Public Service Electric and Gas Company

Steven E. Miltenberger

Public Service Electric and Gas Company P.O. Box 236, Hancocks Bridge, NJ 08038, 609-339-1100

Vice President and Chief Nuclear Office

SEP 0 3 1992 NLR-N92120

United States Nuclear Regulatory Commission Document Control Desk Washington, DC 20555

Gentlemen:

RESPONSE TO GENERIC LETTER 92-01, REVISION 1
REACTOR VESSEL STRUCTURAL INTEGRITY, 10CFR50.54(f)
HOPE CREEK GENERATING STATION
FACILITY OPERATING LICENSE NO. NPF-57
DOCKET NO. 50-354

PSE&G submitted the 'esponse to Generic Letter 92-01, Revision 1 to the N : in Letter NLR-N92080 dated June 30, 1992. This submittal provided peak and maximum end of life (EOL) fluence levels which were calculated utilizing the methodology of Regulatory Guide 1.99, Rev. 1. PSE&G's response to Generic Letter 88-11 included the revised fluence levels from Revision 2 of the Regulatory Guide. These revised fluence levels were inadvertently excluded from the Generic Letter 92-01 response.

Once PSE&G realized the submitted data was not reflective of the Generic Letter 88-11 submittal, PSE&G contacted Mr. J. Stone, NRR Licensing Project Manager to apprise him of this status.

Although the differences are minor in nature, PSE&G is submitting revised fluence levels to be incorporated into the response to Generic Letter 92-01, Rev. 1 consistent with the values previously submitted. A marked up Table 4 with the corrections annotated as well as a corrected Table 4 are provided for incorporation into the original Generic Letter 92-01 submittal.

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Document Control Desk . 2 SEP 0 3 1992 NLR-N92120 PSE&G apologizes for any inconvenience this may cause. Should you have any questions regarding this submittal, please do not hesitate to contact us. Stem & Muthertry Attachment Affidavit Mr. T. T. Martin, Administrator - Region I U. S. Nuclear Regulatory Commission 475 Allendale Road King of Prussia, PA 19406 Mr. J. Stone, Licensing Project Manager U. S. Nuclear Regulatory Commission One White Flint North 11555 Rockville Pike Rockville, MD 20852 Ms. A. Keller U. S. Nuclear Regulatory Commission Cne White Flint North 11555 Rockville Pike Rockville, MD 20852 Mr. T. P. Johnson (SO5) USNRC Senior Resident Inspector Mr. K. Tosch, Chief NJ Department of Environmental Protection Division of Environmental Quality Bureau of Nuclear Engineering CN 415 Trenton, NJ 08625

REF: NLR-N92120

STATE OF NEW JERSEY

SS.

COUNTY OF SALEM

Steven E. Miltenberger, being duly sworn according to law deposes and says:

I am Vice President and Chief Nuclear Officer of Public Service Electric and Gas Company, and as such, I find the matters set forth in the above referenced letter, concerning the Hope Creek Generating Station, are true to the best of my knowledge, information and be'ief.

Xtun & Mittentry -

Subscribed and Sworn to before me

this 3rd day of September, 1992

Notary Public of New Jersey

KIMBERLY A. HILL NOTARY PUBLIC OF NEW JERSEY My Commission Expires March 9, 1997

My Commission expires on

ATTACHMENT

RESPONSE TO GENERIC LETTER 92-01, REVISION 1
REVISED TABLE 4
HOPE CREEK GENERATING STATION
DOCKET NO. 50-354

RADIATION ART NOT AND EOL RT NOT FOR BELTLINE MATERIALS

	Chemistry		RT _{NDT} (*F)			
	Cu (We	Ni (Wt	Initial	A from Reg. Guide 1.99,R2	Estimated	
Heat Number/Lut				Extrapolation		
Vessel Plate Mater Peak EOL Fluence &	1a1 (SA533	GE. 8.	C1-1) f	or Shell Course	s 4 and 5	
	{ 7.	2	11/ 04			
5K2963-1-2	0.07	0.58	-10	40	+30	
5K2530-1-2	0.08	0.56	+19	46	+65	
5K3238-1-2 ⁽¹⁾	0.09	0.63	+7	52	+59	
5K3230-1-2	0.07	0.56	-10	40	+30	
6035-1-2	0.09	0.54	-11	52	+41	
6C45-1-2	0.08	0.57	+1	46	+47	
Vessel Plate Mater	fal (84513	C= 8	C1 11 4			
Mar.imum EOL Fluenc	(2) at 1/	47 - 2.3	7 x 10-17	n/cm ²	,	
5K3Q25-1	0.15	0.71	+19	45	+64	
5K2608-1	0.09	0.58		23	+42	
5K2698-1		0.58		26	+45	
Material for Girth	and Longi	tudinal	Walds fo	r Shell Courses	A and S	
Peak EOL Fluence a	E 1/4T - 2	T x 101	8 n/cm ²		+ and 3	
510-01205(3)	0.09	0.54	-40	98	+58	
D53040/1125-02205	2,5) 0.08	0.63	-30	96	+66	
				, ,	-00	

	Chemistry			RT _{NDT} (*F)	
Heat Number/Lot	Cu (We Percent	Ni (We Percent	Initial Value	Δ from Reg. Guide 1.99 R2 Extranolation	Estimated EQL
Cirt Weld Material	between Si	nell Cou	rses 3 a	nd 4	
Maximum EOL Fluence	(2) (Shel)	L Course	3) at 1	/4T 4 2-37 x 10	17 n/cm ²
519-01205(4)	0.010	0.53	-49	(2.30)	
504-01205(4)		0.51	-31	8	-41 -23
055733/1810-02205	0.100	0.68		51	+11
D53040/1810-02205	0.100	0.68	.49	51	+2
LPCI Nozzle Weld Mat	erial (Le	CEOR OF	Warri		
Maximum EOL Fluence	(2) at 1/4	T (1.8	1017	n/cm²	
001-01205	0.02	0.51	-40	9	-31

⁽¹⁾ Surveillance test plate usterial.

⁽²⁾ Axial and radial distributions included.

⁽³⁾ These materials were also used in the longitudinal seams shell course 3 and in the girth welds between shell courses and 4.

⁽⁴⁾ These materials were also used for the LPCI nessle welds.

⁽⁵⁾ Surveillance weld marerial.

RADIATION $\Delta RT_{\mbox{\scriptsize NDT}}$ AND EOL $RT_{\mbox{\scriptsize NDT}}$ FOR BELTLINE MATERIALS

Vessel Plate Material (SA533, Gr. B, Cl-1) for Shell Courses 4 a Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ² 5K2963-1-2		Chemistry		RT _{NDT} (*F)			
Wessel Plate Material (SA533, Gr. B, Cl-1) for Shell Courses 4 a Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ² SK2963-1-2 0.07 0.58 -10 40 SK2530-1-2 0.08 0.56 +19 46 SK3238-1-2(1) 0.09 0.63 +7 52 SK3230-1-2 0.07 0.56 -10 40 GC35-1-2 0.09 0.54 -11 52 GC45-1-2 0.08 0.57 +1 46 Wessel Plate Material (SA533, Gr. B, Cl-1) for Shell Course 3 Maximus EOL Fluence (2) at 1/4T = 2.3 6 x 10 ¹⁷ n/cm ² SK3025-1 0.15 0.71 +19 45 SK2608-1 0.09 0.58 +19 23 SK2698-1 0.10 0.58 +19 26 Material for Girth and Longitudinal Welds for Shell Courses 4 an Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ²		**************************************		-100.00000000000000000000000000000000			
Vessel Plate Material (SA533, Gr. B, Cl-1) for Shell Courses 4 a Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ² 5K2963-1-2						Estimated	
Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ² 5K2963-1-2	Heat Number/Lot	Percent	Percent	Value	Extrapolation	EOL	
5K2963-1-2					or Shell Courses	4 and 5	
5K2530-1-2	Peak FOL Fluence a	t 1/4T = 1	. 2 x 10 ¹	n/cm ²			
5K3238-1-2 ⁽¹⁾ 5K3238-1-2 ⁽¹⁾ 5K3230-1-C 0.07 0.56 -10 40 6C35-1-2 0.09 0.54 -11 52 6C45-1-2 0.08 0.57 +1 46 Tessel Plate Material (SA533, Gr. B, Cl-1) for Shell Course 3 Maximus EOL Fluence ⁽²⁾ at 1/4T = 2.3 6 x 10 ¹⁷ n/cm ² 5K3025-1 0.15 0.71 +19 45 5K2608-1 0.09 0.58 +19 23 5K2698-1 0.10 0.58 +19 26 Material for Girth and Longitudinal Welds for Shell Courses 4 an Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ²	5K2963-1-2	0.07	0.58	-10	40	+30	
5K3230-1-2 0.07 0.56 -10 40 6C35-1-2 0.09 0.54 -11 52 6C45-1-2 0.08 0.57 +1 46 "essel Plate Material (SA533, Gr. B. C1-1) for Shell Course 3 Maximus EOL Fluence (2) at 1/4T = 2.3 6x 10 ¹⁷ n/cm ² 5K3025-1 0.15 0.71 +19 45 5K2608-1 0.09 0.58 +19 23 5K2698-1 0.10 0.58 +19 26 Material for Girth and Longitudinal Welds for Shell Courses 4 an Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ²	5K2530-1-2	0.08	0.56	+19	46	+65	
6C35-1-2 0.09 0.54 -11 52 6C45-1-2 0.08 0.57 +1 46 "essel Plate Material (SA533, Gr. B, Cl-1) for Shell Course 3 Maximus EOL Fluence (2) at 1/4T = 2.3 6 x 10 ¹⁷ n/cm ² 5K3025-1 0.15 0.71 +19 45 5K2608-1 0.09 0.58 +19 23 5K2698-1 0.10 0.58 +19 26 Material for Girth and Longitudinal Welds for Shell Courses 4 an Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ²	5K3238-1-2 ⁽¹⁾	0.09	0.63	+7	52	+59	
"essel Plate Material (SA533, Gr. B, Cl-1) for Shell Course 3 Maximus EOL Fluence (2) at 1/4T = 2.3 6 x 10 ¹⁷ n/cm ² 5K3025-1	5K3230-1-0	0.07	0.56	-10	40	+3C	
"essel Plate Material (SA533, Gr. B, C1-1) for Shell Course 3 Maximus EOL Fluence (2) at 1/4T = 2.3 6 x 10 ¹⁷ n/cm ² 5K3025-1	6C35-1-2	0.09	0.54	-11	52	+41	
Maximus EOL Fluence (2) at 1/4T = 2.3 6 x 10 ¹⁷ n/cm ² 5K3025-1	6045-1-2	0.08	0.57	+1	46	+47	
Maximus EOL Fluence (2) at 1/4T = 2.3 6 x 10 ¹⁷ n/cm ² 5K3025-1	"essel Place Mater	ial (SA533	. Gr. B.	C1-1) fo	or Shell Course	3	
5K2608-1 0.09 0.58 +19 23 5K2698-1 0.10 0.58 +19 26 5K2698-1 0.10 0.10 0.10 0.10 0.10 0.10 0.10 0.	Maximus EOL Fluenc	e ⁽²⁾ at 1/	4T - 2.3	6 x 10 ¹⁷	n/cm²		
Material for Girth and Longitudinal Welds for Shell Courses 4 an Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ² 510-01205 ⁽³⁾ 0.09 0.54 -40 98	5K3025-1	0.15	0.71	+19	45	+64	
Material for Girth and Longitudinal Welds for Shell Courses 4 an Peak EOL Fluence at $1/4T = 1.2 \times 10^{18} \text{ n/cm}^2$ $0.09 0.54 -40 \qquad 98$	5K2608-1	0.09	0.58	+19	23	+42	
Peak EOL Fluence at 1/4T = 1.2 x 10 ¹⁸ n/cm ² 510-01205 ⁽³⁾ 0.09 0.54 -40 98	5K2698-1	0.10	0.58	+19	26	+45	
510-01205 ⁽³⁾ 0.09 0.54 -40 98					Shell Courses	4 and 5	
(2.5)	Peak EOL Fluence a	t 1/4T - 1	. 2 x 101°	n/cm²			
053040/1125 02205(2,5) 0 00 0 63 20	510-01205(3)				98	+58	
0.08 0.03 -30 95	D53040/1125-02205	2,5) 0.08	0.63	-30	96	+66	

TABLE 4 (Cont)

	Chemistry		RT _{NDT} (*F)			
Heat Number/Lot				Δ from Reg. Guide 1.99 R2 Extrapolation		
Girt Weld Material be	stween Si	hell Cour	rses 3 a	nd 4		
Maximum EOL Fluence					17 n/cm ²	
519-01205(4)	0.010	0.53	-49	8	-41	
504-01205 (4)	0.010	0.51	-31	8	-23	
D55733/1810-02205	0.100	0.68	-40	51	+11	
D53040/1810-02205	0.100	0.68	-49	51	+2	
That were to write						
Maximum EOL Fluence						
001-01205	0.02	0.51	-40	9	-31	

⁽¹⁾ Surveillance test plate material.

⁽²⁾ Axial and radial distributions included.

⁽³⁾ These materials were also used in the longitudinal seams of shell course 3 and in the girth welds between shell courses 3 and 4.

⁽⁴⁾ These materials were also used for the LPCI nozzle walds.

⁽⁵⁾ Surveillance weld material.