



**UNITED STATES  
NUCLEAR REGULATORY COMMISSION**  
REGION II  
245 PEACHTREE CENTER AVENUE NE, SUITE 1200  
ATLANTA, GEORGIA 30303-1257

March 30, 2015

EA-14-158

Mr. Brian K. Taber  
Vice President  
Southern Nuclear Operating Company, Inc.  
Vogtle Electric Generating Plant  
7821 River Road  
Waynesboro, GA 30830

**SUBJECT: VOGTLE ELECTRIC GENERATING PLANT – FINAL SIGNIFICANCE  
DETERMINATION OF WHITE FINDING, NOTICE OF VIOLATION AND  
ASSESSMENT FOLLOWUP LETTER (INSPECTION REPORT NOS.  
05000424/2014-009 AND 05000425/2014-009)**

Dear Mr. Taber:

This letter provides you the final significance determination of the preliminary White finding discussed in the U.S. Nuclear Regulatory Commission (NRC) Inspection Report (IR) 05000424, 425/2014-009, dated January 22, 2015. The finding involved a Type B quantity of radioactive waste being shipped in a Type A cask by Southern Nuclear Operating Company (SNC), to the Energy Solutions radioactive waste processing facility located in Barnwell, South Carolina.

In a letter dated February 19, 2015, you provided a response to the NRC staff's preliminary determination regarding the finding. Your response indicated that SNC agrees with NRC on the facts regarding the finding, and that a performance deficiency occurred. You concluded, however, that there was very low additional public risk from this shipment, compared to a shipment of similar material with unshielded dose rates below the limits specified in Title 10 of the *Code of Federal Regulations* (10 CFR) 71.14. After reviewing the information you provided in the letter, considering the facts determined during the inspection and the NRC's method to assess significance for transportation findings, the NRC disagrees with your conclusion that this finding was of very low safety-significance.

The NRC and Department of Transportation (DOT) have established a tiered regulatory framework based, in part, on the amount of radioactive material being shipped and what level of hazard those materials would present to the public, including first responders, during a worst-case accident involving a package breach. Therefore, shipments containing high levels of radioactivity, such as Type B shipments, have more stringent requirements placed upon them. When those requirements are not met, such as the failure to use a tested and approved shipping container, the risk to the public is increased, and that increase is greater than it would be if the requirements for a lower-tier shipment were not met (e.g., shipment of a Type A quantity of radioactive material). Therefore, contrary to your assertion that the significance of this event was based on dose rates external to the package, the significance of this event was

based on the increased risk to the public due to the radiological hazard posed if this container had been involved in an accident during shipment. This was interpreted in our Reactor Oversight Process (ROP) Significance Determination Process (SDP) as being of "low to moderate safety-significance," (White) rather than "very low safety-significance" (Green). For your information, in 1985 the NRC determined that the 10-142A cask used for this shipment was no longer acceptable for use as a Type B package. This was due to concerns with the cask closure system's potential to fail under accident conditions.

After considering the information developed during the inspection, and the information you provided in your letter dated February 19, 2015, the NRC has concluded that the finding is appropriately characterized as White, or a finding of low to moderate safety-significance.

You have 30 calendar days from the date of this letter to appeal the staff's significance determination for the identified White finding. Such appeals will be considered to have merit only if they meet the criteria given in the Inspection Manual Chapter (IMC) 0609, Attachment 2. An appeal must be sent in writing to the Regional Administrator, Region II, 245 Peachtree Center Avenue NE, Suite 1200, Atlanta, Georgia 30303-1257.

The NRC has also determined that your failure to maintain records used for the shipment of radioactive resins is a violation of Vogtle Electric Generating Plant TS 5.4.1, Procedures, and the failure to use a Type B shipping container is a violation of 10 CFR 71.14, as cited in the enclosed Notice of Violation (Notice). The circumstances surrounding the violation were described in detail in the subject IR. In accordance with the NRC Enforcement Policy, the Notice is considered escalated enforcement action because it is associated with a White finding.

You are required to respond to this letter, and should follow the instructions specified in the enclosed Notice when preparing your response. If you have additional information that you believe the NRC should consider, you may provide it in your response to the Notice. The NRC review of your response to the Notice will also determine whether further enforcement action is necessary to ensure compliance with regulatory requirements.

The NRC has determined the performance at Vogtle Units 1 and 2 to be in the Regulatory Response Column of the ROP Action Matrix beginning 3<sup>rd</sup> quarter of 2014. Therefore, the NRC plans to conduct a supplemental inspection in accordance with Inspection Procedure (IP) 95001, "Supplemental Inspection for One or Two White Inputs in a Strategic Performance Area," when you have notified us of your readiness. This IP is conducted to provide assurance that the root and contributing causes for the performance issues are understood; to provide assurance that the extent of condition and extent of cause of the performance issues are understood; and to provide assurance that the corrective actions are sufficient to address the root and contributing causes and prevent recurrence. This letter supplements, but does not supersede, the annual assessment letter issued on March 4, 2015.

In accordance with 10 CFR 2.390, "Public inspections, exemptions, requests for withholding." of the NRC's "Agency Rules of Practice and Procedure," a copy of this letter, its Enclosure and your response, will be made available electronically for public inspection in the NRC Public Document Room, or from the NRC's Agencywide Documents Access and Management System (ADAMS); accessible from the NRC Web site at <http://www.nrc.gov/reading-rm/adams.html>.

B. Taber

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To the extent possible, your response should not include any personal privacy, proprietary, or safeguards information, so that it can be made available to the public without redaction.

Sincerely,

*/RA/*

Victor M. McCree  
Regional Administrator

Docket Nos. 50-424 and 50-425  
License Nos. NPF-68 and NPF-81

Enclosure:  
Notice of Violation

cc: Distribution via Listserv

To the extent possible, your response should not include any personal privacy, proprietary, or safeguards information, so that it can be made available to the public without redaction.

Sincerely,

*/RA/*

Victor M. McCree  
Regional Administrator

Docket Nos. 50-424 and 50-425  
License Nos. NPF-68 and NPF-81

Enclosure:  
Notice of Violation

cc: Distribution via Listserv

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ADAMS:  Yes ACCESSION NUMBER: ML15089A503     SUNSI REVIEW COMPLETE     FORM 665 ATTACHED

OFFICE	RII:DRS/PSB1	RII:DRS/PSB1	RII:DRS/PSB1	RII:DRS/PSB1	RII:DRS	RII:DRP	RII:EICS
SIGNATURE	WSP1	CMD4	ADN	BRB1	ATG	JTM	DLG2
NAME	W. Pursley	C. Dykes	A. Nielsen	B. Bonser	A. Gody	J. Munday	D. Gamberoni
DATE	3/ 5 /2015	3/ 5 /2015	3/ 5 /2015	3/ 5 /2015	3/ 9 /2015	3/ 9 /2015	3/ 10 /2015
E-MAIL COPY	YES NO	YES NO	YES NO	YES NO	YES NO	YES NO	YES NO

OFFICE	RII:ORA/RC	OE	NRR	RII:DORA	RII:ORA		
SIGNATURE	SAP1	TJM7 via e-mail	LRC1 via e-mail	LXW1	VMM		
NAME	S. Price	T. Marenchin	L. Casey	L. Wert	V. McCree		
DATE	3/ 5 /2015	3/ 24 /2015	3/ 24 /2015	3/ 27 /2015	3/ 30 /2015		
E-MAIL COPY	YES NO	YES NO	YES NO	YES NO	YES NO		

## NOTICE OF VIOLATION

Southern Nuclear Operating Company, Inc.  
Vogtle Electric Generating Plant

Docket Nos. 50-424 and 50-425  
License Nos. NPF-68 and NPF-81  
EA-14-158

During an NRC inspection completed on December 12, 2014, a violation of NRC requirements was identified. In accordance with the NRC Enforcement Policy, the violation is listed below.

Vogtle Electric Generating Plant TS 5.4.1, Procedures, requires written procedures as recommended by Regulatory Guide 1.33.

Regulatory Guide 1.33, Appendix A, Section 7, recommends in part, procedures for control of radioactive material to minimize potential releases of materials to the environment, and personnel exposure from spent resin and filter sludge handling.

Procedure 46111-C, "Storage of Radwaste in Outdoor Process Shields," requires the licensee to maintain records of resin in high integrity containers (HIC) being stored on the storage pad, including specific information describing the contents of each HIC and the process shield number.

10 CFR 71.14 states in part, a licensee is exempt from the Type B packaging requirements, provided that the package contains Low Specific Activity (LSA), and that the external radiation dose rate is less than or equal to 10 mSv/h (1 rem/h), at a distance of 3 meters from the unshielded material.

Contrary to the above, from June 19, 2012, to June 24, 2014, the licensee failed to maintain records of resin in HICs being stored on the storage pad, including specific information describing the contents and process shield number. Specifically, information regarding the location and contents of the HICs was not updated when the contents of process shield #10 were changed. As a result, on June 24, 2014, the licensee used a Type A container to ship radioactive waste that exceeded a Type A quantity. Additionally, the HIC from process shield #10 had an external radiation dose rate that exceeded 10 mSv/h (1 rem/h) at 3 meters from the unshielded material, and therefore did not meet the requirements to be exempted from Type B packaging.

This violation is associated with a White significance determination process (SDP) finding.

Pursuant to the provisions of 10 CFR 2.201, Southern Nuclear Operating Company, Inc. is hereby required to submit a written statement or explanation to the U.S. Nuclear Regulatory Commission, ATTN: Document Control Desk, Washington, DC 20555-0001; with a copy to the Regional Administrator, Region II, and the NRC Resident Inspector at the Vogtle Electric Generating Plant, within 30 days of the date of the letter transmitting this Notice of Violation (Notice). This reply should be clearly marked as a "Reply to a Notice of Violation; EA-14-158" and should include, for each violation: (1) the reason for the violation, or if contested, the basis for disputing the violation or severity level; (2) the corrective steps that have been taken and the results achieved; (3) the corrective steps that will be taken; and (4) the date when full compliance will be achieved. Your response may reference or include previous docketed

Enclosure

correspondence, if the correspondence adequately addresses the required response. If an adequate reply is not received within the time specified in this Notice, an Order, or a Demand for Information, may be issued as to why the license should not be modified, suspended, or revoked; or why such other action as may be proper should not be taken. Where good cause is shown, consideration will be given to extending the response time.

If you contest this enforcement action, you should also provide a copy of your response, with the basis for your denial, to the Director, Office of Enforcement, United States Nuclear Regulatory Commission, Washington DC 20555-0001.

Because your response will be made publicly available in the NRC Public Document Room, or from the NRC's ADAMS, (accessible from the NRC Web site at <http://www.nrc.gov/reading-rm/adams.html>), to the extent possible, it should not include any personal privacy, proprietary, or safeguards information so that it can be available without redaction. If personal privacy or proprietary information is necessary to provide an acceptable response, then please provide a bracketed copy of your response that identifies the information that should be protected, and a copy of your response that deletes such information. If you request withholding of such material, you must specifically identify the portions of your response that you seek to have withheld, and provide in detail the bases for your claim of withholding (e.g., explain why the disclosure of information will create an unwarranted invasion of personal privacy, or provide the information required by 10 CFR 2.390(b) to support a request for withholding confidential commercial or financial information). If safeguards information is necessary to provide an acceptable response, please provide the level of protection described in 10 CFR 73.21.

In accordance with 10 CFR 19.11, you may be required to post this Notice within 2 working days of receipt.

Dated this 30<sup>th</sup> day of March 2015.