

**Southern Nuclear
Operating Company, Inc.**
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AUG 24 2009

Docket Nos.: 52-025
52-026

ND-09-1328

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

Southern Nuclear Operating Company
Vogtle Electric Generating Plant Units 3 and 4 Combined License Application
Response to Bellefonte Units 3 and 4 Safety Evaluation Report
With Open Items for Chapter 05

Ladies and Gentlemen:

By letter dated March 28, 2008, Southern Nuclear Operating Company (SNC) submitted an application for combined licenses (COLs) for proposed Vogtle Electric Generating Plant (VEGP) Units 3 and 4 to the U.S. Nuclear Regulatory Commission (NRC) for two Westinghouse AP1000 reactor plants, in accordance with 10 CFR Part 52. As a result of the NRC's detailed review of the initial AP1000 Reference COL application (Bellefonte Units 3 and 4), the NRC has written a safety evaluation report (SER) with open items for the subject chapter. While there were no open items for this chapter, two Chapter 5 confirmatory items identified in the SER for the reference COL are addressed by the enclosure to this letter. Typically, the confirmatory items will be met by fulfilling the COL application revisions previously identified to the NRC. In this case, the confirmatory item change details have not yet been provided to the NRC but are included in the enclosure. SNC is addressing the confirmatory items identified in the SER in the enclosure to this letter as the new AP1000 Reference COL applicant.

If you have any questions regarding this letter, please contact Mr. Wes Sparkman at (205) 992-5061.

DO92

NRO

Mr. C. R. Pierce states he is the AP1000 Licensing Manager for Southern Nuclear Operating Company, is authorized to execute this oath on behalf of Southern Nuclear Operating Company and to the best of his knowledge and belief, the facts set forth in this letter are true.

Respectfully submitted,

SOUTHERN NUCLEAR OPERATING COMPANY

Charles R. Pierce

Charles R. Pierce

Sworn to and subscribed before me this 24th day of August, 2009

Notary Public: Dana M. Williams

My commission expires: 12/29/2010



CRP/BJS/dmw

Enclosure: Revisions to R-COLA Related to SER with Open Items, Chapter 05

cc: Southern Nuclear Operating Company

Mr. J. H. Miller, III, President and CEO (w/o enclosure)
Mr. J. T. Gasser, Executive Vice President, Nuclear Operations (w/o enclosure)
Mr. D. H. Jones, Site Vice President – Vogtle 3 and 4 (w/o enclosure)
Mr. J. A. Miller, Executive Vice President, Nuclear Development (w/o enclosure)
Mr. T. E. Tynan, Vice President - Vogtle (w/o enclosure)
Mr. M. K. Smith, Technical Support Director
Mr. D. M. Lloyd, Vogtle Project Support Director
Mr. M. J. Ajluni, Nuclear Licensing Manager
Mr. W. A. Sparkman, COL Project Engineer
Document Services RTYPE: AR01.1053
File AR.01.02.06

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Mr. L. A. Reyes, Region II Administrator (w/o enclosure)
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Mr. R. G. Joshi, Lead Project Manager of New Reactors
Mr. B. Hughes, Project Manager of New Reactors
Ms. T. E. Simms, Project Manager of New Reactors
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Mr. M. M. Comar, Project Manager of New Reactors
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Mr. R. H. Kitchen, PGN
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Southern Nuclear Operating Company

ND-09-1328

Enclosure

Revisions to R-COLA Related to SER with Open Items

Chapter 05

Confirmatory Item

05.02-01

05.03-01

Revisions

See following pages

See following pages

eRAI Tracking No. 0077 – 5.2.4-5

NuStart Qb Tracking No. 3529

NRC SER CI Number 05.02-01:

In Revision 1 to the BLN COL FSAR, the COL applicant states that its augmented inspection for the reactor vessel top head uses N-729-1 as modified by the NRC in the proposed rulemaking dated April 5, 2007 (72 FR 16740). The COL applicant further noted in response to RAI 5.2.4-5, that the wording in the final rule will be adopted when the final rule is issued. The final rule to amend 10 CFR 50.55a was issued on September 10, 2008 (73 FR 52730) and includes a requirement to inspect the RPV head in accordance with N-729-1 as amended by 10 CFR 50.55a(g)(6)(ii)(D). The COL applicant's methodology to inspect the RPV head in accordance with N-729-1, as amended by 10 CFR 50.55a(g)(6)(ii)(D) meets the regulations, and is therefore acceptable. The staff will verify that the next update of the BLN COL FSAR (Section 5.2.4.1) adequately incorporates reference to the final rule. This is **Confirmatory Item 5.2-1**.

SNC Response:

The COL application will be revised to incorporate the reference to the final rule in a future revision as shown in the COL Application Revisions section below.

This response is expected to be STANDARD for the S-COLAs.

Associated VEGP COL Application Revisions:

COLA Part 2, FSAR, Subsection 5.2.4.1, fifth paragraph, will be revised from:

The inservice inspection program is augmented for reactor vessel top head inspections by use of the ASME Code Case N-729-1, "Alternative Examination Requirements for Pressurized-Water Reactor (PWR) Vessel Upper Heads With Nozzles Having Pressure-Retaining Partial-Penetration Welds," as modified by the NRC Staff position on the use of ASME Code Case N-729-1 shown in the proposed rulemaking dated April 5, 2007 (72 FR 16740).

To read:

The inservice inspection program is augmented for reactor vessel top head inspections by use of the ASME Code Case N-729-1, "Alternative Examination Requirements for Pressurized-Water Reactor (PWR) Vessel Upper Heads With Nozzles Having Pressure-Retaining Partial-Penetration Welds," as modified by the conditions specified in 10 CFR 50.55a(g)(6)(ii)(D).

eRAI Tracking No. 0039 – 5.3.1-1

NuStart Qb Tracking No. 3568

NRC SER CI Number 05.03-01:

In RAI 5.3.1-1, the staff requested that the applicant describe the process for preparing the capsule specimens and to include detailed information on the capsule environment and material types of the capsule specimens. The applicant responded with a detailed description of the capsule specimen preparation process to be incorporated into the next revision of the BLN COL FSAR. The applicant also stated that the capsule environment and the material types of the capsule specimens are addressed in AP1000 DCD, Section 5.3.2.6 which is incorporated by reference.

The staff finds that the response to RAI 5.3.1-1 is acceptable, provided that the BLN COL FSAR is revised as stated by the applicant, and that the applicant confirms the staff's understanding that the surveillance capsules are backfilled with inert gas. Therefore, the staff identifies Confirmatory Item 5.3-1 to confirm that the BLN COL FSAR is revised as stated, and to confirm the staff's understanding that the surveillance capsules are backfilled with inert gas.

SNC Response:

The surveillance capsules are backfilled with inert gas as indicated by the DCD Subsection 5.3.2.6 statements that the "program conforms to ASTM E-185" (since ASTM E-185 requires that the capsules be backfilled with inert gas) and the "complete capsule is helium leak tested." However, the FSAR will be revised for clarity as shown below in a future revision.

This response is expected to be STANDARD for the S-COLAs.

Associated VEGP COL Application Revisions:

COLA Part 2, FSAR, Chapter 5, Subsection 5.3.2.6 (as revised by the Supplement 2 response to BLN-RAI-LTR-002) will be revised from:

The type and quantity of test specimens exceed the minimum requirements of E185-82.

To read:

The type, quantity, and storage conditions (e.g., surveillance capsules backfilled with inert gas) of test specimens meet or exceed the minimum requirements of ASTM E-185.