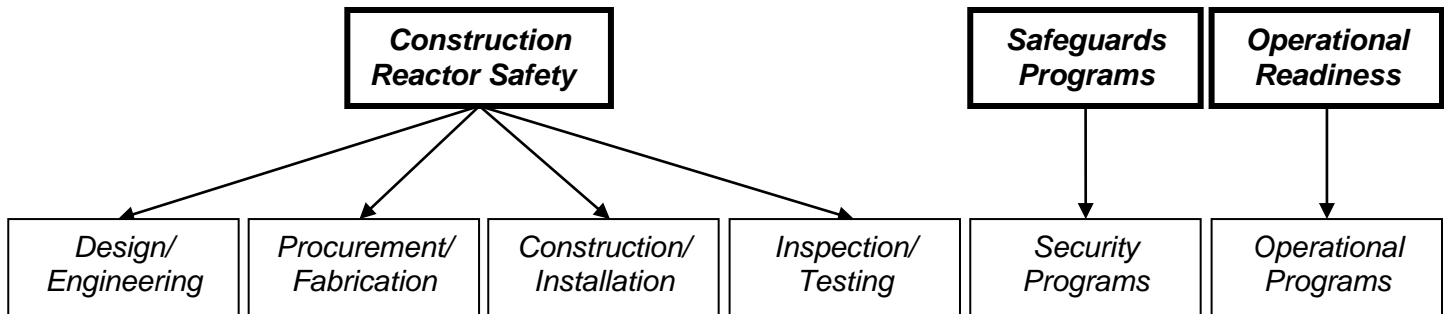


V.C. Summer Unit 2 4Q/2016 Performance Summary

[Construction Action Matrix Column:](#)
[Licensee Response](#)



Most Significant Inspection Findings

4Q/2016	G	No findings this quarter	No findings this quarter	G	No findings this quarter	No findings this quarter
3Q/2016	No findings this quarter	No findings this quarter	No findings this quarter	No findings this quarter	No findings this quarter	No findings this quarter
2Q/2016	G	No findings this quarter	No findings this quarter	No findings this quarter	No findings this quarter	G
1Q/2016	No findings this quarter	No findings this quarter	No findings this quarter	No findings this quarter	No findings this quarter	No findings this quarter

Additional Inspection and Assessment Information

- ❖ [List of Construction Inspection Reports](#)
- ❖ [List of Construction Assessment Reports/Inspection Plans](#)
- ❖ [V.C. Summer Unit 2 Findings Archive](#)

Design Engineering

Identified By: NRC

Identification Date: 12/31/2016

Significance: Green

Item Type: ITAAC Finding

Failure to Properly Translate Design Requirements

The inspectors identified an ITAAC finding of very low safety significance (Green) and associated non-cited violation (NCV) of Title 10 of the Code of Federal Regulations (10 CFR) Part 50, Appendix B, Criterion III, "Design Control" for South Carolina Electric & Gas Company's (SCE&G) failure through their contractor Westinghouse Electric Company (WEC) to adequately implement measures to assure that design inputs are correctly translated into design documents. The licensee entered this finding into their corrective action program as SCE&G Condition Report (CR) CR-NND-16-01990 and WEC Corrective Action, Prevention, and Learning (CAPAL) System Issue ID 100423100.

The finding was associated with the Design/Engineering Cornerstone. The finding was considered more than minor because the performance deficiency represented a substantive failure to adequately implement a quality assurance process that rendered the quality of an structure, system, or component (SSC) indeterminate. The inspectors evaluated the finding in accordance with IMC 2519, "Construction Significance Determination Process," and determined the finding was of very low safety significance because the licensee was able to demonstrate with reasonable assurance that the design function of the in-containment refueling water storage tank (IRWST) would not be impaired. The inspectors determined that the finding represented an ITAAC finding because it was material to the acceptance criteria of VCSNS Units 2 and 3 ITAAC 760, in that, if left uncorrected, the licensee may not have been able to demonstrate that the acceptance criteria of these ITAAC were met. The acceptance criteria of these ITAAC require that all deviations between the as-built structures and the approved designs be reconciled to verify that the as-built structures will withstand the design basis loads without a loss of structural integrity or other safety-related functions. The inspectors determined that the failure to adequately implement measures to assure that design inputs are correctly translated into design documents may have resulted in a deviation from the approved design that would not have been reconciled by the licensee. The inspectors determined the finding had a cross-cutting aspect in the Human Performance area because the detailed design documentation for the CA03 module did not provide evidence that the design was performed in accordance with quality assurance requirements, and that the IRWST would have performed satisfactorily in service. [H.7] (Section 1A18)

Identified By: NRC

Identification Date: 06/30/2016

Significance: Green

Item Type: ITAAC Finding

Failure to Properly Translate Design Requirements

The inspectors identified an ITAAC finding of very low safety significance (Green) and associated non-cited violation (NCV) of Title 10 of the Code of Federal Regulations (10 CFR) Part 50, Appendix B, Criterion III, "Design Control" for South Carolina Electric & Gas's (SCE&G) failure, through their contractor Westinghouse Electric Company (WEC), to correctly translate regulatory requirements into documents used for construction of the containment internal basemat. The licensee entered this finding into their corrective action program as condition report (CR) CR-NND-16-00817.

The finding was associated with the Design/Engineering Cornerstone. The finding was considered more than minor because the performance deficiency represented a substantive non-conservative error in a design document used for the installation of reinforcing steel in a section of containment internal basemat. The inspectors evaluated the finding in accordance with IMC 2519, "Construction Significance

Determination Process,” and determined the finding was of very low safety significance because there was reasonable assurance that the structure or the applicable portion of the structure would have been able to meet its design function. The inspectors determined that the finding represented an ITAAC finding because it was material to the acceptance criteria of SCE&G Unit 2 ITAAC 760, in that, the acceptance criteria of this ITAAC required that a reconciliation report, concluding the “as-built” construction conforms to the approved design is completed for the areas associated with the ITAAC. The deviations from the design requirements would not have been reconciled by the licensee as required by the ITAAC, because the Engineering, and Design Coordination Report (E&DCR) that was approved and released did not provide assurance that deviations from quality standards were controlled. The inspectors reviewed the finding for a possible cross-cutting aspect in accordance with IMC 0613 Appendix F, “Construction Cross-Cutting Areas and Aspects,” and determined the finding has a cross-cutting aspect in the Human Performance aspect of Work Management because the licensee did not adequately identify and manage risk commensurate to the work and did not adequately coordinate different groups or job activities. [H.5]

[Back to Top](#)

Procurement/Fabrication

[Back to Top](#)

Construction/Installation

[Back to Top](#)

Inspection/Testing

Identified By: NRC

Identification Date: 12/31/2016

Significance: Green

Item Type: ITAAC Finding

Failure to Provide Adequate Guidance to Quality Control Inspectors

The inspectors identified an ITAAC finding of very low safety significance (Green) and associated non-cited violation (NCV) of 10 CFR Part 50, Appendix B, Criterion V, “Instructions, Procedures, and Drawings,” for South Carolina Electric and Gas (licensee), through their contractor, Carolina Energy Services (contractor), failure to provide adequate guidance to quality control inspectors, resulting in an indeterminate quality of the machined ends of the reactor coolant loop piping. The licensee entered this issue into their corrective action program as Condition Report (CR)-NND-16-02095, and the EPC entered the issue into their corrective action program as Discrete Issue (DI) 100428204.

The finding was associated with the Inspection/Testing Cornerstone. The inspectors determined the performance deficiency was more than minor following the guidance in IMC 0613, “Power Reactor Construction Inspection Reports,” Appendix E, because it was similar to Example 7, which states, in part, that “Inspectors identified that a licensee’s procedure was not adequate. The Performance Deficiency is not minor if the procedure didn’t adequately implement technical or quality requirements leaving a quality process or construction activity unacceptable or indeterminate.” The inadequate procedure and subsequent inadequate inspection resulted in the quality of the reactor coolant loop piping to be indeterminate and required re-inspection following engineering evaluation and procedural changes.

The finding was evaluated under the construction significance determination process as outlined in IMC 2519, “Construction Significance Determination Process.” The inspectors determined the finding was of very low safety significance (Green) because the piping was re-inspected following the procedure changes, and the piping was determined to be satisfactory. The inspectors determined that this finding had a cross-cutting aspect in the area of Human Performance for training, because had the organization

ensured a knowledgeable, technically competent workforce, the inspection may have been of sufficient quality despite the inadequate procedure, or the quality control inspectors could have identified the inadequate procedure. [H.9] (Section 1A05)

[Back to Top](#)

Security Programs

[Back to Top](#)

Operational Programs

Identified By: NRC

Identification Date: 06/30/2016

Significance: Green

Item Type: Construction Finding

Two examples of a finding of very low safety significance (Green) and associated NCV of 10 CFR Part 50, Appendix B, Criterion V, "Instructions, Procedures, and Drawing," were identified by the inspectors for the licensee's failure to address and implement the requirements of American Society of Mechanical Engineers (ASME) Section XI, IWA-6211(e), IWA-6230, IWA-6240, and 10 CFR 50.55a in its program procedures. The licensee entered this finding into their corrective action program as CR-NND-16-00750 and CR-NND-16-00754.

The finding was associated with the Operational Readiness/Operational Programs cornerstone. The finding was considered more than minor because the performance deficiency represented a failure to adequately implement a quality process that rendered the quality process unacceptable or indeterminate. The inspectors evaluated the finding in accordance with IMC 2519, "Construction Significance Determination Process," and determined the finding was of very low safety significance because the finding did not omit a critical attribute of an operational program requirement. The inspectors screened the finding for a possible construction cross-cutting aspect in accordance with Appendix F, "Construction Cross-Cutting Components and Aspects" of IMC 0613. This finding has a cross-cutting aspect in the area of Human Performance (Documentation) because the licensee failed to maintain complete and accurate documentation with respect to the Preservice Inspection (PSI) program. [H.7]

[Back to Top](#)