

## **PSEGESPeRAIPEm Resource**

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**From:** Chowdhury, Prosanta  
**Sent:** Tuesday, August 02, 2011 4:41 PM  
**To:** 'PSEGRAIResponses@pseg.com'  
**Cc:** PSEGESPeRAIPEm Resource; 'James.Mallon@pseg.com'; 'David.Robillard@pseg.com'; Colaccino, Joseph; Silvia, Andrea; Clark, Phyllis; McLellan, Judith; Quinlan, Kevin; Schaaf, Robert  
**Subject:** PSEG Site ESPA DRAFT RAI 34 (eRAI 5844) SRP-02.03.04 (RSAC)  
**Attachments:** PSEG Site ESPA Draft RAI 34 (eRAI 5844).doc

Please find attached DRAFT RAI No. 34 for the PSEG Site ESP application. You have ten working days to review this request and to decide whether you need a conference call to discuss it. Please notify me of your decision in this regard.

After the call, or after ten days, the RAI will be finalized and issued to you. You will then have 30 calendar days to respond. These durations are factored into your review schedule. If additional time is required to respond, please inform me of your proposed schedule to respond at your earliest opportunity.

If you have any questions, please contact me.

Prosanta Chowdhury  
Project Manager  
EPR Projects Branch  
Division of New Reactor Licensing  
Office of New Reactors  
301-415-1647

**Hearing Identifier:** PSEG\_Site\_EarlySitePermit\_RAI  
**Email Number:** 67

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**Subject:** PSEG Site ESPA DRAFT RAI 34 (eRAI 5844) SRP-02.03.04 (RSAC)  
**Sent Date:** 8/2/2011 4:41:14 PM  
**Received Date:** 8/2/2011 4:41:15 PM  
**From:** Chowdhury, Prosanta

**Created By:** Prosanta.Chowdhury@nrc.gov

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Files	Size	Date & Time
MESSAGE	759	8/2/2011 4:41:15 PM
PSEG Site ESPA Draft RAI 34 (eRAI 5844).doc		32250

**Options**

**Priority:** Standard

**Return Notification:** No

**Reply Requested:** No

**Sensitivity:** Normal

**Expiration Date:**

**Recipients Received:**

Request for Additional Information No. 34

Application Revision 0

DRAFT

8/2/2011

PSEG Site ESP

PSEG Power LLC, PSEG Nuclear LLC

Docket No. 52-043

SRP Section: 02.03.04 - Short Term Atmospheric Dispersion Estimates for Accident Releases

Application Section: Short Term Atmospheric Dispersion Estimates for Accident Releases

QUESTIONS for Siting and Accident Conseq Branch (RSAC)

02.03.04-2

10 CFR 100.21(c)(2) requires that site atmospheric dispersion characteristics must be evaluated and dispersion parameters established such that radiological dose consequences of postulated accidents meet the criteria set forth in 10 CFR 50.34(a)(1). RG 1.111, Revision 1, states that for generating long term (annual average)  $\chi/Q$  values, spatial and temporal variations of airflow should be considered at sites along and near coasts with significant land-water boundary layer effects on airflow and sea-land breeze circulations. SSAR Section 2.3.2.2.1.2 describes the complex wind patterns at the PSEG site that are caused in part by Delaware Bay breezes and local shoreline breezes.

The staff notes that in the PAVAN input/output files that have been provided in a February 25, 2011, response (ML110680201) to RAI 5, Question 02.03.04-1 (ML110280495), adjustments for the potential effects of land-water boundaries on the annual average  $\chi/Q$  values generated by PAVAN have not been addressed.

Update Section 2.3.4 of the SSAR to include the  $\chi/Q$  values that consider and account for the potential effects of land-water boundaries, or provide justification as to why this is not necessary for the PSEG site.