

CCNPP3eRAIPEm Resource

From: Arora, Surinder
Sent: Tuesday, October 29, 2013 2:15 PM
To: 'Infanger, Paul (paul.infanger@unistarnuclear.com)'; "UNECC3Project@unistarnuclear.com" (UNECC3Project@unistarnuclear.com)
Cc: CCNPP3eRAIPEm Resource; Segala, John; Wilson, Anthony; Mitra, Sikhindra; McLellan, Judith; Jackson, Terry; Takacs, Michael
Subject: CCNPP3 - Final RAI 402 ICE1 7264
Attachments: FINAL RAI 402 ICE1 7264.docx

Paul,

Attached to this email message is the final RAI No. 402 (eRAI No. 7264) pertaining to section 7.5 of the FSAR for the combined license application for CCNPP3. This RAI question is a follow up to UniStar's response received for Question 07.05-1 of RAI 325. The draft of this RAI was issued to you on October 25, 2013. Your email dated October 29, 2013 stated that no clarification phone call was required on this RAI and that the RAI could be issued as "final". Therefore, the RAI question remains unchanged from its draft version.

The schedule that we have established for review of your COL application assumes that your technically complete response to the RAI question or a schedule for providing a complete response must be received within 30 days of the final issuance of the RAI. Please note that if, in lieu of a complete response, you are providing a response schedule, the staff will re-evaluate the completion schedule for the applicable chapter based on the response date provided by you.

Additionally, please make sure to include in your response letter a statement certifying whether or not your response contains any sensitive or proprietary information that needs to be withheld from public disclosure.

Thanks.

SURINDER ARORA, PE
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From: Arora, Surinder

Created By: Surinder.Arora@nrc.gov

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Request for Additional Information 402 (eRAI 7264)

Issue Date: 10/29/2013
Application Title: Calvert Cliffs Unit 3 - Docket Number 52-016
Operating Company: UniStar
Docket No. 52-016
Review Section: 07.05 - Information Systems Important to Safety
Application Section:

QUESTIONS

07.05-3

This RAI is a follow-on to RAI 325, Question 07.05-1

Provide additional information that describes and explains how the safety-related instrumentation and control (I&C) systems for site-specific systems, such as the Ultimate Heat Sink (UHS), address NRC requirements. 10 CFR Part 50, Appendix A, General Design Criteria 13 requires, in part, that instrumentation be provided to monitor variables and systems over their anticipated ranges for normal operation, for anticipated operational occurrences, and for accident conditions. In RAI 325, Question 07.05-1, the staff noted that while the UHS is safety-related, the staff was not able to identify information in Chapter 7 of the Calvert Cliffs Nuclear Power Plant Unit 3 (CCNPP Unit 3) Final Safety Analysis report (FSAR) that describes the UHS I&C. From information located in the ITAAC, and Chapter 9 of the CCNPP Unit 3 FSAR, the staff identified the following site-specific systems, for which the related I&C design information was not found in Chapter 7 of the CCNPP Unit 3 FSAR. These systems include: UHS makeup water intake structure ventilation system (initiated automatically), UHS makeup water system (each division can be initiated manually), essential service water system (ESWS) normal makeup system, ESWS emergency makeup water system, ESWS makeup water bypass system, ESWS blowdown system, and ESWS alternate blowdown system.

UniStar's previous response to RAI 325, Question 07.05-1 was not adequate because the response did not include all the information on the I&C systems that control six of the seven above stated site specific systems. The only system for which adequate information was provided was the UHS makeup water system.

Subsequently, on April 30, 2013, the applicant provided a supplemental RAI response to RAI 325, Question 07.05-1. The staff found that the supplemental RAI response did not provide all of the information on the I&C Systems that control five of the seven above stated site specific systems. The one system for which adequate information was provided was the UHS makeup water intake structure ventilation system.

Additional information was not provided for the the following four systems, as seen in the table provided in the applicant's "Feedback Comment 4 (I&C Issue 1):"

SYSTEM	Control
ESWS (UHS) Emergency Makeup Water system	No Site Specific Automatic Controls
ESWS (UHS) Makeup Water Bypass system	No Site Specific Automatic Controls
ESWS Blowdown system	No Site Specific Automatic Controls
ESWS Emergency Blowdown system	No Site Specific Automatic Controls

The staff requests that the applicant state the I&C system that provides control to each of the following systems: ESWS (UHS) Emergency Makeup Water system, ESWS (UHS) Makeup Water Bypass system, ESWS Blowdown system, and the ESWS Emergency Blowdown system. If an I&C system does not provide control, discuss how control is provided.

As seen in the applicant's "Feedback Comment 7 (I&C Issue 4)," "...different column headings exist on the two tables..." The headings in Table 7.4-1 and Table 7.4-2 do not seem to be consistent with the terminology in EPR FSAR. Tables 7.4-1 and table 7.4-2 have the following headings; "Normal Shutdown," and "Safe/DBA Shutdown." This is different from the headings in the Calvert Cliffs Tables. Calvert Cliffs Nuclear Power Plant (CCNPP) Unit 3, FSAR, Table 7.4-1 and Table 7.4-2, use the following terminology in the table headings: "Normal Shutdown," and "Safe/DBA Shutdown." However, U.S. EPR FSAR Section 7.4 uses the following terminology: "safe shutdown," cold shutdown," "hot shutdown,"

Provide clarification on CCNPP Unit 3 Table 7.4-1 and Table 7.4-2 headings, "Normal Shutdown," and "Safe/DBA Shutdown."

The additional information provided by the applicant should also be incorporated into Chapter 7 of the FSAR and be sufficient to support the site-specific ITAAC for the UHS Makeup Water System located in Tables 2.4-20, 2.4-22, and 2.4-28 of the CCNPP Unit 3 COLA, Part 10, Inspections, Tests, Analyses Criteria (ITAAC) and ITAAC Closure, Revision 7.