

South Texas Project Electric Generating Station P.O. Box 289 Wadsworth, Texas 77483

June 17, 2010 U7-C-STP-NRC-100144

U. S. Nuclear Regulatory Commission Attention: Document Control Desk One White Flint North 11555 Rockville Pike Rockville, MD 20852-2738

South Texas Project Units 3 and 4 Docket Nos. 52-012 and 52-013 Response to Request for Additional Information

Attached is a response to an NRC staff question included in Request for Additional Information (RAI) letter number 347 related to Combined License Application (COLA) Part 2, Tier 2 Chapter 7, Instrumentation and Controls. This submittal completes our response to RAI letter number 347.

The attachment provides our response to the RAI question listed below:

07.01-16

The COLA changes provided in this response will be incorporated in the next routine revision of the COLA following NRC acceptance of the RAI response.

There are no commitments in this letter.

If you have any questions regarding this response, please contact me at (361) 972-7136, or Bill Mookhoek at (361) 972-7274.

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

Executed on 6/17/10

Scott Head Manager, Regulatory Affairs South Texas Project Units 3 & 4

jwc

Attachment:

Response to RAI 07.01-16

STI 32692384

cc: w/o attachment except* (paper copy)

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RAI 07.01-16

QUESTION:

WCAP-17119-P, Rev. 1, "Methodology for STP 3 & 4 ABWR Technical Specifications Setpoints," which is a part of the STP 3 & 4 COL application makes a reference to WCAP-17137-P, "Westinghouse Stability Methodology for the ABWR" for determining OPRM setpoints (Table 3-80, Note 7). Note that WCAP-17137-P is a part of the set of fuel related topical reports that form the basis for <u>Post-COL fuel amendment</u> application. Making a reference to a Post-COL document in the COL application is inappropriate. The applicant is asked to resolve this issue.

RESPONSE:

Reference to WCAP-17137-P, "Westinghouse Stability Methodology for the ABWR" will be removed from WCAP-17119-P, "Methodology for South Texas Project Units 3 & 4 ABWR Technical Specification Setpoints." Instead, because the Oscillation Power Range Monitor (OPRM) setpoints can be determined using the WCAP-17119-P methodology, WCAP-17119-P will be revised to include typical setpoint values and associated uncertainties for the OPRM. WCAP-17119-P Revision 2 will be provided in a supplemental response to this RAI by July 30, 2010.

Reference to WCAP-17137-P will also be removed from Technical Specification 5.5.2.11, "Setpoint Control Program" and from Standard Departure 16.3-100, "Setpoint Control Program Implementation." These changes are shown by revision bars on the attached markups and supersede those provided in response to Issue 4.i and Issue 1, respectively, of RAI 16-65 (U7-C-STP-NRC-100011, dated January 13, 2010). The corresponding changes will also be made to COLA Part 4. These changes will be incorporated in COLA Rev. 4.

5.5.2.11 <u>Setpoint Control Program (SCP)</u>

- a. The Setpoint Control Program (SCP) implements the regulatory requirement of 10 CFR 50.36(c)(1)(ii)(A) that technical specifications will include items in the category of limiting safety system settings (LSSS), which are settings for automatic protective devices related to those variables having significant safety functions.
- b. The Nominal Trip Setpoint (NTS), Allowable Value (AV), As-Found Tolerance (AFT), and As-Left Tolerance (ALT) for each Technical Specification required automatic protection instrumentation function shall be calculated in conformance with the NRC approved WCAP-17119-P "Methodology for South Texas Project Units 3 & 4 ABWR Technical Specification Setpoints." Additionally, the NRC approved methodology shall define acceptable margin as margin greater than or equal to the ALT.
- c. For each Technical Specification required automatic protection instrumentation function, performance of a SENSOR CHANNEL CALIBRATION, CHANNEL CALIBRATION, or CHANNEL FUNCTIONAL TEST (CFT) surveillance "in accordance with the Setpoint Control Program" shall include the following:
 - 1. The as-found value of the instrument channel trip setting shall be compared with the specified NTS.
 - i. If the as-found value of the instrument channel trip setting differs from the specified NTS by more than the pre-defined test acceptance criteria band (i.e., the specified AFT), then the instrument channel shall be evaluated to verify that it is functioning in accordance with its design basis before declaring the surveillance requirement met and returning the instrument channel to service. An Instrument Channel is determined to be functioning in accordance with its design basis if it can be recalibrated to within the ALT. This as-found condition shall be entered into the plant's corrective action program.
 - ii. If the as-found value of the instrument channel trip setting is less conservative than the specified AV, the surveillance requirement is not met and the instrument channel shall be immediately declared inoperable.
 - 2. The instrument channel trip setting shall be set to a value within the specified ALT around the specified NTS at the completion of the surveillance; otherwise, the surveillance requirement is not met and the instrument channel shall be immediately declared inoperable.
- d. The difference between the instrument channel trip setting as-found value and the previous as-left value for each Technical Specification required automatic protection instrumentation function shall be trended and evaluated to verify that the instrument channel is functioning in accordance with its design basis.
- e. The SCP shall establish a document containing the current value of the specified NTS, AV, AFT, and ALT for each Technical Specification required automatic protection instrumentation function and references to the calculation documentation. Changes to this document shall be governed by the regulatory requirement of 10 CFR 50.59. In addition, changes to the specified NTS, AV, AFT, and ALT values shall be governed by the NRC approved setpoint methodology. This document, including any midcycle revisions or supplements, shall be provided upon issuance for each reload cycle to the NRC.

Response to RAI 07.01-16

STD DEP 16.3-100, Setpoint Control Program Implementation

Description

This departure adds a new Specification, 5.5.2.11, "Setpoint Control Program" in order to utilize the methodology approach (Option 3) specified in Interim Staff Guidance (ISG)-08 for instrument allowable values used in the Technical Specifications. The NRC approved topical report upon which this methodology is based is WCAP-17119-P "Methodology for South Texas Project Units 3 & 4 ABWR Technical Specification Setpoints."

The resulting changes include removal of the "Allowable Value" columns and values from Tables 3.3.1.1-1, 3.3.1.4-1, 3.3.4.1-1 and 3.3.7.1-1, including applicable footnotes, restatement of the Allowable Values in SRs 3.3.4.2.3 and 3.3.8.1.2, modification of the definition for CHANNEL FUNCTIONAL TEST and DIVISIONAL FUNCTIONAL TEST to include instrument setpoint verification, restatement of the SENSOR CHANNEL CALIBRATION and CHANNEL CALIBRATION requirements in SRs 3.3.1.1.10, 3.3.1.1.11, 3.3.1.4.6, 3.3.4.1.3, 3.3.4.2.3, 3.3.7.1.3 and 3.3.8.1.2 and the CHANNEL FUNCTIONAL TEST and DIVISION FUNCTIONAL TEST requirements in SRs 3.3.1.1.6, 3.3.1.4.3, 3.3.4.1.2, 3.3.4.2.2, 3.3.7.1.2 and 3.3.8.1.1 to reference TS 5.5.2.11, Setpoint Control Program. The corresponding Bases changes are also made.