VIRGINIA ELECTRIC AND POWER COMPANY
RICHMOND, VIRGINIA 23261

May 15, 1689

W. L. STEWART
SENIOR VICE PRESIDENT
POWER

U. S. Nuclear Regulatory Commission
Attn: Document Control Desk
Washington, D. C. 20555

Serial No 89-310
NAPS/MLB/bgp
Docket No. 50-338
50-339
License No. NPF-4
NPF-7

Gentlemen:

VIRGINIA ELECTRIC AND POWER COMPANY
NORTH ANNA POWER STATION UNITS 1 AND 2
INSPECTION REPORT NOS. 50-338/89-05 AND 50-339/89-05
REPLY TO THE NOTICE OF VIOLATION

We have reviewed your letter of April 17, 1989 which referred to the inspection conducted at North Anna on March 20, 1989 through March 24, 1989 and reported in Inspection Report Nos. 50-338/89-05 and 50-339/89-05. Our responses to the Notices of Violation are attached. Programs and initiatives to address the concern over adherence to radiological controls are discussed in Attachment 1. As discussed with you on April 26, 1989, several additional events have occurred since this inspection report was completed, and the discussion in Attachment 1 encompasses these events.

We have no objection to this correspondence being made matter of public record. If you have any further questions, please contact us.

If you have further questions, please contact us.

Very truly yours,

W. L. STEWART

Attachments:

IE01
1/1

cc: U. S. Nuclear Regulatory Commission
101 Marietta Street, N.W.
Suite 2900
Atlanta, GA 30323

Mr. J. L. Caldwell
NRC Senior Resident Inspector
North Anna Power Station

RESPONSE TO THE NOTICES OF VIOLATION REPORTED DURING THE NRC INSPECTION CONDUCTED BETWEEN MARCH 20, 1989 AND MARCH 24, 1989

INSPECTION REPORT NOS 50-338/89-05 AND 50-339/89-05

NRC COMMENT

During the Nuclear Regulatory Commission (NRC) inspection conducted on March 20-24, 1989, a violation of NRC requirements was identified. In accordance with the "General Statement of Policy and Procedure for NRC Enforcement Actions," 10 CFR Part 2, Appendix C (1988), the violation is listed below:

10 CFR 20.203 specifies posting, labeling and control requirements for radiation areas, high radiation areas, airborne radioactivity areas and radioactive material areas.

Technical Specification 6.12.1 requires that in lieu of the "control device" or "alarm signal" required by Paragraph 20.203(c)(2) of 10 CFR 20, each high radiation area in which the intensity of radiation is greater than 100 mrem/hr but less than 1,000 mrem/hr shall be barricaded and conspicuously posted as a high radiation area and entrance thereto shall be controlled by requiring issuance of a radiation work permit. Any individual or group of individuals permitted to enter such areas shall be provided with or accompanied by one or more of the following:

(1) A radiation monitoring device which continuously indicates the radiation dose rate in the area

(2) A radiation monitoring device which continuously integrates the radiation dose rate in the areas and alarms when a preset integrated dose is received. Entry into such areas with this monitoring device may be made after the dose rate levels in these areas have been established and personnel have been made knowledgeable of them.

(3) An individual qualified in radiation protection procedures who is equipped with a radiation dose rate monitoring device. This individual shall be responsible for providing positive control over the activities within the area and shall perform periodic radiation surveillance at the frequency specified by the facility Health Physicist in the radiation work permit.

Contrary to the above, the licensee failed to comply with these requirements in that:

a. On August 25, 1988, a Quality Assurance inspector and work crew were found in the Unit 1 Auxiliary Building piping penetration area, a posted high radiation area, without a radiation monitoring device and without health physics coverage.

b. On November 26, 1988, an operator was found in the Waste Solids Area, a locked high radiation area, without a radiation monitoring device and without health physics coverage.

c. On January 16, 1989, two contractor engineers were discovered in the Unit 2 piping penetration area, a posted high radiation area, without a radiation monitoring device and without health physics coverage.

d. On March 15, 1989, various members of a contractor rigging crew were noted entering a posted high radiation area in Unit 2 containment without a radiation monitoring device and without health physics coverage.

This is a Severity Level IV violation (Supplement IV).

RESPONSE TO VIOLATION

1. ADMISSION OR DENIAL OF THE ALLEGED VIOLATION

The violation is correct as stated with the exception of example a. The work crew did have a radiation monitoring device in the Unit 1 Auxiliary Building piping penetration area and the Quality Assurance Inspector entered the high radiation area thinking the individual was a Health Physics technician.

2. REASON FOR THE VIOLATION

A self assessment of station Deviation Reports and HP Department Radiation Problem Reports relating to RWP compliance was made in order to determine root cause. The root cause was identified as being due to 1) management acceptance of casual worker attitudes in the RCA and 2) the lack of individual accountability.

3. CORRECTIVE STEPS WHICH HAVE BEEN TAKEN AND THE RESULTS ACHIEVED

Each of the specific events were investigated including the three additional events. The corrective action for example a was to clearly identify Health Physics Technicians that are authorized to provide meter coverage. The corrective action for examples b, c, and d, and the three additional events included appropriate counseling, retraining, and disciplinary actions. For example b, the locked door was enhanced to prevent opening without a key. To address the root cause, additional management actions have been taken. These actions included:

a) Enhancing self assessment capability to provide timely indication of adverse trends and the effectiveness of corrective actions. Specific activities include 1) implementing a detailed and systematic process for investigation of radiological events, 2) assignment of a corporate Radiological Protection Assessor to provide oversight and assessment of radiological controls, and 3) initiation of QA Surveillances (performance based) of radiological work practices.

b) Enhancing radiological work practices by 1) developing and implementing task specific radiological work practices 2) contractor action plans for RWP compliance, and 3) upgrading, from a human factors standpoint, areas of the Radiation Protection Program that workers routinely interface with (e.g., upgraded Radiological Status Boards and Radiation Survey Maps, standardized postings, computerized RWPs, and provided digital display and alarming dosimeters).

c) Clarified and enhanced management standards and expectations for RWP compliance and accountability of both the individual worker and his supervisor.

4. CORRECTIVE STEPS WHICH WILL BE TAKEN TO AVOID FURTHER VIOLATIONS

A workshop will be developed and held to train supervisory personnel on the management expectation for good radiological work practices and how to recognize good work practices.

A lifetime exposure policy will be implemented to minimize the allowable exposure to personnel. This will provide even greater incentives on the part of workers and management to implement the ALARA concept to minimize personnel exposures.

Ongoing management programs such as "Coaching" and "Self Checking" (see response to IR 88-31 dated January 23, 1989) and commitment to Advanced Radiation Worker Training and Quality Maintenance Teams will be continued. Also, self assessment of the Radiological Protection Program will be made periodically to determine effectiveness and the need for additional corrective action.

The currently ongoing continuing Training Programs will be used to provide feedback to personnel on failures to fully adhere to RWP events. Case studies will be developed as appropriate to support this training.

5. THE DATE WHEN FULL COMPLIANCE WILL BE ACHIEVED

The lifetime exposure policy will be implemented by July 31, 1989 and the supervisory workshops will be completed in 1989.