



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

March 4, 2011

Carolina Power and Light Company
Mr. Christopher L. Burton
Vice President
Shearon Harris Nuclear Power Plant
P. O. Box 165, Mail Code: Zone 1
New Hill, North Carolina 27562-0165

SUBJECT: ANNUAL ASSESSMENT LETTER - SHEARON HARRIS NUCLEAR POWER
PLANT (REPORT 05000400/2011001)

Dear Mr. Burton:

On February 9, 2011, the NRC staff completed its end-of-cycle performance review of the Shearon Harris Power Plant. The NRC reviewed the most recent quarterly performance indicators (PIs) in addition to inspection results and enforcement actions from January 1, 2010 through December 31, 2010. This letter informs you of the NRC's assessment of your facility during this period and its plans for future inspections at your facility. This performance review and enclosed inspection plan do not include security information. A separate letter will include NRC's assessment of your performance in the Security Cornerstone and its security-related inspection plan.

The NRC determined that overall, Shearon Harris operated in a manner that preserved public health and safety and met all cornerstone objectives. The NRC determined the performance at Shearon Harris during the most recent quarter was within the Licensee Response Column of the NRC's Reactor Oversight (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 details the inspections scheduled through June 30, 2012. Routine inspections performed by resident inspectors are not included in the inspection plan. The inspections listed in 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.

We also plan on conducting several infrequently performed inspections which include: initial operator licensing examinations and TI 2515/177, "Managing Gas Accumulation in Emergency Core Cooling, Decay Heat Removal, and Containment Spray System."

CPL

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In accordance with 10 CFR 2.390 of the NRC's "Rules of Practice," a copy of this letter and its enclosure will be made available electronically for public inspection in the NRC Public Document Room or from the Publicly Available Records (PARS) component of NRC's document 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) 997-4603 with any questions you may have regarding this letter.

Sincerely,

/RA/

Randall A. Musser, Chief
Reactor Projects Branch 4
Division of Reactor Projects

Docket No.: 50-400

License No.: NPF-63

Enclosure: Harris Inspection/Activity Plan

cc w/encl.: (See page 3)

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Unit Number	Planned Dates Start	Planned Dates End	Inspection Activity	Title	No. of Staff on Site
1	02/28/2011	03/03/2011	CDBI	- COMPONENT DESIGN BASES INSPECTION	7
			IP 7111121	Component Design Bases Inspection	
1	03/21/2011	03/25/2011	IP 7111121	Component Design Bases Inspection	
1	04/04/2011	04/08/2011	IP 7111121	Component Design Bases Inspection	
1	04/18/2011	04/22/2011	IP 7111121	Component Design Bases Inspection	
			OL RQ	- REQUAL INSPECTION	3
			IP 7111111B	Licensed Operator Requalification Program	
			EB1/DRS	- TI-177 GAS ACCUMULATION	3
			IP 2515/177	Managing Gas Accumulation In Emergency Core Cooling, Decay Heat Removal & Containment Spray System	
			PSB1EP	- EMERGENCY PREPAREDNESS EXERCISE	2
			IP 7111401	Exercise Evaluation	
			IP 7111404	Emergency Action Level and Emergency Plan Changes	
			IP 71151	Performance Indicator Verification	
			OL EXAM	- INITIAL EXAM PREP	4
			V23352	HARRIS/JULY 2011 EXAM AT POWER FACILITIES	
			OL EXAM	- INITIAL EXAM - WEEK 1	4
			V23352	HARRIS/JULY 2011 EXAM AT POWER FACILITIES	
			PI&R	- PROBLEM IDENTIFICATION AND RESOLUTION	5
			IP 71152B	Identification and Resolution of Problems	
			IP 71152B	Identification and Resolution of Problems	
			OL EXAM	- INITIAL EXAM - WEEK 2	4
			V23352	HARRIS/JULY 2011 EXAM AT POWER FACILITIES	
			PSB1-RP	- RP PUBLIC RADIATION PROTECTION INSP	6
			IP 71124.01	Radiological Hazard Assessment and Exposure Controls	
			IP 71124.03	In-Plant Airborne Radioactivity Control and Mitigation	
			IP 71124.04	Occupational Dose Assessment	
			IP 71124.05	Radiation Monitoring Instrumentation	
			IP 71124.06	Radioactive Gaseous and Liquid Effluent Treatment	
			IP 71124.07	Radiological Environmental Monitoring Program	
			IP 71151	Performance Indicator Verification	
			TFPI	- 805 TFPI	7
			IP 7111105P	Fire Protection-NFPA 805 Transition Period [Triennial]	
			IP 7111105P	Fire Protection-NFPA 805 Transition Period [Triennial]	
			OL EXAM	- INITIAL EXAM PREP	3
			V23367	HARRIS / FEBRUARY 2012 EXAM AT POWER FACILITIES	

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

Unit Number	Planned Dates Start	Planned Dates End	Inspection Activity	Title	No. of Staff on Site
1	02/13/2012	02/17/2012	OL EXAM - INITIAL EXAM - WEEK 1 V23367	HARRIS / FEBRUARY 2012 EXAM AT POWER FACILITIES	3
1	02/20/2012	02/24/2012	OL EXAM - INITIAL EXAM - WEEK 2 V23367	HARRIS / FEBRUARY 2012 EXAM AT POWER FACILITIES	3
1	04/30/2012	05/04/2012	EB3 ISI - UNIT 1 INSERVICE INSPECTION IP 7111108P	Inservice Inspection Activities - PWR	1
1	04/30/2012	05/04/2012	PSB1-RP - OCCUPATIONAL RP BASELINE WK1 IP 71124.01	Radiological Hazard Assessment and Exposure Controls	4
1	04/30/2012	05/04/2012	IP 71124.02	Occupational ALARA Planning and Controls	
1	04/30/2012	05/04/2012	IP 71124.03	In-Plant Airborne Radioactivity Control and Mitigation	
1	04/30/2012	05/04/2012	IP 71124.04	Occupational Dose Assessment	
1	04/30/2012	05/04/2012	IP 71151	Performance Indicator Verification	
1	05/14/2012	05/18/2012	PSB1-RP - OCCUPATIONAL RP BASELINE WK2 IP 71124.01	Radiological Hazard Assessment and Exposure Controls	4
1	05/14/2012	05/18/2012	IP 71124.02	Occupational ALARA Planning and Controls	
1	05/14/2012	05/18/2012	IP 71124.03	In-Plant Airborne Radioactivity Control and Mitigation	
1	05/14/2012	05/18/2012	IP 71124.04	Occupational Dose Assessment	
1	05/14/2012	05/18/2012	IP 71151	Performance Indicator Verification	