



UNITED STATES
NUCLEAR REGULATORY COMMISSION
REGION II
101 MARIETTA ST., N.W., SUITE 3100
ATLANTA, GEORGIA 30303

Report Nos. 50-324/82-31 and 50-325/82-29

Licensee: Carolina Power and Light Company
411 Fayetteville Street
Raleigh, NC 27602

Facility Name: Brunswick

Docket Nos. 50-324 and 50-325

License Nos. DPR-62 and DPR-71

Inspection at Brunswick site near Southport, NC

Inspector: R. H. Albright 8-31-82
R. H. Albright Date Signed

Approved by: K. P. Barr 8/31/82
K. P. Barr, Section Chief Date Signed
Technical Inspection Branch
Division of Engineering and Technical Programs

SUMMARY

Inspection on August 9-13, 1982

Areas Inspected

This routine, unannounced inspection involved 34 inspector-hours on site in the areas of ALARA, radioactive material transportation, radioactive liquid effluent monitoring and radioactive material control.

Results

Of the four areas inspected, no violations or deviations were identified.

REPORT DETAILS

1. Persons Contacted

Licensee Employees

C. D. Dietz, General Manager
*G. J. Oliver, Manager, Environmental and Radiation Control
*R. M. Poulk, Regulatory Specialist
L. F. Tripp, Radiation Control Supervisor
R. F. Queener, Project Specialist, Radiation Control
J. B. Cook, RC&T Foreman
T. Priest, RC&T Foreman
K. Robertson, Environmental and Chemistry Supervisor
M. Millinor, E&C Foreman
W. Nurnberger, E&C Foreman
J. Kaham, E&C Foreman

NRC Resident Inspectors

D. Meyers, Senior Resident Inspector
L. Garner, Resident Inspector

*Attended exit interview

2. Exit Interview

The inspection scope and findings were summarized on August 13, 1982, with those persons indicated in paragraph 1 above.

3. Licensee Action on Previous Enforcement Matters

Not inspected.

4. Unresolved Items

Unresolved items were not identified during this inspection.

5. Licensee Action On Previous Inspector Followup Item

(Closed) (80-45-06) This item concerned the need to provide systems training for the HP staff. This training has begun and is continuing. Approximately 50 percent of the HP staff has completed the training. The inspector had no further questions.

(Closed) (80-45-08) This item concerned the need for the plant to spike TLDs to a known exposure and then have the TLD read by the dosimetry section at the Harris Energy and Environmental Center. TLDs are now read at the plant and the HEEC provides spiked TLDs for the QA check. The inspector had no further questions.

(Closed) (80-45-11) This item concerned the calibration of the whole body counter. The inspector reviewed a recent calibration report on the whole body counter. All the information necessary to evaluate the calibration was contained in the report. The inspector had no further questions.

(Closed) (80-45-15) This item concerned the need to establish guidelines for when direct bioassay, excreta analysis, would be performed. The licensee has established the guidelines and goals for excreta sampling. The inspector had no further questions.

(Closed) (80-45-16) This item concerned the licensee's failure to recognize and perform the actions required by 10 CFR 20.103(b)(2) for an individual. The licensee now requires, by procedure, that for any body burden greater than 10 percent the technician is to contact his supervisor. The licensee also requires a whole body count for all personnel terminating work at the plant. The inspector had no further questions.

(Closed) (80-45-24) This item concerned the low sensitivity of the installed portal monitors. The licensee now has hand and foot counters and the high sensitivity scintillation type portal monitors at the exit of the protected area. These monitors appear to be sufficient when used in conjunction with current frisking practices at the plant.

(Closed) (80-45-36) This item concerned the need for additional beta dose rate instruments. The inspector reviewed the current inventory of instruments which may be used for beta dose rate measurement and determined that it was adequate.

(Closed) (80-45-38) This item concerned the licensee's need for a beta calibration source in order to calibrate instruments to beta radiation. The licensee has a beta source and uses it to determine beta correction factors for instruments. The inspector had no further questions.

6. ALARA

The inspector discussed the pre-planning and preparation for the current Unit 2 outage with personnel in the plant ALARA group. From this discussion and review of documentation it was evident that substantial effort had been expended in this area by the ALARA group. The ALARA program appears to have started expanding prior to this outage and has gained experience and documentation for improvements for future outages. With continued management support this program should be successful in reducing plant man-rem totals.

7. Radioactive Material Control

The licensee appears to have adequate control over materials leaving the radiation control area. The licensee has friskers located at the portals for personnel to use to frisk personal items being removed from the radiation control area. To ensure that personnel use the proper techniques when frisking themselves or personal items, the licensee has stationed trained personnel at the frisker and portal monitor stations. For other material, equipment or vehicles leaving the protected area, surveys by a HP technician are required.

No violations or deviations were found.

8. Radioactive Material Transportation

The inspector reviewed the radioactive material transportation program by discussion with health physics personnel who have been assigned responsibility in this area, review of procedures and documentation for each shipment. The inspector also observed the loading and preparation of a cask for shipment.

The following documents and procedures were reviewed:

- a. Procedure RC&T - 0510.
- b. Copies of licenses for those licensees to whom radioactive material was shipped.
- c. Certificates of compliance for certified containers used by the licensee.
- d. Letters from the NRC which authorize the licensee to use certified containers.
- e. Selectively reviewed shipping documents for July - August, 1982 shipments.

The inspector conducted an independent radiation survey on the cask shipment and on a waste shipment of 55 gallon drums. The inspector also checked the cask and drums for the required marking and labeling. Vehicle placards were also checked.

No violations or deviations were observed.

9. Radioactive Liquid Effluent Monitoring

Liquid Effluent Releases

The inspector selectively reviewed data for individual releases during August 1982 and reports for 1982. The inspector determined from the liquid effluent release data that monitor response is correlated to the actual effluent stream. Records for the total activity released and analysis for specific radionuclides were also reviewed.

No violations or deviations were identified.