



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

March 2, 2016

Mr. George A. Lippard  
Vice President - Nuclear Operations  
South Carolina Electric & Gas Company  
Virgil C. Summer Nuclear Station  
P.O. Box 88  
Jenkinsville, SC 29065

**SUBJECT: ANNUAL ASSESSMENT LETTER FOR VIRGIL C. SUMMER NUCLEAR  
STATION, UNIT 1 – NRC INSPECTION REPORT 05000395/2015006**

Dear Mr. Lippard:

On February 11, 2016, the Nuclear Regulatory Commission (NRC) completed its end-of-cycle performance review of Virgil C. Summer Nuclear Station, Unit 1. The NRC reviewed the most recent quarterly performance indicators (PIs) in addition to inspection results and enforcement actions from January 1 through December 31, 2015. This letter informs you of the NRC's assessment of your facility during this period and its plans for future inspections at your facility.

The NRC determined that overall, Virgil C. Summer Nuclear Station, Unit 1 operated in a manner that preserved public health and safety and met all cornerstone objectives. The NRC determined the performance at Virgil C. Summer Nuclear Station, Unit 1 during the most recent quarter was within the Licensee Response Column of the NRC's Reactor Oversight Process (ROP) Action Matrix because all inspection findings had very low (i.e., green) safety significance, and all PIs indicated that your performance was within the nominal, expected range (i.e., green). Therefore, the NRC plans to conduct ROP baseline inspections at your facility.

The enclosed inspection plan lists the inspections scheduled through December 31, 2017. Routine inspections performed by resident inspectors are not included in the inspection plan. The inspections listed during the last nine months of the inspection plan are tentative and may be revised at the mid-cycle performance review. The NRC provides the inspection plan to allow for the resolution of any scheduling conflicts and personnel availability issues. The NRC will contact you as soon as possible to discuss changes to the inspection plan should circumstances warrant any changes. This inspection plan does not include security related inspections, which will be sent via separate, non-publicly available correspondence.

Additionally, the NRC plans on conducting three non-ROP baseline inspections, which include two Operating License Initial Examinations and an Independent Spent Fuel Storage Installation Dry Runs and Initial Loading.

In response to the accident at Fukushima, the Commission issued Order EA-12-049, "Order Modifying Licenses with Regard to Requirements for Mitigation Strategies for Beyond-Design-Basis External Events." This Order requires licensees to develop, implement, and maintain guidance and strategies to maintain or restore core cooling, containment, and spent fuel pool cooling capabilities following a beyond-design-basis external event. Additionally, the Commission issued Order EA-12-051, "Order Modifying Licenses with Regard to Reliable Spent Fuel Pool Instrumentation." This Order requires licensees to have a reliable means of remotely monitoring wide-range Spent Fuel Pool levels to support effective prioritization of event mitigation and recovery actions in the event of a beyond-design-basis external event. The NRC is conducting audits of licensee efforts towards compliance with these Orders. The audit was completed for Virgil C. Summer Nuclear Station, Unit 1, and the information gathered will aid staff in development of the Safety Evaluation for the site. After the NRC staff receives the Final Compliance letter for the site, the Final Safety Evaluation will be issued. Then, the NRC staff will confirm through inspections the full implementation of the orders mentioned above by performing TI 191, "Inspection of the Implementation of Mitigation Strategies and Spent Fuel Pool Instrumentation Orders and Emergency Preparedness Communication/Staffing/Multi-Unit Dose Assessment Plans."

In accordance with 10 CFR 2.390 of the NRC's "Rules of Practice," a copy of this letter and its enclosure will be available electronically for public inspection in the NRC Public Document Room or from the Publicly Available Records (PARS) component of NRC's Agencywide Document Access and Management System (ADAMS). ADAMS is accessible from the NRC Web site at <http://www.nrc.gov/reading-rm/adams.html> (the Public Electronic Reading Room).

Please contact me at 404-997-4609 with any questions you may have regarding this letter.

Sincerely,

*/RA/*

Steven D. Rose, Chief  
Reactor Projects Branch 5  
Division of Reactor Projects

Docket No.: 50-395  
License No.: NPF-12

Enclosure:  
Virgil C. Summer Inspection/Activity Plan  
(03/01/2016 – 12/31/2017)

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In response to the accident at Fukushima, the Commission issued Order EA-12-049, "Order Modifying Licenses with Regard to Requirements for Mitigation Strategies for Beyond-Design-Basis External Events." This Order requires licensees to develop, implement, and maintain guidance and strategies to maintain or restore core cooling, containment, and spent fuel pool cooling capabilities following a beyond-design-basis external event. Additionally, the Commission issued Order EA-12-051, "Order Modifying Licenses with Regard to Reliable Spent Fuel Pool Instrumentation." This Order requires licensees to have a reliable means of remotely monitoring wide-range Spent Fuel Pool levels to support effective prioritization of event mitigation and recovery actions in the event of a beyond-design-basis external event. The NRC is conducting audits of licensee efforts towards compliance with these Orders. The audit was completed for Virgil C. Summer Nuclear Station, Unit 1, and the information gathered will aid staff in development of the ultimate Safety Evaluation for the site. After the NRC staff receives the Final Compliance letter for the site, the Final Safety Evaluation will be issued. Then, the NRC staff will confirm through inspections the full implementation of the orders mentioned above by performing TI 191, "Inspection of the Implementation of Mitigation Strategies and Spent Fuel Pool Instrumentation Orders and Emergency Preparedness Communication/Staffing/Multi-Unit Dose Assessment Plans."

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PUBLICLY AVAILABLE       NON-PUBLICLY AVAILABLE       SENSITIVE       NON-SENSITIVE  
 ADAMS:  Yes      ACCESSION NUMBER: ML16062A270       SUNSI REVIEW COMPLETE       FORM 665 ATTACHED

OFFICE	DRP:RII	DRP:RII	DRP:RII				
SIGNATURE	BDB3	SON	SDR2				
NAME	B. Bishop	S. Ninh	S. Rose				
DATE	2/22/2016	2/21/2016	2/29/2016				
E-MAIL COPY?	YES NO	YES NO	<u>YES</u> NO	YES NO	YES NO	YES NO	YES NO

G. Lippard

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Letter to George A. Lippard from Steven D. Rose dated March 2, 2016

SUBJECT: ANNUAL ASSESSMENT LETTER FOR VIRGIL C. SUMMER NUCLEAR  
STATION, UNIT 1 – NRC INSPECTION REPORT 05000395/2015006

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Institute of Nuclear Power Operations (INPO)

**Summer**  
**Inspection / Activity Plan**  
**03/01/2016 - 12/31/2017**

Unit Number	Planned Dates		Inspection Activity	Title	No. of Staff on Site
	Start	End			
			<b>ISFSI</b>	<b>- ISFSI DRY RUNS AND INITIAL LOADING</b>	<b>6</b>
1	01/25/2016	03/04/2016	IP 60854	Preoperational Testing Of An ISFSI	
1	03/15/2016	03/18/2016	IP 60854	Preoperational Testing Of An ISFSI	
1	03/21/2016	04/04/2016	IP 60855.1	Operation of an Independent Spent Fuel Storage Installation at Operating Plants	
			<b>OL EXAM</b>	<b>- INITIAL LICENSE EXAM PREP</b>	<b>3</b>
1	05/09/2016	05/13/2016	V23471	SUMMER U1/JUNE 2016 INITIAL EXAM AT POWER FACILITIES	
			<b>OL EXAM</b>	<b>- INITIAL LICENSE EXAM</b>	<b>3</b>
1	06/06/2016	06/10/2016	V23471	SUMMER U1/JUNE 2016 INITIAL EXAM AT POWER FACILITIES	
			<b>HS</b>	<b>- TRIENNIAL HEAT SINK PERFORMANCE</b>	<b>1</b>
1	06/20/2016	06/24/2016	IP 7111107T	Heat Sink Performance	
			<b>RP</b>	<b>- RP PUBLIC RAD SAFETY BASELINE</b>	<b>4</b>
1	07/18/2016	07/22/2016	IP 71124.01	Radiological Hazard Assessment and Exposure Controls	
1	07/18/2016	07/22/2016	IP 71124.06	Radioactive Gaseous and Liquid Effluent Treatment	
1	07/18/2016	07/22/2016	IP 71124.07	Radiological Environmental Monitoring Program	
1	07/18/2016	07/22/2016	IP 71124.08	Radioactive Solid Waste Processing and Radioactive Material Handling, Storage, and Transportation	
1	07/18/2016	07/22/2016	IP 71151	Performance Indicator Verification	
			<b>PI&amp;R</b>	<b>- PROBLEM IDENTIFICATION AND RESOLUTION</b>	<b>7</b>
1	08/29/2016	09/02/2016	IP 71152B	Problem Identification and Resolution	
1	09/12/2016	09/16/2016	IP 71152B	Problem Identification and Resolution	
			<b>TFPI</b>	<b>- TRIENNIAL FIRE PROTECTION INSPECTION</b>	<b>9</b>
1	10/03/2016	10/07/2016	IP 7111105X	Fire Protection - NFPA 805 (Triennial)	
1	10/17/2016	10/21/2016	IP 7111105X	Fire Protection - NFPA 805 (Triennial)	
			<b>EP</b>	<b>- EP PROGRAM INSPECTION</b>	<b>6</b>
1	09/26/2016	09/30/2016	IP 7111402	Alert and Notification System Testing	
1	09/26/2016	09/30/2016	IP 7111403	Emergency Preparedness Organization Staffing and Augmentation System	
1	09/26/2016	09/30/2016	IP 7111404	Emergency Action Level and Emergency Plan Changes	
1	09/26/2016	09/30/2016	IP 7111405	Correction of Emergency Preparedness Weaknesses and Deficiencies	
1	09/26/2016	09/30/2016	IP 71151	Performance Indicator Verification	
			<b>MODS</b>	<b>- PLANT MODIFICATIONS INSPECTION</b>	<b>3</b>
1	11/14/2016	11/18/2016	IP 7111117T	Evaluations of Changes, Tests, and Experiments and Permanent Plant Modifications	
1	12/05/2016	12/09/2016	IP 7111117T	Evaluations of Changes, Tests, and Experiments and Permanent Plant Modifications	
			<b>ISI</b>	<b>- UNIT 1 IN-SERVICE INSPECTION &amp; RVH EXAM</b>	<b>2</b>
1	04/17/2017	04/21/2017	IP 7111108P	Inservice Inspection Activities - PWR	

This report does not include INPO and OUTAGE activities.  
This report shows only on-site and announced inspection procedures.

**Summer**  
**Inspection / Activity Plan**  
**03/01/2016 - 12/31/2017**

Unit Number	Planned Dates		Inspection Activity	Title	No. of Staff on Site
	Start	End			
<b>RP - RP OCCUPATIONAL INSPECTION WEEK 1</b>					<b>3</b>
1	04/24/2017	04/28/2017	IP 71124.01	Radiological Hazard Assessment and Exposure Controls	
1	04/24/2017	04/28/2017	IP 71124.02	Occupational ALARA Planning and Controls	
1	04/24/2017	04/28/2017	IP 71124.03	In-Plant Airborne Radioactivity Control and Mitigation	
1	04/24/2017	04/28/2017	IP 71124.04	Occupational Dose Assessment	
1	04/24/2017	04/28/2017	IP 71124.05	Radiation Monitoring Instrumentation	
1	04/24/2017	04/28/2017	IP 71151	Performance Indicator Verification	
<b>SGISI - UNIT 1 SG IN-SERVICE INSPECTION</b>					<b>1</b>
1	04/24/2017	04/28/2017	IP 7111108P	Inservice Inspection Activities - PWR	
<b>RP - RP OCCUPATIONAL INSPECTION WEEK 2</b>					<b>2</b>
1	05/22/2017	05/26/2017	IP 71124.01	Radiological Hazard Assessment and Exposure Controls	
1	05/22/2017	05/26/2017	IP 71124.02	Occupational ALARA Planning and Controls	
1	05/22/2017	05/26/2017	IP 71124.03	In-Plant Airborne Radioactivity Control and Mitigation	
1	05/22/2017	05/26/2017	IP 71124.04	Occupational Dose Assessment	
1	05/22/2017	05/26/2017	IP 71124.05	Radiation Monitoring Instrumentation	
1	05/22/2017	05/26/2017	IP 71151	Performance Indicator Verification	
<b>OL RQ - REQUAL INSPECTION</b>					<b>2</b>
1	08/14/2017	08/18/2017	IP 7111111B	Licensed Operator Requalification Program	
<b>OL EXAM - INITIAL LICENSE EXAM PREP</b>					<b>3</b>
1	08/28/2017	09/01/2017	V23499	SUMMER U1/SEPTEMBER 2017 INITIAL EXAM AT POWER FACILLITIES	
<b>OL EXAM - INITIAL LICENSE EXAM</b>					<b>3</b>
1	09/25/2017	09/29/2017	V23499	SUMMER U1/SEPTEMBER 2017 INITIAL EXAM AT POWER FACILLITIES	
<b>CDBI - COMPONENT DESIGN BASIS INSPECTION</b>					<b>7</b>
1	09/25/2017	09/29/2017	IP 7111121	Component Design Bases Inspection	
1	10/16/2017	10/20/2017	IP 7111121	Component Design Bases Inspection	
1	10/30/2017	11/03/2017	IP 7111121	Component Design Bases Inspection	
1	11/13/2017	11/17/2017	IP 7111121	Component Design Bases Inspection	
<b>EP - EP EXERCISE INSPECTION</b>					<b>3</b>
1	10/30/2017	11/03/2017	IP 7111401	Exercise Evaluation	
1	10/30/2017	11/03/2017	IP 7111404	Emergency Action Level and Emergency Plan Changes	
1	10/30/2017	11/03/2017	IP 7111408	Exercise Evaluation – Scenario Review	
1	10/30/2017	11/03/2017	IP 71151	Performance Indicator Verification	

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