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

Report Nos. 50-325/79-44 and 50-324/79-40

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

Facility: Brunswick 1 & 2

Docket Nos. 50-325 and 50-324

License Nos. DPR-71 and DPR-62

Inspection at: Brunswick Site near Southport, North Carolina

Inspector: J. E. Ouzts — Date Signed 1/24/80

Approved by: P. J. Kellogg, Section Chief, RONS Branch — Date Signed 1/24/80

SUMMARY

Inspected on December 1-14, 1979

Areas Inspected

This routine, announced inspection involved 41 inspector-hours onsite in the areas of plant operations, plant tours, radiation protection, quality assurance, organization and administration and followup of abnormal events.

Unit 1 Areas Inspected:

This routine and reactive inspection by the resident inspector involved 21 manhours of inspection time onsite in the areas identified above.

Unit 1 Findings:

Of the six areas inspected no items of noncompliance or deviations were identified.

Unit 2 Areas Inspected:

This routine inspection by the resident inspector involved 20 manhours of inspection in the first five areas identified above.

Unit 2 Findings:

Of the five areas inspected no apparent items of noncompliance or deviations were identified.

DETAILS

1. Persons Contacted

Licensee Employees

A. C. Tollison, Plant General Manager
J. M. Brown, Operations Manager
G. T. Milligan, Maintenance Manager

Other licensee employees contacted included 2 technicians, 8 operators, 4 security force members, and 2 office personnel.

Other Organizations

Held news conference along with the RII Public Information Officer and representatives of Wilmington, North Carolina and Brunswick County, North Carolina news media.

2. Exit Interview

The inspection scope and findings were summarized on December 7, and 14, 1979, with those persons indicated in Paragraph 1 above.

3. Licensee Action on Previous Inpsection Findings

Not inspected.

4. Unresolved Items

Unresolved items were not identified during this inspection.

5. Plant Operations

The inspector performed surveillance of plant operations and status of systems and equipment for:

a. Correct log maintenance and entries.

b. Tracking of limiting conditions for operations in effect.

c. Status of safety systems and tagout of components.

d. Cause of out of normal annunciators.

e. Shift turnover and manning.

6. Plant Tours

The inspector conducted tours of vital plant areas to check status of safety systems and equipment and to ensure that proper housekeeping and cleanliness were being maintained, and that unauthorized combustible material was not present in these areas.

7. Radiation Protection

The inspector toured plant areas to ensure that radiological control requirements were being followed in the areas of handling and control of radioactive waste, performing radiation surveys and the posting of radiation warning signs and barriers.

8. Physical Protection

The inspector toured the plant physical protection boundaries to ensure they were secured and that compensatory measures were taken where required. The inspector witnessed security checks and badging at entrances to controlled areas and inspected entrances to vital areas to ensure that they were locked or under surveillance.

9. Quality Assurance

The quality assurance program was reviewed with licensee management to verify that any changes to the program were in accordance with his established program and applicable codes, standards and regulatory guides.

10. Organization and Administration

The inspector discussed organization and management changes with the licensee to verify that any changes were in accordance with technical specifications and conformed to applicable codes and standards and had been reported to the Nuclear Regulatory Commission. No organization and management changes were reported for the period of this report.

11. Acceptance Criteria

The inspector used one or more of the following sources of acceptance criteria for evaluating the above areas inspected:

a. 10 CFR 50, Appendix B

b. 10 CFR 20

c. Technical Specifications

d. ANSI N 45.2.3 (1971)

e. ANSI N 18.7 (1972)

f. Regulatory Guides

g. Site Security Plan

h. Quality Assurance Program

12. Results of Inspection

During the inspection of the above areas no items of noncompliance or deviations were identified. The following item of concern was inspected and discussed with the licensee:

> During the Unit 1 shutdown for the routine snubber inspection on December 12, 1979, approximately ten snubbers and pipe supports were found damaged on primary relief valve F013H discharge line to the torus. At one location the snubber shaft was broken, and at the other locations deformation of the snubbers and supporting hardware occurred. The licensee investigated the problem and concluded that the damage occurred during the reactor trip and subsequent opening of this relief valve on November 20, 1979.

A reanalysis of the piping supports and loading on this discharge line showed that the supports were correctly sized and located for the designed seismic and thermal loads. The abnormal loading that damaged the pipe supports is suspected to have been water in the discharge line to the torus. The source of the water and how it got into the line has not been identified. All sections of this line are sloped to drain into the torus and the vacuum breaker on the line was checked to verify that it was operating properly. No apparent damage to the discharge piping was observed as a result of the pipe movement that caused the pipe supports to be damaged.

The damaged snubbers were removed, repaired and tested. Damaged hardware was repaired or replaced and the snubbers reinstalled, after which the piping was tested at 250 psig and at about 1000 psig, by manually lifting the relief valves. The pipe supports and hardware satisfactorily withstood this test with no visible signs of damage.

The inspector has requested the licensee to further investigate the source of the water that caused the overstressing in the discharge line of relief valve F013H, and to verify that these stresses will not result in pipe rupture under worst case conditions. This will be carried as an open item.