

UNITED STATES
NUCLEAR REGULATORY COMMISSION
REGION II
230 PEACHTREE STREET, N. W. SUITE 818
ATLANTA, GEORGIA 30303

FEB 13 1975

In Reply Refer To:
IE:II:VLB
50-390/75-2
50-391/75-2

Tennessee Valley Authority
ATTN: Mr. J. E. Watson
Manager of Power
818 Power Building
Chattanooga, Tennessee 37401

Gentlemen:

This refers to the inspection conducted by Mr. A. L. Cunningham of this office on January 29-31, 1975, of activities authorized by NRC Construction Permit Nos. CPPR-91 and CPPR-92 for the Watts Bar Nuclear Plant, Units 1 and 2 facilities, and to the discussion of our findings held by Mr. Cunningham with Mr. J. E. Gilleland and staff at the conclusion of the inspection.

Areas examined during the inspection and our findings are discussed in the enclosed inspection report. Within these areas, the inspection consisted of selective examination of procedures and representative records, interviews with personnel, and observations by the inspector.

Within the scope of this inspection, no items of noncompliance were disclosed.

In accordance with Section 2.790 of the NRC's "Rules of Practice," Part 2, Title 10, Code of Federal Regulations, a copy of this letter and the enclosed inspection report will be placed in the NRC's Public Document Room. If this report contains any information that you believe to be proprietary, it is necessary that you submit a written application to this office requesting that such information be withheld from public disclosure. If no proprietary information is identified, a written statement to that effect should be submitted. If an application is submitted, it must fully identify the bases for which information is claimed to be proprietary. The application should be prepared so that information sought to be withheld is incorporated in a separate paper and referenced in the application since the application will be placed in the Public Document Room. Your application, or written statement, should be submitted to us within 20 days. If we are not contacted as specified, the enclosed report and this letter may then be placed in the Public Document Room.



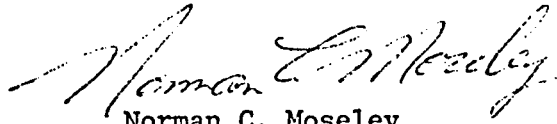
FEB 13 1975

Tennessee Valley Authority

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Should you have any questions concerning this letter, we will be glad to discuss them with you.

Very truly yours,



Norman C. Moseley
Director

Enclosure:

IE Inspection Report No.
50-390/75-2 and 50-391/75-2

Letter to Tennessee Valley Authority from N. C. Moseley
dated FEB 13 1975 and IE Rpt. Nos. 50-390/75-2
and 50-391/75-2

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230 PEACHTREE STREET, N. W. SUITE 818
ATLANTA, GEORGIA 30303

IE Inspection Report Nos. 50-390/75-2 and 50-391/75-2

Licensee: Tennessee Valley Authority
818 Power Building
Chattanooga, Tennessee 37401

Facility Name: Watts Bar Nuclear Plant Units 1 and 2
Docket Nos.: 50-390 and 50-391
License Nos.: CPPR-91 and CPPR-92
Category: A2/A2

Location: Spring City, Tennessee

Type of License: W PWR, 1160 Mwe

Type of Inspection: Routine, Announced

Dates of Inspection: January 29-31, 1975

Dates of Previous Inspection: January 8-10, 1975

Inspector-in-Charge: A. L. Cunningham, Environmental Scientist
Reactor Facility Section
Radiological and Environmental Protection Branch

Accompanying Inspectors: None

Other Accompanying Personnel: A. F. Gibson, Senior Health Physicist
Reactor Facility Section
Radiological and Environmental Protection Branch

Principal Inspector: *V. L. Brownlee*
V. L. Brownlee, Reactor Inspector
Facilities Section
Facilities Construction Branch

2/11/75
Date

Reviewed By: *J. C. Bryant*
J. C. Bryant, Senior Inspector
Facilities Section
Facilities Construction Branch

2/11/75
Date



SUMMARY OF FINDINGS

I. Enforcement Items

None

II. Licensee Action on Previously Identified Enforcement Matters

None

III. New Unresolved Items

None

IV. Status of Previously Reported Unresolved Items

74-5/1 Valve Wall Thickness Verification Program

TVA (DED) will submit a valve wall thickness program that meets Region II letters of June 30, 1972, and February 16, 1973. This item remains open.

74-6/1 Letter and Analysis Report on Concrete Pour Collapse at Control Building (10 CFR 50.55(e))

TVA has submitted an interim report dated December 6, 1974. The final report will be submitted by January 15, 1975. This item remains open.

74-7/1 Weld Material Control

TVA will evaluate the CB&I practice of issuing low hydrogen electrodes for a time period of one shift (approximately 10 hours). This item remains open.

74-7/2 TVA Surveillance Procedure (DEC-QCP-4.6, Rev. 0)

The section dealing with instrument calibration will be revised to establish more clearly the criteria under which TVA will request calibration. This item remains open.

74-7/3 Stop Work Authority

The CB&I QA Manual does not provide field QC (Welding Supervisors) with stop work authority. TVA has agreed to pursue this matter with CB&I. This item remains open.

V. Design Changes

None

VI. Unusual Occurrences

None

VII. Other Significant Findings

None

VIII. Management Interview

At the conclusion of the inspection a management interview was held on January 31, 1975, with the following TVA management representatives present: J. E. Gilleland, Assistant Manager of Power; R. N. Kennedy, Supervisor, Environmental Planning Section; R. L. Thomas, Environmental Engineer; E. D. Jones, Construction Coordinator; R. W. Moore, Quality Assurance Coordinator; L. G. Herbert, Quality Assurance Evaluator; W. D. Poling, Quality Assurance Engineer, D. S. Stinnett, Electrical Engineer; and S. West, Quality Assurance Coordinator. The objectives and scope of the inspection were briefly reviewed. Results and findings of the inspection were discussed. There were no questions concerning any of the inspection items.

DETAILS I

Prepared by:

A. L. Cunningham
A. L. Cunningham, Environmental
Scientist, Reactor Facility Section
Radiological and Environmental
Protection Branch

2/10/75
Date

Dates of Inspection: January 29-31, 1975

Reviewed by:

A. F. Gibson
A. F. Gibson, Senior Health Physicist
Reactor Facility Section
Radiological and Environmental
Protection Branch

2/10/75
Date

All information in Details I applies equally to Units 1 and 2, except where identified with a specific reactor.

1. Individuals Contacted

J. C. Killian - Project Manager
R. N. Kennedy - Supervisor - Environmental Planning Section
N. A. Nielsen - Meteorologist
D. S. Stinnet - Electrical Engineer
R. L. Thomas - Environmental Engineer
J. G. Shields - Engineer
M. D. Canther - Regional Engineer
J. Thurman - Forestry Biologist
E. D. Jones - Construction Coordinator
S. West - Quality Assurance Coordinator

2. Inspection Objectives

The objectives of the inspection were as follows: (1) a detailed review of the licensee's program designed to implement the environmental protection requirements and commitments applicable during site clearance and plant construction; (2) assessment of the licensee's compliance with such requirements and commitments.

3. Scope of Inspection

The following items were included in the inspection: (1) an initial meeting with licensee management representatives to discuss the NRC inspection program and the regulatory requirements related to environmental protection during plant construction; (2) review of the licensee's construction phase environmental protection program; (3) inspection and verification of implementation of program requirements and commitments; (4) discussion of the licensee's nonrad preoperational environmental baseline monitoring program.

4. Initial Management Meeting

A meeting was held with licensee management representatives to define the NRC inspection program and regulatory requirements related to environmental protection during plant construction and to review the status of the licensee's implementation of environmental protection requirements and commitments applicable during site clearance and plant construction. The status of the preoperational environmental baseline monitoring program was also discussed. At the time of inspection the plant was approximately 17% complete; hence, major clearing and excavation activities were completed. A licensee representative stated that their environmental protection program and all related requirements and commitments were defined in the Watts Bar construction permit environmental statement. He distributed to the inspectors a current table of organization of the Tennessee Valley Authority and identified the various divisions which develop, plan and conduct environmental protection programs during site clearance, plant construction and transmission line - right-of-way clearance and construction. Licensee representatives from the following divisions presented concise reviews of various aspects of the Watts Bar environmental protection program: Environmental Planning, Water Control Planning, Construction, Forestry, Reservoir Properties, and Transmission Planning and Engineering.

5. Program Review and Inspection

The environmental protection program was reviewed and selected data and records (water quality surveillance, meteorology) were inspected. Inspection revealed that detailed written procedures were neither developed nor provided for water quality surveillance of effluents from the secondary sewage treatment plant, the site waste water/drainage settling basin, and the Yellow Creek outfall to the Tennessee River. A licensee representative informed the inspector that procedures for water sampling and water quality analyses were available in the Division of Water Control Planning files; however, detailed written procedures were not prepared for Watts Bar environmental protection monitoring and surveillance requirements. The inspectors advised licensee representatives of the necessity of written procedures in assuring that program requirements and commitments are met and documented. Written procedures were available for operation and maintenance of the site meteorological station. Licensee representatives stated that written procedures would be developed for all monitoring and surveillance requirements of the environmental protection program. Licensee representatives were requested by the inspector to present a review of baseline preoperational monitoring and surveillance programs for the Watts Bar plant site and environs. A licensee representative stated that this program was currently being developed. He also stated that they were committed to initiate the program one year prior to initial plant operation. There were no further questions concerning this item.

6. Site Visit

The plant site was visited to verify implementation of the environmental protection program required during plant construction. The facility location, site and general topography were found to be essentially as described in the licensee's PSAR. Compliance with requirements for items such as erosion, dust control, storage and disposal of spoiled earth were reviewed. Chemical, sanitary and solid waste management were also reviewed and discussed. Inspection confirmed that site drainage systems had been developed to mitigate adverse erosion and siltation effects. Effluents from the systems are drained into a retention basin to preclude deposition of additional silt in the Tennessee River. Spoil storage areas on the site have been selectively located and maintained to control localized erosion and material loss. Inspection revealed that all site environmental monitoring and surveillance were implemented as required.

7. Transmission Lines

The environmental impact of right-of-way clearance and installation of transmission lines was discussed with licensee representatives. A licensee representative stated that transmission lines will be selectively located to eliminate adverse environmental effects, and that the attending disruption of wildlife and plantlife by right-of-way clearance and line construction is of a temporary nature. He also stated that affected areas would be revegetated by seeding and natural stump sprouting. At the time of inspection, a single transmission line to the site had been installed. Revegetation and landscaping of the affected areas were completed and no erosion was evident. Transmission lines to the site potable water treatment plant were recently completed. Chipping and disposal of solid wastes was in progress. There were no questions concerning this item.

8. Meteorology

Inspection revealed that the onsite meteorological program, required by the PSAR to commence 3.5 years prior to initial plant operation, had been implemented. The program was designed to verify that conditions at the site are not significantly different from those in the general area, and to establish baseline meteorological data for use in assessment of effects of the operating cooling towers on local fogging, icing, and rainfall. Detailed written procedures for operation, calibration, and maintenance of the tower and its instrumentation were inspected. The inspector had no questions concerning this program.

9. Construction Scheduling

The inspector requested a schedule of future construction activities at the site (e.g., dredging, removal of cofferdams, etc.) which could adversely impact the terrestrial and aquatic environments. A licensee

representative stated that a schedule had not yet been compiled; however, a schedule of such activities would be prepared and forwarded to Region II.