

## NorthAnnaRAIsPEm Resource

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**From:** Patel, Chandu  
**Sent:** Tuesday, March 06, 2012 9:16 AM  
**To:** 'na3raidommailbox@dom.com'  
**Cc:** NorthAnnaRAIsPEm Resource; Weisman, Robert; Kallan, Paul; Nold, David  
**Attachments:** Draft RAI 6262.doc

Hi All,

Please see attached draft RAI 6262 (Section 9.4.5), for North Anna 3 COLA. I would like to request Dominion to let me know if it needs any clarification on this RAI before COB March 9, 2012. Otherwise, it will be issued as final after March 9, 2012. For other people, it is for information only.

Thanks,  
Chandu Patel, Lead Project Manager  
North Anna 3 COLA

Chandu Patel

**Hearing Identifier:** NorthAnna3\_eRAI  
**Email Number:** 30

**Mail Envelope Properties** (8C658E9029C91D4D90C6960EF59FC0D66CE72445E8)

**Subject:**  
**Sent Date:** 3/6/2012 9:15:44 AM  
**Received Date:** 3/6/2012 9:15:46 AM  
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**Post Office:** HQCLSTR02.nrc.gov

Files	Size	Date & Time
MESSAGE	427	3/6/2012 9:15:46 AM
Draft RAI 6262.doc	32250	

**Options**

**Priority:** Standard  
**Return Notification:** No  
**Reply Requested:** No  
**Sensitivity:** Normal  
**Expiration Date:**  
**Recipients Received:**

Request for Additional Information No. 6262 (Draft)  
North Anna, Unit 3  
Dominion  
Docket No. 52-017  
SRP Section: 09.04.05 - Engineered Safety Feature Ventilation System  
Application Section: 9.4.5

QUESTIONS for Advanced Reactor Branch 1 (ARB1)

09.04.05-\*\*\*

This is a follow-up RAI to RAI No. 5658, Question 09.04.05-6.

Please provide the following information:

(1) the relationship between the Protection and Safety Monitoring System (PSMS) and the ESW pump house ventilation controls. This interrelationship / dependency is not shown in the North Anna 3 FSAR Revision 4, Chapter 7 or in the Revision 3 of the DCD, subsection 7.3.4 "Combined License Information."

(2) the mark-up of Figure 9.4-201 does not indicate "that the temperature controllers are part of the PSMS" as indicated in No. (2) of the applicant's response. In addition, Figure 9.4-201 of FSAR Revision 4 dated December 2011 does not show this as well. The staff request that the applicant appropriately amend the FSAR to resolve these issues.

09.04.05-\*\*\*

This is a follow-up RAI to RAI 5658, Question 09.04.05-4. In the response dated August 22, 2011, the applicant responded that:

*"North Anna Unit 3 has been evaluated for internal flood protection for site-specific structures. The evaluation concluded that:*

*Postulated internal flooding due to events including Moderate Energy Line Break (MELB) and fire suppression activities cannot adversely affect safe plant operations or the ability of the plant to achieve and maintain a safe shutdown condition, if necessary, in accordance with the single failure criterion."*

Please provide the basis for the above conclusion including the significant assumptions made in the evaluation for use of non-safety grade floor drains, and the credit taken for use of door seals between the pump rooms of different divisions. In particular, the staff would like to know the following:

1. To what levels will the internal flood waters rise within the pump rooms in the absence of a safety related floor drainage system in the pump rooms,
2. Will the floor drainage system piping between the ESW pump room and the transfer pump room be physically connected such that a plugged up drainage system could cause failure of independent Class 1E powered equipment in two different Class 1E divisions?
3. In the absence of a safety related floor drainage system (i.e. no credit given) to what level will water rise in both the room that contains the internal flood leak and the adjacent room given the non-existence of a water tight door between the pump rooms?

The staff would like to review the evaluation in more details in the future at a mutually acceptable location.