0.	0.	44.9
18.7	62.0	6.362E-05	5.896E-05	5.896E-05		
E	5.2	0.23	823.	0.	0.	44.9
18.7	52.0	6.339E-05	4.924E-05	4.924E-05		
E	6.9	0.08	823.	0.	0.	44.9
18.7	44.9	5.511E-05	3.699E-05	3.699E-05		
F	0.2	0.01	823.	0.	0.	31.0
12.0	121.7	1.141E-03	2.127E-03	1.141E-03		
F	0.9	2.55	823.	0.	0.	31.0
12.0	121.7	2.428E-04	4.526E-04	2.428E-04		
F	1.3	3.24	823.	0.	0.	31.0
12.0	121.7	1.644E-04	3.065E-04	1.644E-04		
F	1.8	2.16	823.	0.	0.	31.0
12.0	121.7	1.243E-04	2.317E-04	1.243E-04		
F	2.6	1.62	823.	0.	0.	31.0
12.0	87.4	1.165E-04	1.560E-04	1.165E-04		
F	3.5	0.62	823.	0.	0.	31.0
12.0	61.3	1.250E-04	1.174E-04	1.174E-04		
G	0.2	0.02	823.	0.	0.	21.4
7.7	125.7	1.720E-03	3.367E-03	1.720E-03		
G	0.9	17.06	823.	0.	0.	21.4
7.7	125.7	3.659E-04	7.163E-04	3.659E-04		
G	1.3	17.21	823.	0.	0.	21.4
7.7	125.7	2.478E-04	4.851E-04	2.478E-04		
G	1.8	9.42	823.	0.	0.	21.4
7.7	125.7	1.873E-04	3.667E-04	1.873E-04		
G	2.6	6.02	823.	0.	0.	21.4
7.7	81.9	1.935E-04	2.468E-04	1.935E-04		
G	3.5	0.46	823.	0.	0.	21.4
7.7	51.7	2.306E-04	1.858E-04	1.858E-04		

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

NE SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03	1.141E-03	6.730E-04	4.551E-04	3.659E-04	3.080E-04	2.478E-04	2.428E-04	1.935E-04	1.873E-04		
0.024	0.036	0.049	0.051	17.108	17.109	34.320	36.867	42.887	52.303		
0.00073	0.00110	0.00150	0.00157	0.52723	0.52727	1.05768	1.13617	1.32169	1.61187		
1.858E-04	1.644E-04	1.432E-04	1.243E-04	1.174E-04	1.165E-04	9.697E-05	9.682E-05	7.331E-05	6.557E-05		
52.766	56.008	58.091	60.253	60.870	62.491	65.115	66.273	68.974	69.746		
1.62614	1.72604	1.79026	1.85686	1.87589	1.92584	2.00671	2.04238	2.12563	2.14942		
6.554E-05	6.409E-05	6.385E-05	5.896E-05	4.957E-05	4.924E-05	4.439E-05	4.129E-05	3.707E-05	3.699E-05		
69.977	73.296	75.071	76.460	77.772	78.004	78.158	81.014	84.024	84.101		
2.15655	2.25883	2.31353	2.35635	2.39678	2.40392	2.40867	2.49668	2.58944	2.59182		
3.356E-05	3.207E-05	2.678E-05	2.258E-05	2.012E-05	1.700E-05	1.363E-05	1.138E-05	8.552E-06	6.673E-06		
84.333	87.111	88.809	89.581	89.967	91.433	93.208	93.671	93.903	94.983		
2.59896	2.68458	2.73691	2.76069	2.77259	2.81778	2.87249	2.88676	2.89389	2.92719		
4.519E-06	3.416E-06	2.299E-06	1.731E-06	1.388E-06	1.159E-06						
96.141	96.450	97.144	98.148	99.923	100.000						

2.96287 2.97238 2.99379 3.02471 3.07942 3.08179

X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED

CHI/Q SEC/CUBIC METER	WITH RESPECT TO THE TOTAL TIME	WHEN THE WIND BLOWS INTO THIS SECTOR ONLY

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                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.135
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   1.610
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   1.624
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   1.724
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   2.040
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   2.311
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   2.354
                                                                    HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE(10)=   2.682
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K	I	XQSAVE(K,I)	XQINT(K,I)	XQSLOP(K,I)
11	1	-6.36563	-10.14299	-0.87175
11	2	-7.91319	-11.66909	-1.46838
11	3	-8.32339	-12.64797	-1.89800
11	4	-8.58265	-13.57598	-2.33126
11	5	-8.59088	-19.48763	-5.09582
11	6	-8.71313	-24.97118	-7.68928
11	7	-9.24266	-25.56524	-7.97971
11	8	-9.65890	-30.17043	-10.28998
11	9	-9.73874	-31.38650	-10.90242
11	10	-10.34762	NUMXQ(K)= 10	

7.789E-04	0.031	1.000
5.940E-04	0.092	3.000
5.194E-04	0.154	5.000
4.286E-04	0.308	10.000
3.807E-04	0.462	15.000
3.376E-04	0.616	20.000
3.002E-04	0.770	25.000
2.721E-04	0.925	30.000
2.499E-04	1.079	35.000
2.288E-04	1.233	40.000
2.097E-04	1.387	45.000
1.938E-04	1.541	50.000
1.707E-04	1.695	55.000
1.326E-04	1.849	60.000
1.030E-04	2.003	65.000
8.073E-05	2.157	70.000
6.406E-05	2.311	75.000
4.780E-05	2.465	80.000
3.600E-05	2.620	85.000
3.718E-04	0.5	16.22

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ANNUAL AVERAGE =   4.03E-06

K= 11     FIVEXQ(K)= 3.718E-04     FIVEPR(K)=16.224
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ENE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 10.0 METERS
CA=1292.SQ.METERS

A	1.0	1.51	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	0.48	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	2.8	0.54	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	0.73	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	1.21	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.24	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	0.06	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.36	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.24	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.24	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	0.54	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	0.73	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.03	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.30	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
C	7.4	0.24	823.	0.	0.	89.7	51.2	89.7	9.318E-06	8.552E-06	8.552E-06
C	9.2	0.06	823.	0.	0.	89.7	51.2	89.7	7.502E-06	6.885E-06	6.885E-06
D	0.2	0.00	823.	0.	0.	63.2					

27.1	124.7	4.551E-04	7.248E-04	4.551E-04		
D	1.0	0.79	823.	0.	0.	63.2
27.1	124.7	9.682E-05	1.542E-04	9.682E-05		
D	1.4	0.91	823.	0.	0.	63.2
27.1	124.7	6.557E-05	1.044E-04	6.557E-05		
D	1.9	1.15	823.	0.	0.	63.2
27.1	124.7	4.957E-05	7.895E-05	4.957E-05		
D	2.8	2.91	823.	0.	0.	63.2
27.1	100.8	4.129E-05	5.313E-05	4.129E-05		
D	3.7	4.24	823.	0.	0.	63.2
27.1	84.5	3.707E-05	4.000E-05	3.707E-05		
D	4.7	1.63	823.	0.	0.	63.2
27.1	73.7	3.407E-05	3.207E-05	3.207E-05		
D	5.6	0.61	823.	0.	0.	63.2
27.1	66.0	3.180E-05	2.678E-05	2.678E-05		
D	7.4	0.36	823.	0.	0.	63.2
27.1	63.2	2.495E-05	2.012E-05	2.012E-05		
E	0.2	0.01	823.	0.	0.	44.9
18.7	132.5	6.730E-04	1.332E-03	6.730E-04		
E	0.9	1.76	823.	0.	0.	44.9
18.7	132.5	1.432E-04	2.835E-04	1.432E-04		
E	1.3	1.21	823.	0.	0.	44.9
18.7	132.5	9.697E-05	1.920E-04	9.697E-05		
E	1.8	1.51	823.	0.	0.	44.9
18.7	132.5	7.331E-05	1.451E-04	7.331E-05		
E	2.6	3.21	823.	0.	0.	44.9
18.7	102.0	6.409E-05	9.768E-05	6.409E-05		
E	3.5	1.82	823.	0.	0.	44.9
18.7	77.1	6.385E-05	7.353E-05	6.385E-05		
E	4.3	0.36	823.	0.	0.	44.9
18.7	62.0	6.362E-05	5.896E-05	5.896E-05		
E	5.2	0.06	823.	0.	0.	44.9
18.7	52.0	6.339E-05	4.924E-05	4.924E-05		
E	6.9	0.06	823.	0.	0.	44.9
18.7	44.9	5.511E-05	3.699E-05	3.699E-05		
F	0.2	0.01	823.	0.	0.	31.0
12.0	121.7	1.141E-03	2.127E-03	1.141E-03		
F	0.9	1.70	823.	0.	0.	31.0
12.0	121.7	2.428E-04	4.526E-04	2.428E-04		
F	1.3	3.63	823.	0.	0.	31.0
12.0	121.7	1.644E-04	3.065E-04	1.644E-04		
F	1.8	2.48	823.	0.	0.	31.0
12.0	121.7	1.243E-04	2.317E-04	1.243E-04		
F	2.6	2.00	823.	0.	0.	31.0
12.0	87.4	1.165E-04	1.560E-04	1.165E-04		
F	3.5	0.91	823.	0.	0.	31.0
12.0	61.3	1.250E-04	1.174E-04	1.174E-04		
F	4.3	0.24	823.	0.	0.	31.0
12.0	46.6	1.319E-04	9.413E-05	9.413E-05		
G	0.2	0.02	823.	0.	0.	21.4
7.7	125.7	1.720E-03	3.367E-03	1.720E-03		
G	0.9	17.56	823.	0.	0.	21.4
7.7	125.7	3.659E-04	7.163E-04	3.659E-04		
G	1.3	18.40	823.	0.	0.	21.4
7.7	125.7	2.478E-04	4.851E-04	2.478E-04		
G	1.8	13.20	823.	0.	0.	21.4
7.7	125.7	1.873E-04	3.667E-04	1.873E-04		

G	2.6	7.57	823.	0.	0.	21.4	7.7	81.9	1.935E-04	2.468E-04	1.935E-04
G	3.5	0.97	823.	0.	0.	21.4	7.7	51.7	2.306E-04	1.858E-04	1.858E-04
G	4.3	0.06	823.	0.	0.	21.4	7.7	36.2	2.639E-04	1.490E-04	1.490E-04
G	5.2	0.12	823.	0.	0.	21.4	7.7	27.2	2.942E-04	1.244E-04	1.244E-04

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

ENE SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.025 0.032 0.043 0.045 17.602 17.604 36.008 37.704 45.271 58.469
0.00096 0.00127 0.00170 0.00177 0.69154 0.69162 1.41469 1.48129 1.77860 2.29712

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.244E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05
59.438 63.070 63.131 64.886 65.007 67.490 68.398 70.396 71.606 72.393
2.33518 2.47789 2.48027 2.54924 2.55400 2.65152 2.68720 2.76569 2.81326 2.84418

9.413E-05 7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.896E-05 4.957E-05 4.924E-05 4.439E-05
72.636 74.149 75.057 75.420 78.629 80.445 80.809 81.959 82.019 82.262
2.85369 2.91316 2.94883 2.96310 3.08917 3.16052 3.17479 3.21998 3.22236 3.23188

4.129E-05 3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.678E-05 2.258E-05 2.012E-05 1.700E-05 1.363E-05
85.168 89.405 89.466 89.708 91.343 91.948 92.493 92.856 93.583 94.612
3.34605 3.51254 3.51492 3.52443 3.58865 3.61244 3.63385 3.64812 3.67666 3.71709

1.138E-05 8.552E-06 6.885E-06 6.673E-06 4.519E-06 2.299E-06 1.731E-06 1.388E-06 1.159E-06 8.707E-07

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      94.915      95.157      95.217      96.731      97.215      97.760
98.486      99.697      99.939     100.000
     3.72899     3.73850     3.74088     3.80034     3.81937     3.84078
3.86932     3.91689     3.92640     3.92878

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.480
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.333
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   2.475
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   2.763
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   3.158
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   3.512

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 12  1      -6.36563 -10.01724  -0.85459
 12  2      -7.91319 -11.43765  -1.43151
 12  3      -8.32339 -11.45053  -1.43743
 12  4      -8.59088 -18.23416  -4.84730
 12  5      -8.71313 -23.01519  -7.28139
 12  6      -9.05801 -28.67795 -10.23562
 12  7      -9.65890 -30.91095 -11.43738
 12  8     -10.20486     NUMXQ(K)=  8
    7.868E-04              0.039              1.000
    6.003E-04              0.118              3.000
    5.248E-04              0.196              5.000
    4.328E-04              0.393             10.000
    3.841E-04              0.589             15.000
    3.425E-04              0.786             20.000
    3.044E-04              0.982             25.000
    2.757E-04              1.179             30.000
    2.532E-04              1.375             35.000
    2.347E-04              1.572             40.000
    2.193E-04              1.768             45.000
    2.061E-04              1.964             50.000
    1.947E-04              2.161             55.000
    1.822E-04              2.357             60.000
    1.497E-04              2.554             65.000
    1.186E-04              2.750             70.000
    8.770E-05              2.947             75.000
    6.549E-05              3.143             80.000
    4.818E-05              3.339             85.000

    4.034E-04              0.5               12.73

ANNUAL AVERAGE =   5.37E-06
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K= 12      FIVEXQ(K)= 4.034E-04      FIVEPR(K)=12.727
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USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE E SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
											AT 10.0 METERS
CA=1292.SQ.METERS											
A	1.0	0.60	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	0.63	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	0.30	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	0.46	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	0.63	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	0.89	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.69	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	0.73	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.23	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.10	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.07	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	0.43	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	0.86	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.06	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.66	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05
C	7.4	0.53	823.	0.	0.	89.7	51.2	89.7	9.318E-06	8.552E-06	8.552E-06
C	9.2	0.03	823.	0.	0.	89.7	51.2	89.7	7.502E-06	6.885E-06	6.885E-06

D	0.2	0.00	823.	0.	0.	63.2	
27.1	124.7	4.551E-04	7.248E-04	4.551E-04			
D	1.0	0.56	823.	0.	0.	63.2	
27.1	124.7	9.682E-05	1.542E-04	9.682E-05			
D	1.4	0.53	823.	0.	0.	63.2	
27.1	124.7	6.557E-05	1.044E-04	6.557E-05			
D	1.9	0.53	823.	0.	0.	63.2	
27.1	124.7	4.957E-05	7.895E-05	4.957E-05			
D	2.8	2.22	823.	0.	0.	63.2	
27.1	100.8	4.129E-05	5.313E-05	4.129E-05			
D	3.7	3.14	823.	0.	0.	63.2	
27.1	84.5	3.707E-05	4.000E-05	3.707E-05			
D	4.7	2.88	823.	0.	0.	63.2	
27.1	73.7	3.407E-05	3.207E-05	3.207E-05			
D	5.6	1.82	823.	0.	0.	63.2	
27.1	66.0	3.180E-05	2.678E-05	2.678E-05			
D	7.4	2.12	823.	0.	0.	63.2	
27.1	63.2	2.495E-05	2.012E-05	2.012E-05			
D	9.2	0.20	823.	0.	0.	63.2	
27.1	63.2	2.009E-05	1.620E-05	1.620E-05			
D	22.7	0.03	823.	0.	0.	63.2	
27.1	63.2	8.169E-06	6.589E-06	6.589E-06			
E	0.2	0.01	823.	0.	0.	44.9	
18.7	132.5	6.730E-04	1.332E-03	6.730E-04			
E	0.9	1.06	823.	0.	0.	44.9	
18.7	132.5	1.432E-04	2.835E-04	1.432E-04			
E	1.3	1.09	823.	0.	0.	44.9	
18.7	132.5	9.697E-05	1.920E-04	9.697E-05			
E	1.8	1.49	823.	0.	0.	44.9	
18.7	132.5	7.331E-05	1.451E-04	7.331E-05			
E	2.6	2.41	823.	0.	0.	44.9	
18.7	102.0	6.409E-05	9.768E-05	6.409E-05			
E	3.5	2.08	823.	0.	0.	44.9	
18.7	77.1	6.385E-05	7.353E-05	6.385E-05			
E	4.3	0.73	823.	0.	0.	44.9	
18.7	62.0	6.362E-05	5.896E-05	5.896E-05			
E	5.2	0.36	823.	0.	0.	44.9	
18.7	52.0	6.339E-05	4.924E-05	4.924E-05			
E	6.9	0.07	823.	0.	0.	44.9	
18.7	44.9	5.511E-05	3.699E-05	3.699E-05			
F	0.2	0.01	823.	0.	0.	31.0	
12.0	121.7	1.141E-03	2.127E-03	1.141E-03			
F	0.9	2.02	823.	0.	0.	31.0	
12.0	121.7	2.428E-04	4.526E-04	2.428E-04			
F	1.3	1.98	823.	0.	0.	31.0	
12.0	121.7	1.644E-04	3.065E-04	1.644E-04			
F	1.8	2.15	823.	0.	0.	31.0	
12.0	121.7	1.243E-04	2.317E-04	1.243E-04			
F	2.6	1.75	823.	0.	0.	31.0	
12.0	87.4	1.165E-04	1.560E-04	1.165E-04			
F	3.5	0.83	823.	0.	0.	31.0	
12.0	61.3	1.250E-04	1.174E-04	1.174E-04			
F	4.3	0.17	823.	0.	0.	31.0	
12.0	46.6	1.319E-04	9.413E-05	9.413E-05			
F	5.2	0.07	823.	0.	0.	31.0	
12.0	37.3	1.376E-04	7.862E-05	7.862E-05			
F	8.5	0.03	823.	0.	0.	31.0	

```
12.0     31.0      1.001E-04   4.755E-05   4.755E-05

   G         0.2       0.02      823.        0.          0.        21.4
7.7    125.7      1.720E-03   3.367E-03   1.720E-03
   G         0.9      13.33      823.        0.          0.        21.4
7.7    125.7      3.659E-04   7.163E-04   3.659E-04
   G         1.3      17.20      823.        0.          0.        21.4
7.7    125.7      2.478E-04   4.851E-04   2.478E-04
   G         1.8      14.65      823.        0.          0.        21.4
7.7    125.7      1.873E-04   3.667E-04   1.873E-04
   G         2.6      10.42      823.        0.          0.        21.4
7.7     81.9      1.935E-04   2.468E-04   1.935E-04
   G         3.5       2.98      823.        0.          0.        21.4
7.7     51.7      2.306E-04   1.858E-04   1.858E-04
   G         4.3       0.20      823.        0.          0.        21.4
7.7     36.2      2.639E-04   1.490E-04   1.490E-04
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

E SECTOR BOUNDARY DISTANCE = 823.0 METERS

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AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.019 0.028 0.035 0.036 13.362 13.363 30.558 32.575 42.992 57.641
0.00134 0.00201 0.00249 0.00257 0.96111 0.96121 2.19804 2.34313 3.09236 4.14605

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05 9.413E-05
60.617 62.601 62.799 63.857 66.007 66.833 68.586 69.677 70.239 70.405
4.36011 4.50282 4.51709 4.59321 4.74781 4.80727 4.93333 5.01183 5.05226 5.06415

7.862E-05 7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.896E-05 4.957E-05 4.924E-05 4.755E-05
70.471 71.959 72.488 72.719 75.133 77.217 77.944 78.473 78.837 78.870
5.06891 5.17594 5.21400 5.23065 5.40428 5.55413 5.60646 5.64451 5.67067 5.67305

4.439E-05 4.129E-05 3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.678E-05 2.258E-05 2.012E-05 1.700E-05
78.969 81.185 84.326 84.392 84.458 87.335 89.154 89.584 91.700 92.560
5.68019 5.83955 6.06551 6.07027 6.07502 6.28195 6.41277 6.44369 6.59592 6.65776

1.620E-05 1.363E-05 1.138E-05 8.552E-06 6.885E-06 6.673E-06 6.589E-06 4.519E-06 3.416E-06 2.299E-06

```
      92.758       93.816       94.478       95.007       95.040       95.635
95.668       96.296       96.594       97.057
     6.67203      6.74814      6.79571      6.83377      6.83615      6.87896
6.88134      6.92653      6.94794      6.98124

   1.731E-06    1.388E-06    1.159E-06    8.707E-07
      97.685       98.578       99.273      100.000
     7.02643      7.09065      7.14060      7.19293

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q       WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   4.357
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   4.930
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   5.550
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   6.066
                                                              HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   6.278

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 13  1      -6.36563  -9.86421  -0.83319
 13  2      -7.91319 -10.42847  -1.07416
 13  3      -8.59088 -22.13290  -7.91596
 13  4      -9.05801 -26.16187 -10.35523
 13  5      -9.65890 -29.22800 -12.27916
 13  6     -10.20486 -22.92887  -8.21316
 13  7     -10.34762     NUMXQ(K)=  7
    7.401E-04              0.072              1.000
    5.609E-04              0.216              3.000
    4.884E-04              0.360              5.000
    3.998E-04              0.719             10.000
    3.492E-04              1.079             15.000
    3.099E-04              1.439             20.000
    2.816E-04              1.798             25.000
    2.597E-04              2.158             30.000
    2.422E-04              2.518             35.000
    2.276E-04              2.877             40.000
    2.152E-04              3.237             45.000
    2.045E-04              3.596             50.000
    1.951E-04              3.956             55.000
    1.868E-04              4.316             60.000
    1.429E-04              4.675             65.000
    1.051E-04              5.035             70.000
    7.412E-05              5.395             75.000
    5.143E-05              5.754             80.000
    3.590E-05              6.114             85.000

    4.449E-04              0.5                6.95

ANNUAL AVERAGE =   8.76E-06
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K= 13 FIVEXQ(K)= 4.449E-04 FIVEPR(K)= 6.951

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ESE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS MEANDER BLDG WAKE USED
AT 10.0 METERS
CA=1292.SQ.METERS

A	1.0	0.49	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	0.44	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	0.38	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	0.27	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	0.40	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	0.86	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	0.64	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	1.68	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	0.57	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
A	22.7	0.24	823.	0.	0.	157.1	310.1	157.1	2.875E-07	2.851E-07	2.851E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.13	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.15	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.18	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	0.27	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	0.46	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.13	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.97	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05

C	7.4	2.47	823.	0.	0.	89.7	51.2	89.7
9.318E-06	8.552E-06	8.552E-06						
C	9.2	1.22	823.	0.	0.	89.7	51.2	89.7
7.502E-06	6.885E-06	6.885E-06						
C	22.7	0.33	823.	0.	0.	89.7	51.2	89.7
3.051E-06	2.800E-06	2.800E-06						
D	0.2	0.00	823.	0.	0.	63.2	27.1	124.7
4.551E-04	7.248E-04	4.551E-04						
D	1.0	0.33	823.	0.	0.	63.2	27.1	124.7
9.682E-05	1.542E-04	9.682E-05						
D	1.4	0.55	823.	0.	0.	63.2	27.1	124.7
6.557E-05	1.044E-04	6.557E-05						
D	1.9	0.80	823.	0.	0.	63.2	27.1	124.7
4.957E-05	7.895E-05	4.957E-05						
D	2.8	1.50	823.	0.	0.	63.2	27.1	100.8
4.129E-05	5.313E-05	4.129E-05						
D	3.7	2.32	823.	0.	0.	63.2	27.1	84.5
3.707E-05	4.000E-05	3.707E-05						
D	4.7	3.56	823.	0.	0.	63.2	27.1	73.7
3.407E-05	3.207E-05	3.207E-05						
D	5.6	5.06	823.	0.	0.	63.2	27.1	66.0
3.180E-05	2.678E-05	2.678E-05						
D	7.4	9.54	823.	0.	0.	63.2	27.1	63.2
2.495E-05	2.012E-05	2.012E-05						
D	9.2	2.74	823.	0.	0.	63.2	27.1	63.2
2.009E-05	1.620E-05	1.620E-05						
D	22.7	0.68	823.	0.	0.	63.2	27.1	63.2
8.169E-06	6.589E-06	6.589E-06						
E	0.2	0.00	823.	0.	0.	44.9	18.7	132.5
6.730E-04	1.332E-03	6.730E-04						
E	0.9	0.64	823.	0.	0.	44.9	18.7	132.5
1.432E-04	2.835E-04	1.432E-04						
E	1.3	0.73	823.	0.	0.	44.9	18.7	132.5
9.697E-05	1.920E-04	9.697E-05						
E	1.8	0.77	823.	0.	0.	44.9	18.7	132.5
7.331E-05	1.451E-04	7.331E-05						
E	2.6	1.79	823.	0.	0.	44.9	18.7	102.0
6.409E-05	9.768E-05	6.409E-05						
E	3.5	2.89	823.	0.	0.	44.9	18.7	77.1
6.385E-05	7.353E-05	6.385E-05						
E	4.3	2.96	823.	0.	0.	44.9	18.7	62.0
6.362E-05	5.896E-05	5.896E-05						
E	5.2	2.65	823.	0.	0.	44.9	18.7	52.0
6.339E-05	4.924E-05	4.924E-05						
E	6.9	1.92	823.	0.	0.	44.9	18.7	44.9
5.511E-05	3.699E-05	3.699E-05						
E	8.5	0.22	823.	0.	0.	44.9	18.7	44.9
4.436E-05	2.978E-05	2.978E-05						
E	21.0	0.22	823.	0.	0.	44.9	18.7	44.9
1.804E-05	1.211E-05	1.211E-05						
F	0.2	0.01	823.	0.	0.	31.0	12.0	121.7
1.141E-03	2.127E-03	1.141E-03						
F	0.9	1.19	823.	0.	0.	31.0	12.0	121.7
2.428E-04	4.526E-04	2.428E-04						
F	1.3	0.99	823.	0.	0.	31.0	12.0	121.7
1.644E-04	3.065E-04	1.644E-04						
F	1.8	0.99	823.	0.	0.	31.0		

12.0	121.7	1.243E-04	2.317E-04	1.243E-04			
F	2.6	2.32	823.	0.	0.	31.0	
12.0	87.4	1.165E-04	1.560E-04	1.165E-04			
F	3.5	1.79	823.	0.	0.	31.0	
12.0	61.3	1.250E-04	1.174E-04	1.174E-04			
F	4.3	1.64	823.	0.	0.	31.0	
12.0	46.6	1.319E-04	9.413E-05	9.413E-05			
F	5.2	0.62	823.	0.	0.	31.0	
12.0	37.3	1.376E-04	7.862E-05	7.862E-05			
F	6.9	0.11	823.	0.	0.	31.0	
12.0	31.0	1.243E-04	5.906E-05	5.906E-05			
G	0.2	0.01	823.	0.	0.	21.4	
7.7	125.7	1.720E-03	3.367E-03	1.720E-03			
G	0.9	7.76	823.	0.	0.	21.4	
7.7	125.7	3.659E-04	7.163E-04	3.659E-04			
G	1.3	9.90	823.	0.	0.	21.4	
7.7	125.7	2.478E-04	4.851E-04	2.478E-04			
G	1.8	6.32	823.	0.	0.	21.4	
7.7	125.7	1.873E-04	3.667E-04	1.873E-04			
G	2.6	5.83	823.	0.	0.	21.4	
7.7	81.9	1.935E-04	2.468E-04	1.935E-04			
G	3.5	3.14	823.	0.	0.	21.4	
7.7	51.7	2.306E-04	1.858E-04	1.858E-04			
G	4.3	1.79	823.	0.	0.	21.4	
7.7	36.2	2.639E-04	1.490E-04	1.490E-04			
G	5.2	0.35	823.	0.	0.	21.4	
7.7	27.2	2.942E-04	1.244E-04	1.244E-04			
G	6.9	0.07	823.	0.	0.	21.4	
7.7	21.4	2.804E-04	9.346E-05	9.346E-05			

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

ESE SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.011 0.016 0.020 0.021 7.776 7.777 17.675 18.869 24.702 31.021
0.00117 0.00176 0.00219 0.00227 0.83713 0.83721 1.90279 2.03123 2.65915 3.33941

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.244E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05
34.158 35.152 36.942 37.583 37.936 38.930 40.720 43.040 43.769 44.101
3.67716 3.78419 3.97685 4.04583 4.08389 4.19092 4.38358 4.63332 4.71181 4.74749

9.413E-05 9.346E-05 7.862E-05 7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.906E-05 5.896E-05
45.736 45.802 46.421 47.194 47.746 47.879 49.668 52.563 52.673 55.634
4.92350 4.93064 4.99724 5.08049 5.13995 5.15422 5.34688 5.65846 5.67036 5.98908

4.957E-05 4.924E-05 4.439E-05 4.129E-05 3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.978E-05 2.678E-05
56.429 59.081 59.235 60.738 63.058 64.980 65.157 68.714 68.935 73.995
6.07471 6.36013 6.37678 6.53852 6.78826 6.99519 7.01422 7.39716 7.42095 7.96563

2.258E-05 2.012E-05 1.700E-05 1.620E-05 1.363E-05 1.211E-05 1.138E-05 8.552E-06 6.885E-06 6.673E-06

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      74.260       83.805       84.269       87.008       88.135       88.356
89.328       91.803       93.018       93.504
     7.99417      9.02169      9.07164      9.36657      9.48788      9.51166
9.61632      9.88271     10.01353     10.06586

   6.589E-06    4.519E-06    3.416E-06    2.800E-06    2.299E-06    1.731E-06
1.388E-06    1.159E-06    8.707E-07    7.010E-07
      94.189       94.631       95.007       95.338       95.603       96.001
96.863       97.503       99.183       99.757
    10.13959     10.18716     10.22760     10.26328     10.29182     10.33463
10.42739     10.49637     10.67714     10.73898

   2.851E-07
     100.000
    10.76514

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q       WITH RESPECT TO      WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME       INTO THIS SECTOR ONLY

                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   3.674
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   4.630
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   4.920
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   5.985
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   7.393
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   9.018

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 14  1      -6.36563  -9.92844  -0.84223
 14  2      -7.91319 -10.60277  -1.12405
 14  3      -8.59088 -16.33398  -4.32613
 14  4      -9.05801 -21.31940  -7.29035
 14  5      -9.27082 -17.27105  -4.84077
 14  6      -9.73874 -18.43818  -5.59085
 14  7     -10.34762 -16.62388  -4.33711
 14  8     -10.81374     NUMXQ(K)=  8
    6.465E-04              0.108              1.000
    4.836E-04              0.323              3.000
    4.179E-04              0.538              5.000
    3.293E-04              1.077             10.000
    2.758E-04              1.615             15.000
    2.416E-04              2.153             20.000
    2.172E-04              2.691             25.000
    1.985E-04              3.230             30.000
    1.770E-04              3.768             35.000
    1.353E-04              4.306             40.000
    9.966E-05              4.844             45.000
    7.626E-05              5.383             50.000
    6.062E-05              5.921             55.000
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4.757E-05	6.459	60.000
3.775E-05	6.997	65.000
3.073E-05	7.536	70.000
2.618E-05	8.074	75.000
2.249E-05	8.612	80.000
4.270E-04	0.5	4.64

ANNUAL AVERAGE = 8.21E-06

K= 14 FIVEXQ(K)= 4.270E-04 FIVEPR(K)= 4.645

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)
CLASS METER/SEC PERCENT METERS METERS METERS METERS METERS METERS METERS
AT 10.0 METERS
CA=1292.SQ.METERS

A	1.0	0.26	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	0.20	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	0.35	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	1.53	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	2.13	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	2.21	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	2.34	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	3.90	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	1.91	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
A	22.7	1.05	823.	0.	0.	157.1	310.1	157.1	2.875E-07	2.851E-07	2.851E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.16	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.19	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.19	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	0.88	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	0.79	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.04	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	1.18	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05

C	7.4	2.51	823.	0.	0.	89.7	51.2	89.7
9.318E-06	8.552E-06	8.552E-06						
C	9.2	0.99	823.	0.	0.	89.7	51.2	89.7
7.502E-06	6.885E-06	6.885E-06						
C	22.7	0.75	823.	0.	0.	89.7	51.2	89.7
3.051E-06	2.800E-06	2.800E-06						
D	0.2	0.00	823.	0.	0.	63.2	27.1	124.7
4.551E-04	7.248E-04	4.551E-04						
D	1.0	0.44	823.	0.	0.	63.2	27.1	124.7
9.682E-05	1.542E-04	9.682E-05						
D	1.4	0.45	823.	0.	0.	63.2	27.1	124.7
6.557E-05	1.044E-04	6.557E-05						
D	1.9	0.85	823.	0.	0.	63.2	27.1	124.7
4.957E-05	7.895E-05	4.957E-05						
D	2.8	1.78	823.	0.	0.	63.2	27.1	100.8
4.129E-05	5.313E-05	4.129E-05						
D	3.7	2.65	823.	0.	0.	63.2	27.1	84.5
3.707E-05	4.000E-05	3.707E-05						
D	4.7	3.42	823.	0.	0.	63.2	27.1	73.7
3.407E-05	3.207E-05	3.207E-05						
D	5.6	3.20	823.	0.	0.	63.2	27.1	66.0
3.180E-05	2.678E-05	2.678E-05						
D	7.4	6.17	823.	0.	0.	63.2	27.1	63.2
2.495E-05	2.012E-05	2.012E-05						
D	9.2	3.79	823.	0.	0.	63.2	27.1	63.2
2.009E-05	1.620E-05	1.620E-05						
D	22.7	1.56	823.	0.	0.	63.2	27.1	63.2
8.169E-06	6.589E-06	6.589E-06						
E	0.2	0.00	823.	0.	0.	44.9	18.7	132.5
6.730E-04	1.332E-03	6.730E-04						
E	0.9	0.70	823.	0.	0.	44.9	18.7	132.5
1.432E-04	2.835E-04	1.432E-04						
E	1.3	0.50	823.	0.	0.	44.9	18.7	132.5
9.697E-05	1.920E-04	9.697E-05						
E	1.8	0.82	823.	0.	0.	44.9	18.7	132.5
7.331E-05	1.451E-04	7.331E-05						
E	2.6	2.16	823.	0.	0.	44.9	18.7	102.0
6.409E-05	9.768E-05	6.409E-05						
E	3.5	2.40	823.	0.	0.	44.9	18.7	77.1
6.385E-05	7.353E-05	6.385E-05						
E	4.3	2.81	823.	0.	0.	44.9	18.7	62.0
6.362E-05	5.896E-05	5.896E-05						
E	5.2	2.00	823.	0.	0.	44.9	18.7	52.0
6.339E-05	4.924E-05	4.924E-05						
E	6.9	2.19	823.	0.	0.	44.9	18.7	44.9
5.511E-05	3.699E-05	3.699E-05						
E	8.5	0.64	823.	0.	0.	44.9	18.7	44.9
4.436E-05	2.978E-05	2.978E-05						
E	21.0	0.09	823.	0.	0.	44.9	18.7	44.9
1.804E-05	1.211E-05	1.211E-05						
F	0.2	0.01	823.	0.	0.	31.0	12.0	121.7
1.141E-03	2.127E-03	1.141E-03						
F	0.9	1.51	823.	0.	0.	31.0	12.0	121.7
2.428E-04	4.526E-04	2.428E-04						
F	1.3	1.02	823.	0.	0.	31.0	12.0	121.7
1.644E-04	3.065E-04	1.644E-04						
F	1.8	0.98	823.	0.	0.	31.0		

12.0	121.7	1.243E-04	2.317E-04	1.243E-04			
F	2.6	1.74	823.	0.		0.	31.0
12.0	87.4	1.165E-04	1.560E-04	1.165E-04			
F	3.5	1.87	823.	0.		0.	31.0
12.0	61.3	1.250E-04	1.174E-04	1.174E-04			
F	4.3	1.52	823.	0.		0.	31.0
12.0	46.6	1.319E-04	9.413E-05	9.413E-05			
F	5.2	0.66	823.	0.		0.	31.0
12.0	37.3	1.376E-04	7.862E-05	7.862E-05			
F	6.9	0.10	823.	0.		0.	31.0
12.0	31.0	1.243E-04	5.906E-05	5.906E-05			
F	21.0	0.03	823.	0.		0.	31.0
12.0	31.0	4.071E-05	1.934E-05	1.934E-05			
G	0.2	0.01	823.	0.		0.	21.4
7.7	125.7	1.720E-03	3.367E-03	1.720E-03			
G	0.9	6.18	823.	0.		0.	21.4
7.7	125.7	3.659E-04	7.163E-04	3.659E-04			
G	1.3	7.18	823.	0.		0.	21.4
7.7	125.7	2.478E-04	4.851E-04	2.478E-04			
G	1.8	4.43	823.	0.		0.	21.4
7.7	125.7	1.873E-04	3.667E-04	1.873E-04			
G	2.6	5.06	823.	0.		0.	21.4
7.7	81.9	1.935E-04	2.468E-04	1.935E-04			
G	3.5	2.79	823.	0.		0.	21.4
7.7	51.7	2.306E-04	1.858E-04	1.858E-04			
G	4.3	1.32	823.	0.		0.	21.4
7.7	36.2	2.639E-04	1.490E-04	1.490E-04			
G	5.2	0.31	823.	0.		0.	21.4
7.7	27.2	2.942E-04	1.244E-04	1.244E-04			
G	6.9	0.09	823.	0.		0.	21.4
7.7	21.4	2.804E-04	9.346E-05	9.346E-05			

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SE SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.009 0.016 0.020 0.021 6.204 6.205 13.382 14.887 19.944 24.373
0.00141 0.00254 0.00325 0.00340 1.00951 1.00967 2.17752 2.42251 3.24548 3.96617

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.244E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05
27.165 28.188 29.504 30.205 30.512 31.492 33.363 35.102 35.599 36.037
4.42046 4.58696 4.80103 4.91519 4.96514 5.12450 5.42895 5.71200 5.79287 5.86422

9.413E-05 9.346E-05 7.862E-05 7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.906E-05 5.896E-05
37.558 37.645 38.303 39.121 39.575 39.735 41.899 44.296 44.398 47.205
6.11159 6.12586 6.23289 6.36609 6.43982 6.46599 6.81801 7.20808 7.22473 7.68141

4.957E-05 4.924E-05 4.439E-05 4.129E-05 3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.978E-05 2.678E-05
48.052 50.055 50.245 52.028 54.674 56.866 57.056 60.476 61.120 64.321
7.81936 8.14522 8.17614 8.46632 8.89683 9.25361 9.28453 9.84110 9.94576 10.46665

2.258E-05 2.012E-05 1.934E-05 1.700E-05 1.620E-05 1.363E-05 1.211E-05 1.138E-05 8.552E-06 6.885E-06

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      65.198       71.366       71.395       72.184       75.970       77.008
77.096       78.280       80.794       81.788
    10.60936     11.61310     11.61786     11.74630     12.36233     12.53121
12.54548     12.73814     13.14724     13.30898

   6.673E-06    6.589E-06    4.519E-06    3.416E-06    2.800E-06    2.299E-06
1.731E-06    1.388E-06    1.159E-06    8.707E-07
      82.051       83.615       83.819       84.170       84.916       86.450
88.584       90.791       93.130       97.033
    13.35180     13.60630     13.63960     13.69668     13.81799     14.06773
14.41499     14.77415     15.15471     15.78978

   7.010E-07    2.851E-07
      98.948      100.000
    16.10136     16.27262

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY

                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   4.417
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   5.708
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   6.122
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   7.678
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   9.838
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=  11.611

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 15  1      -6.36563  -9.84118  -0.82987
 15  2      -7.91319 -10.45669  -1.09481
 15  3      -8.59088 -14.98654  -3.75282
 15  4      -9.05801 -18.94514  -6.25866
 15  5      -9.27794 -15.33449  -3.92108
 15  6      -9.73874 -16.11609  -4.46876
 15  7     -10.34762 -16.60412  -4.84684
 15  8     -10.81374     NUMXQ(K)=  8
    6.119E-04              0.163              1.000
    4.545E-04              0.488              3.000
    3.910E-04              0.814              5.000
    2.988E-04              1.627             10.000
    2.487E-04              2.441             15.000
    2.168E-04              3.255             20.000
    1.939E-04              4.068             25.000
    1.555E-04              4.882             30.000
    1.171E-04              5.695             35.000
    8.279E-05              6.509             40.000
    6.512E-05              7.323             45.000
    5.135E-05              8.136             50.000
    4.068E-05              8.950             55.000
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3.272E-05	9.764	60.000
2.624E-05	10.577	65.000
2.127E-05	11.391	70.000
4.514E-04	0.5	3.07

ANNUAL AVERAGE = 1.03E-05

K= 15 FIVEXQ(K)= 4.514E-04 FIVEPR(K)= 3.073

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE SSE SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
			MEANDER	BLDG WAKE	USED					
			AT 10.0 METERS							
CA=1292.SQ.METERS										
A	1.0	0.67	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	0.77	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	0.73	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	1.81	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	3.12	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	3.85	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	4.42	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	7.09	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	2.14	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
A	22.7	0.88	823.	0.	0.	157.1	310.1	157.1	2.875E-07	2.851E-07	2.851E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.20	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.43	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.45	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	0.86	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	0.98	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.49	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	1.34	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05

C	7.4	2.61	823.	0.	0.	89.7	51.2	89.7
9.318E-06	8.552E-06	8.552E-06						
C	9.2	0.96	823.	0.	0.	89.7	51.2	89.7
7.502E-06	6.885E-06	6.885E-06						
C	22.7	0.53	823.	0.	0.	89.7	51.2	89.7
3.051E-06	2.800E-06	2.800E-06						
D	0.2	0.00	823.	0.	0.	63.2	27.1	124.7
4.551E-04	7.248E-04	4.551E-04						
D	1.0	0.86	823.	0.	0.	63.2	27.1	124.7
9.682E-05	1.542E-04	9.682E-05						
D	1.4	0.57	823.	0.	0.	63.2	27.1	124.7
6.557E-05	1.044E-04	6.557E-05						
D	1.9	0.88	823.	0.	0.	63.2	27.1	124.7
4.957E-05	7.895E-05	4.957E-05						
D	2.8	1.83	823.	0.	0.	63.2	27.1	100.8
4.129E-05	5.313E-05	4.129E-05						
D	3.7	2.44	823.	0.	0.	63.2	27.1	84.5
3.707E-05	4.000E-05	3.707E-05						
D	4.7	2.57	823.	0.	0.	63.2	27.1	73.7
3.407E-05	3.207E-05	3.207E-05						
D	5.6	3.10	823.	0.	0.	63.2	27.1	66.0
3.180E-05	2.678E-05	2.678E-05						
D	7.4	4.83	823.	0.	0.	63.2	27.1	63.2
2.495E-05	2.012E-05	2.012E-05						
D	9.2	2.26	823.	0.	0.	63.2	27.1	63.2
2.009E-05	1.620E-05	1.620E-05						
D	22.7	0.88	823.	0.	0.	63.2	27.1	63.2
8.169E-06	6.589E-06	6.589E-06						
E	0.2	0.01	823.	0.	0.	44.9	18.7	132.5
6.730E-04	1.332E-03	6.730E-04						
E	0.9	1.59	823.	0.	0.	44.9	18.7	132.5
1.432E-04	2.835E-04	1.432E-04						
E	1.3	1.69	823.	0.	0.	44.9	18.7	132.5
9.697E-05	1.920E-04	9.697E-05						
E	1.8	1.20	823.	0.	0.	44.9	18.7	132.5
7.331E-05	1.451E-04	7.331E-05						
E	2.6	1.45	823.	0.	0.	44.9	18.7	102.0
6.409E-05	9.768E-05	6.409E-05						
E	3.5	1.43	823.	0.	0.	44.9	18.7	77.1
6.385E-05	7.353E-05	6.385E-05						
E	4.3	1.83	823.	0.	0.	44.9	18.7	62.0
6.362E-05	5.896E-05	5.896E-05						
E	5.2	1.51	823.	0.	0.	44.9	18.7	52.0
6.339E-05	4.924E-05	4.924E-05						
E	6.9	1.43	823.	0.	0.	44.9	18.7	44.9
5.511E-05	3.699E-05	3.699E-05						
E	8.5	0.41	823.	0.	0.	44.9	18.7	44.9
4.436E-05	2.978E-05	2.978E-05						
E	21.0	0.06	823.	0.	0.	44.9	18.7	44.9
1.804E-05	1.211E-05	1.211E-05						
F	0.2	0.01	823.	0.	0.	31.0	12.0	121.7
1.141E-03	2.127E-03	1.141E-03						
F	0.9	2.08	823.	0.	0.	31.0	12.0	121.7
2.428E-04	4.526E-04	2.428E-04						
F	1.3	1.51	823.	0.	0.	31.0	12.0	121.7
1.644E-04	3.065E-04	1.644E-04						
F	1.8	1.18	823.	0.	0.	31.0		

12.0	121.7	1.243E-04	2.317E-04	1.243E-04			
F	2.6	1.41	823.	0.	0.	31.0	
12.0	87.4	1.165E-04	1.560E-04	1.165E-04			
F	3.5	1.22	823.	0.	0.	31.0	
12.0	61.3	1.250E-04	1.174E-04	1.174E-04			
F	4.3	0.94	823.	0.	0.	31.0	
12.0	46.6	1.319E-04	9.413E-05	9.413E-05			
F	5.2	0.39	823.	0.	0.	31.0	
12.0	37.3	1.376E-04	7.862E-05	7.862E-05			
F	6.9	0.18	823.	0.	0.	31.0	
12.0	31.0	1.243E-04	5.906E-05	5.906E-05			
F	8.5	0.04	823.	0.	0.	31.0	
12.0	31.0	1.001E-04	4.755E-05	4.755E-05			
G	0.2	0.01	823.	0.	0.	21.4	
7.7	125.7	1.720E-03	3.367E-03	1.720E-03			
G	0.9	5.40	823.	0.	0.	21.4	
7.7	125.7	3.659E-04	7.163E-04	3.659E-04			
G	1.3	6.62	823.	0.	0.	21.4	
7.7	125.7	2.478E-04	4.851E-04	2.478E-04			
G	1.8	4.44	823.	0.	0.	21.4	
7.7	125.7	1.873E-04	3.667E-04	1.873E-04			
G	2.6	4.26	823.	0.	0.	21.4	
7.7	81.9	1.935E-04	2.468E-04	1.935E-04			
G	3.5	1.59	823.	0.	0.	21.4	
7.7	51.7	2.306E-04	1.858E-04	1.858E-04			
G	4.3	0.35	823.	0.	0.	21.4	
7.7	36.2	2.639E-04	1.490E-04	1.490E-04			
G	5.2	0.20	823.	0.	0.	21.4	
7.7	27.2	2.942E-04	1.244E-04	1.244E-04			
G	6.9	0.08	823.	0.	0.	21.4	
7.7	21.4	2.804E-04	9.346E-05	9.346E-05			

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

SSE SECTOR BOUNDARY DISTANCE = 823.0 METERS

LATERAL PLUME MEANDER/BUILDING WAKE CREDIT ALLOWED
AS A FUNCTION OF DOWNWIND DISTANCE.
MEANDER CREDIT IS FOR WINDSPEEDS LESS THAN 6 MPS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.008 0.017 0.027 0.029 5.425 5.427 12.045 14.122 18.379 22.818
0.00088 0.00201 0.00316 0.00337 0.63368 0.63382 1.40683 1.64944 2.14655 2.66507

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.244E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05
24.407 25.913 26.260 27.848 28.052 29.233 30.455 31.860 33.550 34.406
2.85059 3.02660 3.06704 3.25256 3.27635 3.41430 3.55701 3.72113 3.91855 4.01845

9.413E-05 9.346E-05 7.862E-05 7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.906E-05 5.896E-05
35.342 35.424 35.811 37.012 37.582 37.786 39.232 40.657 40.841 42.674
4.12786 4.13737 4.18256 4.32290 4.38950 4.41328 4.58216 4.74865 4.77006 4.98412

4.957E-05 4.924E-05 4.755E-05 4.439E-05 4.129E-05 3.707E-05 3.699E-05 3.356E-05 3.207E-05 2.978E-05
43.549 45.056 45.097 45.525 47.357 49.801 51.227 51.675 54.241 54.648
5.08640 5.26241 5.26717 5.31712 5.53118 5.81661 5.98310 6.03543 6.33512 6.38269

2.678E-05 2.258E-05 2.012E-05 1.700E-05 1.620E-05 1.363E-05 1.211E-05 1.138E-05 8.552E-06 6.885E-06

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      57.743       58.599       63.425       64.403       66.663       68.150
68.211       69.555       72.162       73.119
     6.74423      6.84413      7.40783      7.52200      7.78602      7.95965
7.96679      8.12377      8.42822      8.54001

   6.673E-06    6.589E-06    4.519E-06    3.416E-06    2.800E-06    2.299E-06
1.731E-06    1.388E-06    1.159E-06    8.707E-07
      73.791       74.666       75.440       76.173       76.703       78.515
81.631       85.480       89.899       96.986
     8.61850      8.72078      8.81116      8.89679      8.95863      9.17032
9.53423      9.98377     10.49991     11.32763

   7.010E-07    2.851E-07
      99.124      100.000
    11.57738     11.67965

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q       WITH RESPECT TO      WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME       INTO THIS SECTOR ONLY

                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 3)=   1.648
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=   2.848
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 5)=   3.718
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 6)=   4.124
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 7)=   4.980
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 8)=   6.331
                                                                  HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 9)=   6.740

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 16  1      -6.36563 -10.05707  -0.85988
 16  2      -7.91319 -10.74961  -1.13765
 16  3      -8.32339 -10.81429  -1.16798
 16  4      -8.59088 -16.04867  -3.91764
 16  5      -9.05801 -16.97214  -4.43516
 16  6      -9.27082 -18.33180  -5.21819
 16  7      -9.73874 -18.15004  -5.10781
 16  8     -10.34762 -18.90884  -5.60456
 16  9     -10.52773     NUMXQ(K)=  9
    5.876E-04              0.117              1.000
    4.359E-04              0.350              3.000
    3.751E-04              0.584              5.000
    2.832E-04              1.168             10.000
    2.360E-04              1.752             15.000
    2.053E-04              2.336             20.000
    1.783E-04              2.920             25.000
    1.297E-04              3.504             30.000
    9.605E-05              4.088             35.000
    6.936E-05              4.672             40.000
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5.166E-05	5.256	45.000
3.957E-05	5.840	50.000
3.082E-05	6.424	55.000
3.930E-04	0.5	4.28

ANNUAL AVERAGE = 7.16E-06

K= 16 FIVEXQ(K)= 3.930E-04 FIVEPR(K)= 4.281

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

PARAMETER VALUES FOR THE CHI/Q CALCULATIONS FOR THE ALL SECTOR.
STABILITY WINDSPEED FREQUENCY DISTANCE TERRAIN HT EFF PLUME HT SIGMA-Y SIGMA-Z MEANDER-SY ** CHI/Q VALUES (SEC/CUBIC METER)

CLASS	METER/SEC	PERCENT	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS	METERS
A	1.0	1.21	823.	0.	0.	157.1	310.1	157.1	6.729E-06	6.673E-06	6.673E-06
A	1.4	1.41	823.	0.	0.	157.1	310.1	157.1	4.557E-06	4.519E-06	4.519E-06
A	1.9	1.37	823.	0.	0.	157.1	310.1	157.1	3.445E-06	3.416E-06	3.416E-06
A	2.8	2.70	823.	0.	0.	157.1	310.1	157.1	2.319E-06	2.299E-06	2.299E-06
A	3.7	2.74	823.	0.	0.	157.1	310.1	157.1	1.745E-06	1.731E-06	1.731E-06
A	4.7	2.36	823.	0.	0.	157.1	310.1	157.1	1.399E-06	1.388E-06	1.388E-06
A	5.6	1.85	823.	0.	0.	157.1	310.1	157.1	1.169E-06	1.159E-06	1.159E-06
A	7.4	2.34	823.	0.	0.	157.1	310.1	157.1	8.780E-07	8.707E-07	8.707E-07
A	9.2	0.72	823.	0.	0.	157.1	310.1	157.1	7.069E-07	7.010E-07	7.010E-07
A	22.7	0.32	823.	0.	0.	157.1	310.1	157.1	2.875E-07	2.851E-07	2.851E-07
C	0.2	0.00	823.	0.	0.	89.7	51.2	89.7	3.356E-04	3.080E-04	3.080E-04
C	1.0	0.40	823.	0.	0.	89.7	51.2	89.7	7.141E-05	6.554E-05	6.554E-05
C	1.4	0.52	823.	0.	0.	89.7	51.2	89.7	4.836E-05	4.439E-05	4.439E-05
C	1.9	0.55	823.	0.	0.	89.7	51.2	89.7	3.656E-05	3.356E-05	3.356E-05
C	2.8	1.30	823.	0.	0.	89.7	51.2	89.7	2.461E-05	2.258E-05	2.258E-05
C	3.7	1.24	823.	0.	0.	89.7	51.2	89.7	1.852E-05	1.700E-05	1.700E-05
C	4.7	1.25	823.	0.	0.	89.7	51.2	89.7	1.485E-05	1.363E-05	1.363E-05
C	5.6	0.92	823.	0.	0.	89.7	51.2	89.7	1.240E-05	1.138E-05	1.138E-05

CA=1292.SQ.METERS
AT 10.0 METERS

C	7.4	1.25	823.	0.	0.	89.7	51.2	89.7
9.318E-06	8.552E-06	8.552E-06						
C	9.2	0.45	823.	0.	0.	89.7	51.2	89.7
7.502E-06	6.885E-06	6.885E-06						
C	22.7	0.22	823.	0.	0.	89.7	51.2	89.7
3.051E-06	2.800E-06	2.800E-06						
D	0.2	0.00	823.	0.	0.	63.2	27.1	63.2
8.986E-04	7.248E-04	7.248E-04						
D	1.0	1.15	823.	0.	0.	63.2	27.1	63.2
1.912E-04	1.542E-04	1.542E-04						
D	1.4	1.12	823.	0.	0.	63.2	27.1	63.2
1.295E-04	1.044E-04	1.044E-04						
D	1.9	1.60	823.	0.	0.	63.2	27.1	63.2
9.789E-05	7.895E-05	7.895E-05						
D	2.8	3.53	823.	0.	0.	63.2	27.1	63.2
6.588E-05	5.313E-05	5.313E-05						
D	3.7	3.68	823.	0.	0.	63.2	27.1	63.2
4.959E-05	4.000E-05	4.000E-05						
D	4.7	3.22	823.	0.	0.	63.2	27.1	63.2
3.976E-05	3.207E-05	3.207E-05						
D	5.6	2.53	823.	0.	0.	63.2	27.1	63.2
3.321E-05	2.678E-05	2.678E-05						
D	7.4	3.41	823.	0.	0.	63.2	27.1	63.2
2.495E-05	2.012E-05	2.012E-05						
D	9.2	1.34	823.	0.	0.	63.2	27.1	63.2
2.009E-05	1.620E-05	1.620E-05						
D	22.7	0.45	823.	0.	0.	63.2	27.1	63.2
8.169E-06	6.589E-06	6.589E-06						
E	0.2	0.01	823.	0.	0.	44.9	18.7	44.9
1.985E-03	1.332E-03	1.332E-03						
E	0.9	1.53	823.	0.	0.	44.9	18.7	44.9
4.223E-04	2.835E-04	2.835E-04						
E	1.3	1.41	823.	0.	0.	44.9	18.7	44.9
2.860E-04	1.920E-04	1.920E-04						
E	1.8	1.75	823.	0.	0.	44.9	18.7	44.9
2.162E-04	1.451E-04	1.451E-04						
E	2.6	2.87	823.	0.	0.	44.9	18.7	44.9
1.455E-04	9.768E-05	9.768E-05						
E	3.5	2.74	823.	0.	0.	44.9	18.7	44.9
1.095E-04	7.353E-05	7.353E-05						
E	4.3	2.22	823.	0.	0.	44.9	18.7	44.9
8.783E-05	5.896E-05	5.896E-05						
E	5.2	1.28	823.	0.	0.	44.9	18.7	44.9
7.335E-05	4.924E-05	4.924E-05						
E	6.9	1.13	823.	0.	0.	44.9	18.7	44.9
5.511E-05	3.699E-05	3.699E-05						
E	8.5	0.27	823.	0.	0.	44.9	18.7	44.9
4.436E-05	2.978E-05	2.978E-05						
E	21.0	0.05	823.	0.	0.	44.9	18.7	44.9
1.804E-05	1.211E-05	1.211E-05						
F	0.2	0.01	823.	0.	0.	31.0	12.0	31.0
4.478E-03	2.127E-03	2.127E-03						
F	0.9	2.05	823.	0.	0.	31.0	12.0	31.0
9.527E-04	4.526E-04	4.526E-04						
F	1.3	1.65	823.	0.	0.	31.0	12.0	31.0
6.452E-04	3.065E-04	3.065E-04						
F	1.8	1.57	823.	0.	0.	31.0		

12.0	31.0	4.878E-04	2.317E-04	2.317E-04			
F	2.6	2.14	823.	0.	0.	31.0	
12.0	31.0	3.283E-04	1.560E-04	1.560E-04			
F	3.5	1.57	823.	0.	0.	31.0	
12.0	31.0	2.471E-04	1.174E-04	1.174E-04			
F	4.3	0.95	823.	0.	0.	31.0	
12.0	31.0	1.981E-04	9.413E-05	9.413E-05			
F	5.2	0.30	823.	0.	0.	31.0	
12.0	31.0	1.655E-04	7.862E-05	7.862E-05			
F	6.9	0.11	823.	0.	0.	31.0	
12.0	31.0	1.243E-04	5.906E-05	5.906E-05			
F	8.5	0.01	823.	0.	0.	31.0	
12.0	31.0	1.001E-04	4.755E-05	4.755E-05			
F	21.0	0.00	823.	0.	0.	31.0	
12.0	31.0	4.071E-05	1.934E-05	1.934E-05			
G	0.2	0.01	823.	0.	0.	21.4	
7.7	21.4	1.010E-02	3.367E-03	3.367E-03			
G	0.9	6.80	823.	0.	0.	21.4	
7.7	21.4	2.149E-03	7.163E-04	7.163E-04			
G	1.3	7.74	823.	0.	0.	21.4	
7.7	21.4	1.455E-03	4.851E-04	4.851E-04			
G	1.8	5.40	823.	0.	0.	21.4	
7.7	21.4	1.100E-03	3.667E-04	3.667E-04			
G	2.6	4.69	823.	0.	0.	21.4	
7.7	21.4	7.405E-04	2.468E-04	2.468E-04			
G	3.5	1.78	823.	0.	0.	21.4	
7.7	21.4	5.574E-04	1.858E-04	1.858E-04			
G	4.3	0.58	823.	0.	0.	21.4	
7.7	21.4	4.469E-04	1.490E-04	1.490E-04			
G	5.2	0.15	823.	0.	0.	21.4	
7.7	21.4	3.733E-04	1.244E-04	1.244E-04			
G	6.9	0.05	823.	0.	0.	21.4	
7.7	21.4	2.804E-04	9.346E-05	9.346E-05			
G	8.5	0.01	823.	0.	0.	21.4	
7.7	21.4	2.258E-04	7.525E-05	7.525E-05			
G	21.0	0.00	823.	0.	0.	21.4	
7.7	21.4	9.182E-05	3.061E-05	3.061E-05			

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:
DIRECTION-INDEPENDENT (S.R.P 2.3.4) MODEL.
MINIMUM BOUNDARY DISTANCE = 823.0 METERS.
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

3.367E-03 2.127E-03 1.332E-03 7.248E-04 7.163E-04 4.851E-04 4.526E-04 3.667E-04 3.080E-04 3.065E-04
0.010 0.019 0.029 0.031 6.836 14.573 16.626 22.030 22.032 23.685
0.00951 0.01903 0.02854 0.03092 6.83586 14.57317 16.62583 22.02983 22.03220 23.68527

2.835E-04 2.468E-04 2.317E-04 1.920E-04 1.858E-04 1.560E-04 1.542E-04 1.490E-04 1.451E-04 1.244E-04
25.212 29.900 31.465 32.878 34.655 36.796 37.944 38.522 40.271 40.420
25.21228 29.90034 31.46540 32.87824 34.65499 36.79566 37.94448 38.52246 40.27068 40.42052

1.174E-04 1.044E-04 9.768E-05 9.413E-05 9.346E-05 7.895E-05 7.862E-05 7.525E-05 7.353E-05 6.554E-05
41.986 43.101 45.970 46.923 46.978 48.581 48.883 48.890 51.633 52.035
41.98559 43.10111 45.96960 46.92339 46.97809 48.58121 48.88329 48.89042 51.63285 52.03482

5.906E-05 5.896E-05 5.313E-05 4.924E-05 4.755E-05 4.439E-05 4.000E-05 3.699E-05 3.356E-05 3.207E-05
52.142 54.359 57.886 59.170 59.185 59.703 63.385 64.510 65.060 68.278
52.14185 54.35863 57.88597 59.17037 59.18464 59.70316 63.38511 64.51014 65.05958 68.27771

3.061E-05 2.978E-05 2.678E-05 2.258E-05 2.012E-05 1.934E-05 1.700E-05 1.620E-05 1.363E-05 1.211E-05
68.280 68.551 71.084 72.388 75.796 75.801 77.038 78.379 79.633 79.687
68.28009 68.55124 71.08437 72.38779 75.79620 75.80096 77.03780 78.37928 79.63276 79.68746

```
   1.138E-05   8.552E-06   6.885E-06   6.673E-06   6.589E-06   4.519E-06
3.416E-06   2.800E-06   2.299E-06   1.731E-06
      80.606      81.859      82.313      83.522      83.976      85.389
86.756      86.980      89.680      92.424
    80.60557    81.85905    82.31335    83.52164    83.97594    85.38878
86.75642    86.98000    89.67962    92.42442

   1.388E-06   1.159E-06   8.707E-07   7.010E-07   2.851E-07
      94.781      96.630      98.965      99.684     100.000
    94.78153    96.62965    98.96535    99.68366   100.00000

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY


                                                                ERROR IN
NORMAL TRANSFORMATION FOR A( 65)= 100.00000
                                                                HANDCHECK
GRAPH:  SLOPE LT -1.0 FOR LOW PERCENTAGES.  XSAVE( 4)=  22.036
    1.277E-03              1.000              1.000
    9.392E-04              3.000              3.000
    7.981E-04              5.000              5.000
    5.967E-04             10.000             10.000
    4.804E-04             15.000             15.000
    3.953E-04             20.000             20.000
    3.144E-04             25.000             25.000
    2.476E-04             30.000             30.000
    1.911E-04             35.000             35.000
    1.472E-04             40.000             40.000
    1.066E-04             45.000             45.000
    8.023E-05             50.000             50.000
    6.185E-05             55.000             55.000
    4.842E-05             60.000             60.000
    3.865E-05             65.000             65.000
    3.047E-05             70.000             70.000
    2.357E-05             75.000             75.000
    1.771E-05             80.000             80.000
    1.269E-05             85.000             85.000
    8.343E-06             90.000             90.000

    7.981E-04              5.0                5.00

K= 17     FIVEXQ(K)= 7.981E-04     FIVEPR(K)= 5.000
```

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

SITE EXCLUSION BOUNDARY CALCULATIONS:

FIVE PERCENT OVERALL SITE LIMIT
BUILDING WAKE CREDIT ALLOWED: C= 0.5 A= 2584. D= 54.3
CORRECTION FACTORS USED IN THE ANNUAL AVERAGE CALCULATIONS.

BELOW ARE PRINTED THE ORDERED VALUES OF CHI/Q AND THE FREQUENCY WITH WHICH THAT VALUE IS REACHED OR EXCEEDED.
THE TOP NUMBER IS THE CHI/Q. THE MIDDLE NUMBER IS THE FREQUENCY NORMALIZED TO THIS SECTOR.
THE THIRD NUMBER IS THE FREQUENCY WITH RESPECT TO ALL TIME.

1.720E-03 1.141E-03 6.730E-04 4.551E-04 3.659E-04 3.080E-04 2.478E-04 2.428E-04 1.935E-04 1.873E-04
0.010 0.019 0.029 0.031 6.836 6.838 14.576 16.628 21.316 26.720
0.00951 0.01903 0.02854 0.03092 6.83586 6.83824 14.57555 16.62822 21.31628 26.72027

1.858E-04 1.644E-04 1.490E-04 1.432E-04 1.244E-04 1.243E-04 1.174E-04 1.165E-04 9.697E-05 9.682E-05
28.497 30.150 30.728 32.255 32.405 33.970 35.535 37.676 39.089 40.237
28.49702 30.15009 30.72806 32.25507 32.40492 33.96998 35.53505 37.67572 39.08855 40.23738

9.413E-05 9.346E-05 7.862E-05 7.525E-05 7.331E-05 6.557E-05 6.554E-05 6.409E-05 6.385E-05 5.906E-05
41.191 41.246 41.548 41.555 43.303 44.419 44.821 47.689 50.432 50.539
41.19117 41.24588 41.54796 41.55510 43.30330 44.41882 44.82080 47.68929 50.43172 50.53876

5.896E-05 4.957E-05 4.924E-05 4.755E-05 4.439E-05 4.129E-05 3.707E-05 3.699E-05 3.356E-05 3.207E-05
52.756 54.359 55.643 55.657 56.176 59.703 63.385 64.510 65.060 68.278
52.75554 54.35865 55.64306 55.65734 56.17586 59.70320 63.38515 64.51021 65.05966 68.27778

3.061E-05 2.978E-05 2.678E-05 2.258E-05 2.012E-05 1.934E-05 1.700E-05 1.620E-05 1.363E-05 1.211E-05
68.280 68.551 71.084 72.388 75.796 75.801 77.038 78.379 79.633 79.688
68.28016 68.55132 71.08444 72.38788 75.79629 75.80105 77.03789 78.37938 79.63286 79.68758

```
   1.138E-05   8.552E-06   6.885E-06   6.673E-06   6.589E-06   4.519E-06
3.416E-06   2.800E-06   2.299E-06   1.731E-06
      80.606      81.859      82.313      83.522      83.976      85.389
86.757      86.980      89.680      92.425
    80.60570    81.85918    82.31348    83.52177    83.97607    85.38891
86.75657    86.98016    89.67978    92.42460

   1.388E-06   1.159E-06   8.707E-07   7.010E-07   2.851E-07
      94.782      96.630      98.965      99.684     100.000
    94.78170    96.62981    98.96552    99.68383   100.00020

          X/Q PERCENTILES
(BASED ON THE UPPER ENVELOPE OF THE
ORDERED X/Q-FREQUENCY VALUES, AND AS
PLOTTED ON A LOG-NORMAL GRAPH.)

 PERCENT OF TIME CHI/Q IS EQUALED OR EXCEEDED
       CHI/Q      WITH RESPECT TO     WHEN THE WIND BLOWS
SEC/CUBIC METER  THE TOTAL TIME      INTO THIS SECTOR ONLY


                                                                ERROR IN
NORMAL TRANSFORMATION FOR A( 65)= 100.00020

  K  I   XQSAVE(K,I)  XQINT(K,I) XQSLOP(K,I)
 18  1      -6.36563  -8.94001  -0.68987
 18  2      -7.91319  -9.00881  -0.73610
 18  3      -8.59088  -9.63425  -1.83768
 18  4      -9.05801  -9.78863  -2.32999
 18  5      -9.27082  -9.64093  -1.66538
 18  6      -9.65890  -9.64408  -1.37277
 18  7      -9.73874  -9.63536  -1.49931
 18  8     -10.34762  -9.54250  -1.69478
 18  9     -14.17078     NUMXQ(K)=  9
    6.524E-04              1.000              1.000
    4.798E-04              3.000              3.000
    4.077E-04              5.000              5.000
    3.142E-04             10.000             10.000
    2.623E-04             15.000             15.000
    2.273E-04             20.000             20.000
    2.009E-04             25.000             25.000
    1.714E-04             30.000             30.000
    1.328E-04             35.000             35.000
    1.011E-04             40.000             40.000
    8.011E-05             45.000             45.000
    6.501E-05             50.000             50.000
    5.417E-05             55.000             55.000
    4.474E-05             60.000             60.000
    3.671E-05             65.000             65.000
    2.952E-05             70.000             70.000
    2.288E-05             75.000             75.000
    1.723E-05             80.000             80.000
    1.238E-05             85.000             85.000
    8.172E-06             90.000             90.000

    4.077E-04              5.0                5.00

K= 18     FIVEXQ(K)= 4.077E-04     FIVEPR(K)= 5.000
```

K	HIGHPR	PR	GRNDVT(K)
1	-3.05187	0.11371	5.94880
2	-1.79277	3.65046	2.40366
3	-3.33270	0.04301	2.25847
4	-3.34806	0.04069	2.31768
5	-3.27811	0.05226	3.62875
6	-3.13937	0.08466	5.61311
7	-2.99012	0.13944	8.94372
8	-2.92984	0.16958	8.83359
9	-2.86733	0.20698	4.85155
10	-2.97654	0.14577	2.27976
11	-2.79871	0.25654	3.08179
12	-2.70774	0.33872	3.92878
13	-2.59363	0.47485	7.19293
14	-2.64204	0.41205	10.76514
15	-2.57624	0.49942	16.27261
16	-2.73741	0.30963	11.67965

K	HOURS(K)	TOTHRS
1	9.96132	9.96132
2	319.78050	329.74190
3	3.76774	333.50960
4	3.56463	337.07420
5	4.57757	341.65180
6	7.41643	349.06820
7	12.21487	361.28310
8	14.85479	376.13790
9	18.13120	394.26910
10	12.76937	407.03850
11	22.47329	429.51180
12	29.67198	459.18380
13	41.59706	500.78080
14	36.09531	536.87620
15	43.74879	580.62490
16	27.12343	607.74840

K	FIVEXQ	SVANN	SLTIME	TIMINT	I	TIME	XQT
1	2.666E-04	3.335E-06	-0.5225	-7.8677			
					1	8.0	-8.95417
					2	16.0	-9.31633
					3	72.0	-10.10221
					4	624.0	-11.23054
2	1.443E-04	1.503E-06	-0.5444	-8.4660			
					1	8.0	-9.59810
					2	16.0	-9.97546
					3	72.0	-10.79429
					4	624.0	-11.96994
3	1.249E-04	1.411E-06	-0.5347	-8.6171			
					1	8.0	-9.72898
					2	16.0	-10.09961
					3	72.0	-10.90384
					4	624.0	-12.05853
4	1.158E-04	1.401E-06	-0.5265	-8.6987			
					1	8.0	-9.79358
					2	16.0	-10.15853
					3	72.0	-10.95043
					4	624.0	-12.08742
5	1.574E-04	1.914E-06	-0.5259	-8.3921			
					1	8.0	-9.48559
					2	16.0	-9.85010

					3	72.0	-10.64106
					4	624.0	-11.77669
6	2.349E-04	3.028E-06	-0.5190	-7.9965			
					1	8.0	-9.07564
					2	16.0	-9.43536
					3	72.0	-10.21593
					4	624.0	-11.33663
7	2.999E-04	5.192E-06	-0.4838	-7.7766			
					1	8.0	-8.78258
					2	16.0	-9.11790
					3	72.0	-9.84552
					4	624.0	-10.89021
8	3.192E-04	4.938E-06	-0.4972	-7.7052			
					1	8.0	-8.73900
					2	16.0	-9.08361
					3	72.0	-9.83140
					4	624.0	-10.90504
9	3.395E-04	4.077E-06	-0.5274	-7.6225			
					1	8.0	-8.71917
					2	16.0	-9.08472
					3	72.0	-9.87791
					4	624.0	-11.01675
10	2.876E-04	2.598E-06	-0.5613	-7.7647			
					1	8.0	-8.93196
					2	16.0	-9.32105
					3	72.0	-10.16535
					4	624.0	-11.37755
11	3.718E-04	4.029E-06	-0.5396	-7.5231			
					1	8.0	-8.64525
					2	16.0	-9.01930
					3	72.0	-9.83095
					4	624.0	-10.99627
12	4.034E-04	5.367E-06	-0.5152	-7.4585			
					1	8.0	-8.52977
					2	16.0	-8.88685
					3	72.0	-9.66169
					4	624.0	-10.77417
13	4.449E-04	8.763E-06	-0.4684	-7.3931			
					1	8.0	-8.36702
					2	16.0	-8.69167
					3	72.0	-9.39613
					4	624.0	-10.40757
14	4.270E-04	8.207E-06	-0.4713	-7.4320			
					1	8.0	-8.41200
					2	16.0	-8.73868
					3	72.0	-9.44754
					4	624.0	-10.46530
15	4.514E-04	1.030E-05	-0.4508	-7.3908			
					1	8.0	-8.32815
					2	16.0	-8.64062
					3	72.0	-9.31864
					4	624.0	-10.29211
16	3.930E-04	7.158E-06	-0.4777	-7.5107			
					1	8.0	-8.50404
					2	16.0	-8.83515
					3	72.0	-9.55364
					4	624.0	-10.58521
17	7.981E-04	1.030E-05	-0.5188	-6.7737			
					1	8.0	-7.85242
					2	16.0	-8.21200

					3	72.0	-8.99226
					4	624.0	-10.11252
18	4.077E-04	1.030E-05	-0.4386	-7.5010			
					1	8.0	-8.41312
					2	16.0	-8.71717
					3	72.0	-9.37693
					4	624.0	-10.32418

USNRC COMPUTER CODE-PAVAN, VERSION 2.0 RUN DATE: 05/09/08

PLANT NAME: Peach Bottom METEOROLOGICAL INSTRUMENTATION
DATA PERIOD: WIND SENSORS HEIGHT: 13.7 meters
TYPE OF RELEASE: Ground Release DELTA-T HEIGHTS: 10.4-21.1 meters
SOURCE OF DATA:
COMMENTS: PB, 84-88, RG 1.23 R1 wnd cats, 1A met (w/ RT 45' wnd), RB Stack to EAB
PROGRAM: PAVAN, 10/76, 8/79 REVISION, IMPLEMENTATION OF REGULATORY GUIDE 1.145

RELATIVE CONCENTRATION (X/Q) VALUES (SEC/CUBIC METER) VERSUS HOURS PER YEAR MAX AVERAGING TIME

SECTOR	0-2 HR X/Q IS EXCEEDED DOWNWIND (METERS)	0-2 HOURS	0-8 HOURS	8-24 HOURS
	1-4 DAYS	4-30 DAYS	ANNUAL AVERAGE	IN SECTOR	SECTOR
S	823.	2.67E-04	1.29E-04	8.99E-05
4.10E-05	1.33E-05	3.34E-06	10.0	S
SSW	823.	1.44E-04	6.79E-05	4.65E-05
2.05E-05	6.33E-06	1.50E-06	319.8	SSW
SW	823.	1.25E-04	5.95E-05	4.11E-05
1.84E-05	5.79E-06	1.41E-06	3.8	SW
WSW	823.	1.16E-04	5.58E-05	3.87E-05
1.76E-05	5.63E-06	1.40E-06	3.6	WSW
W	823.	1.57E-04	7.59E-05	5.27E-05
2.39E-05	7.68E-06	1.91E-06	4.6	W
WNW	823.	2.35E-04	1.14E-04	7.98E-05
3.66E-05	1.19E-05	3.03E-06	7.4	WNW
NW	823.	3.00E-04	1.53E-04	1.10E-04
5.30E-05	1.86E-05	5.19E-06	12.2	NW
NNW	823.	3.19E-04	1.60E-04	1.14E-04
5.37E-05	1.84E-05	4.94E-06	14.9	NNW
N	823.	3.39E-04	1.63E-04	1.13E-04
5.13E-05	1.64E-05	4.08E-06	18.1	N
NNE	823.	2.88E-04	1.32E-04	8.95E-05
3.85E-05	1.14E-05	2.60E-06	12.8	NNE
NE	823.	3.72E-04	1.76E-04	1.21E-04
5.38E-05	1.68E-05	4.03E-06	22.5	NE
ENE	823.	4.03E-04	1.97E-04	1.38E-04
6.37E-05	2.09E-05	5.37E-06	29.7	ENE
E	823.	4.45E-04	2.32E-04	1.68E-04
8.30E-05	3.02E-05	8.76E-06	41.6	E
ESE	823.	4.27E-04	2.22E-04	1.60E-04
7.89E-05	2.85E-05	8.21E-06	36.1	ESE
SE	823.	4.51E-04	2.42E-04	1.77E-04
8.97E-05	3.39E-05	1.03E-05	43.7	SE
SSE	823.	3.93E-04	2.03E-04	1.46E-04
7.09E-05	2.53E-05	7.16E-06	27.1	SSE
MAX X/Q		4.51E-04		
TOTAL HOURS AROUND SITE:		607.7		
SRP 2.3.4	823.	7.98E-04	3.89E-04	2.71E-04

1.24E-04	4.06E-05	1.03E-05		
SITE LIMIT		4.08E-04	2.22E-04	1.64E-04
8.47E-05	3.28E-05	1.03E-05		

THE FIVE-PERCENT-FOR-THE-ENTIRE-SITE X/Q IS LIMITING.

NOTE: VALUES ON THIS PAGE ARE APPROXIMATIONS ONLY. CHECK THE REASONABLENESS OF THE ENVELOPES COMPUTED FOR THE 0-2 HOUR VALUES. FOR ANY FAULTY ENVELOPES, ADJUST THE ABOVE VALUES.