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UniStar
NUCLEAR ENERGY

10 CFR 50.4
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January 9, 2009

UN#09-009

ATTN: Document Control Desk
U.S. Nuclear Regulatory Commission
Washington, DC 20555-0001

Subject: UniStar Nuclear Energy, NRC Docket No. 52-016
Response to Request for Additional Information for the
Calvert Cliffs Nuclear Power Plant, Unit 3,
RAI No. 41, Revision 3, Question 03.06.03-1,
Leak-Before-Break Evaluation Procedures

Reference: John Rycyna (NRC) to George Wrobel (UniStar), "RAI No 41 CIB1 1502.doc," email dated December 11, 2008

The purpose of this letter is to respond to the request for additional information (RAI) identified in the NRC e-mail correspondence to UniStar Nuclear, dated December 11, 2008 (Reference). This RAI addresses Leak-Before-Break Evaluation Procedures, as discussed in Section 3.6.3 of the Final Safety Analysis Report (FSAR), as submitted in Part 2 of the CCNPP Unit 3 Combined License Application (COLA), Revision 3.

The enclosure provides our response to RAI No. 41, Revision 3, Question 03.06.03-1. Our response includes revised COLA content. A Licensing Basis Document Change Request has been initiated to incorporate these changes in a future revision of the COLA. Our response to RAI Question 03.06.03-1 does not include any new regulatory commitments.

D079
NRO

If there are any questions regarding this transmittal, please contact me at (410) 470-4205 or Mr. Michael J. Yox at (410) 495-2436.

I declare under penalty of perjury that the foregoing is true and correct.

Executed on January 9, 2009

Greg Gibson

Enclosure: Response to NRC Request for Additional Information, RAI No. 41, Revision 3, Question 03.06.03-1, Leak-Before-Break Evaluation Procedures, Calvert Cliffs Nuclear Power Plant, Unit 3

cc: U.S. NRC Region I
U.S. NRC Resident Inspector, Calvert Cliffs Nuclear Power Plant, Units 1 and 2
NRC Environmental Project Manager, U.S. EPR Combined License Application
NRC Project Manager, U.S. EPR Combined License Application
NRC Project Manager, U.S. EPR Design Certification Application (w/o enclosure)

Enclosure

Response to NRC Request for Additional Information,
RAI No. 41, Revision 3, Question 03.06.03-1, Leak-Before-Break Evaluation Procedures,
Calvert Cliffs Nuclear Power Plant, Unit 3

RAI No. 41, Revision 3

Question 03.06.03-1

Chapter 3.6.3 of the applicant's FSAR states that "Constellation Generation Group and UniStar Nuclear Operating Services shall confirm that the design Leak-Before-Break (LBB) analysis remains bounding for each piping system." Please provide as-designed LBB analyses for each LBB piping system prior to COL issuance or provide justification for concluding that the as-designed LBB analyses remain bounding for each piping system. Also correct the names of the applicants throughout the FSAR.

Response

The as-designed LBB analysis is the responsibility of the design certification applicant and is reviewed by the NRC as part of the review of the U.S. EPR FSAR Tier 2, Section 3.6.3. As noted in this U.S. EPR FSAR section, the COL applicant is responsible for confirming that the design LBB analysis remains bounding for each piping system by providing a summary of the results of the actual as-built, plant-specific LBB analysis, including material properties of piping and welds, stress analyses, leakage detection capability, and degradation mechanisms. UniStar does not expect that the design LBB analysis would not remain bounding, but acknowledges the need to perform the appropriate reconciliation with the as-built plant. As noted in Section 3.6.3 of the CCNPP Unit 3 FSAR, this confirmation and related information will be provided prior to fuel load based on the as-built plant. This is also consistent with the ITAAC that has been established for LBB in the design certification application (e.g., U.S. EPR FSAR Tier 1, Table 2.2.1-5, item 3.7).

FSAR Impact

FSAR Section 3.6.3 will be revised as shown in the paragraph below:

> {Calvert Cliffs 3 Nuclear Project, LLC and UniStar Nuclear Operating Services, LLC} shall confirm that the design Leak-Before-Break (LBB) analysis remains bounding for each applicable as-built piping system. A summary of the results of the actual as-built, plant-specific LBB analysis, including material properties of piping and welds, stress analyses, leakage detection capability, and degradation mechanisms will be provided prior to fuel load.

In the next revision of the FSAR, the names of the applicants throughout the FSAR will be corrected as shown below:

> Change "Constellation Generation Group, LLC" (Constellation Generation Group) to "Constellation Energy Nuclear Group, LLC" (CENG).