



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

Report Nos.: 50-424/84-11 and 50-425/84-11

Licensee: Georgia Power Company  
 P. O. Box 4545  
 Atlanta, GA 30302

Docket Nos.: 50-424 and 50-425

License Nos.: CPPR-108 and CPPR-109

Facility Name: Vogtle Electric Generating Plant

Inspection Date: April 13 - May 14, 1984

Inspection at Vogtle site near Waynesboro, Georgia

Inspector: John F. Rogge for 6/6/84  
 W. F. Sanders Date Signed

Approved by: V. W. Panciera 6/7/84  
 V. W. Panciera, Section Chief Date Signed  
 Division of Reactor Projects

SUMMARY

Areas Inspected

This routine, unannounced inspection involved 104 resident inspector-hours on site in the areas of Diesel Generator Quality Verification, Units 1 and 2 Primary Containments, Piping Penetration Ultrasonic Examination, Concrete Placements, and Rebar Cadwelding.

Results: Of the areas inspected, one violation was identified (Failure to Protect Electrical Equipment During Installation).

## REPORT DETAILS

### 1. Persons Contacted

- \*W. T. Nickerson, Deputy General Manager
- \*H. H. Gregory, III, General Manager Vogtle Nuclear Construction Dept.
- \*E. D. Groover, Quality Assurance Site Manager
- \*R. W. McManus, Manager Quality Control
- \*S. D. Haltom, Quality Assurance Engineering Supervisor
- \*C. W. Hayes, Vogtle Quality Assurance Manager
- \*G. A. McCarley, Project Compliance Coordinator
- \*G. Gray, Project Engineering and Licensing

\*Attended Exit Interview

### 2. Exit Interview

The inspection scope and findings were summarized on May 14, 1984, with those persons indicated in Paragraph 1 above. The licensee acknowledged the inspection findings. The following item was opened:

Violation 50-424/84-11-01, Failure to Protect Electrical Equipment During Installation - paragraph 8.

### 3. Licensee Action on Previous Enforcement Matters

Not Inspected

### 4. Unresolved Items

Unresolved items were not identified during this inspection.

### 5. Independent Inspection Effort

Periodic inspections were made throughout this reporting period in the form of general type inspections in different areas of both facilities. The areas were selected on the basis of the scheduled activities and were varied to provide wide coverage. Observations were made of activities in progress to note defective items or items of noncompliance with the required codes and regulatory requirements. On these inspections, particular note was made of the presence of quality control inspectors, supervisors, and quality control evidence in the form of available process sheets, drawings, material identification, material protection, performance of tests and housekeeping.

Interviews were made with craft personnel, supervisors, coordinators, quality control inspectors, and others as they were available in the work areas. Observations were made in the following areas:

Diesel Generator disassembly and examinations  
Unit 2, Rebar and imbed work

Ultrasonic Examination of piping penetrations  
Unit 1 Containment activities  
Concrete Placements  
Rebar Cadwelding Condensate Storage Tank Base  
Control Room activities  
Category Backfill operations

6. Vogtle Drug Program

On May 16, the Inspector attended a meeting to initiate a new Vogtle Drug-Free program. The meeting was attended by Supervision from Georgia Power Company and each of the construction supervision. The program is based on a more intensive search program that includes vehicles and personnel coming on and leaving the site. The licensee stated that they plan to use dogs to sniff out drugs anywhere on site and searches will include coolers, lunch boxes, desks on the site, lockers, tool and equipment storage areas.

7. Quality Concerns Program

An audit was conducted of the Vogtle Project Quality Concern Program (QCP) which was developed to provide a system for Georgia Power Company, Bechtel, Southern Company Services and Contractor personnel associated with the project either at the site or at any other location to express their concerns about Quality and/or Safety problems for resolution. This program did not replace other programs and is intended to be used only for the Quality concerns related to the construction of the Plant when normal communications do not produce satisfactory results.

This audit consisted of selecting 42 concerns, from a group of 100 based on their possible effect on quality, even though in some cases the implication may be slight. The 42 Quality items were reviewed to appraise the depth of investigation, the technical evaluation and the resolution of the allegations. The inspector concluded that the program appears to be meaningful in providing Georgia Power with first hand information on problems and concerns as viewed by the craft and should improve communications and attitudes. A followup discussion was held with the program administrator.

No deficiencies were noted.

8. Electrical Equipment Installations (51053C)

An inspection was made of the safety related electrical equipment placed and stored in the control room awaiting terminations. It was noted that access for personnel was limited and controlled by a GPC security guard at the door. Observations made inside of the control room revealed a white dust condition on the floor which was a result of wall sanding by one of the craft. Welding was also in progress overhead on supports and also on the floor level a welding and grinding operation was in progress. The sanding operation was producing a white dust that was evident throughout and more visible on the floor as a white layer of dust. At the time a vacuum operation was in progress to remove it from the floor. An inspection was made of

the protective plastic wrapping to determine if grinding and sanding dust could enter the interior of the cabinets. A number of the electrical cabinets had plastic coverings which were not taped at the bottom. This was quite evident by observing the plastic flapping from air turbulence inside of the cabinets caused from the air flow from a large box fan on the east end of the control room. In addition to this condition, a cabinet on the south end was open and several craft working inside. A large fan was in back of them blowing air directly into the open cabinet. This condition could allow airborne particles of sanding dust or grinding dust to be blown inside the cabinets. The conditions described were evaluated to the requirements of controlled procedure GD-T-09 Rev. 6, which states:

#### GPC FIELD COORDINATION AND CONTRACTOR PERSONNEL

During certain phases of construction, such as painting, cleaning, or nearby concrete work, etc., seal or wrap all enclosures to prevent any airborne contamination. Additional precautions are also required when burning or welding is done near the equipment.

Specific Electrical Control & Instrumentation Panels examined.

1-1604-Q5-PP2  
 1-1604-Q5-PCG  
 1-1604-Q5-PPI  
 1-1604-Q5-BCP  
 1-1604-Q5-PS4  
 1-1604-Q5-PS3  
 1-1500-Q5-HUG-Sect 3  
 1-1605-Q5-STA  
 1-1605-Q5-SPA

This is a violation of 10-CFR-50 Appendix B, Criterion V.

#### 9. Ultrasonic Examination of Containment Penetration Welds (53053C)

An inspection was performed on the Ultrasonic Examination of selected containment penetration welds. This was part of a periodic review of the activities and progress of the program related to a reported significant deficiency associated with the use of questionable ER 309L type weld wire (CDR 50-424/425/83-42). The following items were inspected.

- ° Procedure for the Manual Ultrasonic Examination of Full Penetration Welds UT-H-401 0.200 to 0.400
- ° Calibration Standard for 10" CS/SS pipe

- ° Penetration No. 52 was selected for direct observations of the Ultrasonic examination of a 10 3/4" O.D. x .365 wall sleeve to flued head weld. The examination was performed by GPC personnel and witnessed by the NRC inspector on May 16, 1984. It was noted that the UT System was calibrated to a cylindrical standard of the same diameter and wall thickness. The standard contained a total of four notches. One circumferential and one longitudinal inside and one circumferential and one longitudinal outside. The notches are 1" Lg x 1/16" wide. The Distance Amplitude Curve (DAC) was developed using these calibration points. The equipment was calibrated to procedure UT-H/F/V-450. The inspector observed the scanning of penetration No. 52, and the results displayed on the CRT screen. None of the indications exceeded the 80% full screen height as displayed against the DAC Curve. The examination records for the remaining penetrations which were examined in the same manner, did not show any indications exceeding the 50% DAC. These were scanned from both sides perpendicular to the weld and circumferential parallels to the weld in both directions.

No violations or deviations were identified.