TENNESSEE VALLEY AUTHORITY

CHATTANOOGA, TENNESSEE 37401

400 Chestnut Street Tower II

April 15, 1980

R 17 P12

Mr. James P. O'Reilly, Director Office of Inspection and Enforcement U.S. Nuclear Regulatory Commission Region II - Suite 3100 101 Marietta Street Atlanta, Georgia 30303

Dear Mr. O'Reilly:

WATTS BAR NUCLEAR PLANT UNITS 1 AND 2 - NRC-OIE REGION II LETTER RII: EHG 50-390/80-05-02, 50-390/80-05-04 - RESPONSE TO INFRACTIONS

The subject letter dated March 24, 1980, cited TVA with two infractions. Enclosures 1 and 2 are our responses, as specified in 10 CFR 2.201, to infractions 50-590/80-05-02 and 50-590/80-05-04, respectively.

If you have any questions concerning this matter, please get in touch with D. L. Lambert at FTS 854-2581.

Very truly yours,

TENNESSEE VALLEY AUTHORITY

L. M. Mills, Manager

Nuclear Regulation and Safety

Enclosures

cc: Mr. Victor Stello, Jr., Director (Enclosures)
Office of Inspection and Enforcement
U.S. Nuclear Regulatory Commission
Washington, DC 20555

ENCLOSURE 1

WATTS BAR NUCLEAR PLANTS UNITS 1 AND 2 SOCKET WELD PROBLEMS NOT PROPERLY ADDRESSED INFRACTION 50-590/80-05-02; 50-391-04-02

Infraction 50-390/80-05-02; 50-391/80-04-02

As required by Criterion XVI of Appendix B to 10 CFR 50 and implemented by Section 17.1A.16 of the Watts Bar FSAR, "Measures shall be established to assure that conditions adverse to quality, such as...are promptly identified and corrected."

Contrary to the above, on February 20, 1980, adequate measures had not been taken to assure that certain conditions adverse to quality were promptly identified and corrected, as evidenced by the following:

Conditions Adverse to Quality Report (CAQR) M 41 (dated 12/26/79) identified and provided for repair of a number of previously accepted safety-related piping fillet (socket) welds which did not comply with applicable size requirements. Additional undersize socket welds were identified and reported on Nonconforming Condition Reports (NCR) 2086 R Rev. 1 dated 2/28/80, 2091 R Rev. 1 dated 2/18/80 and 2101 R dated 2/15/80. On 2/20/80, undersized safety-related welds were identified by the NRC inspector. Examples included piping weld 2-067B-T314-4 (Essential Raw Cooling Water System); and piping welds 1-63A-T008-3, 6, 7, and 8 (Safety Injection System). In addition, licensee inspection personnel informed the NRC inspector that undersize fillet welds had been recently identified for safety-related piping attachment welds 1-063A-D079-11C through 11J.

No evidence was presented to the inspector which indicated that the corrective actions had been taken to preclude the making and acceptance of undersize welds.

Corrective Action Taken and Results Achieved

On December 26, 1979, a Condition Adverse to Quality Report (CAQR) M-41 was written to identify undersize fillet socket welds which did not meet specified size requirements. At the time the CAQR was written, TVA failed to identify this as a significant item. At this time, a random inspection of other fillet socket welds was initiated to determine if this was a generic problem. The results of this inspection indicated that a 100 percent reinspection of fillet socket welds would be necessary to ensure that all applicable size requirements have been met.

Instructions were given to engineering employees to reinspect all fillet socket welds in each of the safety-related systems. The undersize weld problem was first noted in schedule 160 piping and later in schedule 80 and to a lesser extent in schedule 40 piping. At the time of the subject NRC inspection, this item had been reported to NRC Region II under 10 CFR 50.55(e) as nonconformance NCR 2111R. Reinspection of existing welds was being conducted on a priority basis. All reinspections of fillet socket welds are being documented, and those requiring additional filler metal are documented on weld repair operation sheets.

Action Taken to Prevent Recurrence

Retraining has been conducted for Quality Control employees with special emphasis being placed on the use of inspection gauges to verify that fillet welds meet applicable specifications. Also a table of fillet weld sizes has been prepared, discussed, and issued to all welding inspectors. A training session was conducted relating to fillet weld size requirements. The retraining emphasized the importance of meeting size requirements for fillet welds.

Date of Full Compliance

We are now in full compliance in the retraining of craft and Quality Control employees.

We expect to be in full compliance on reinspection and repair of fillet socket welds before hot functional testing.

ENCLOSURE 2

WATTS BAR NUCLEAR PLANT UNIT 1 UNCONTROLLED WELDING MATERIAL INFRACTION 50-390/80-05-04

Infraction 50-390/80-05-04

As required by Criterion V of Appendix B to 10 CFR 50, and implemented by Section 17.1A.5 of the FSAR, "Activities affecting quality shall be prescribed by documented instructions, procedures...and shall be accomplished in accordance with these instructions, procedures..." QC Procedure WBNP-QCP-4.10 R10 requires that all unused coated electrodes and lengths of bare wire be returned to the control center.

Contrary to the above, on February 20, 1980, approximately 20 coated and bare safety-related welding electrodes remained on the floor of the reactor building after completion of the shift change. No welders remained in the area.

Corrective Action Taken and Results Achieved

The immediate action taken was to make an inspection of all areas to ensure that the implementation of existing procedures and instructions were being adhered to in welding rod control. Since no other problems were noted, we believe this to be an isolated incident.

Action Taken to Prevent Recurrence

A training session was conducted by craft foremen on March 31, 1980, relating to welding material control during the scheduled safety meeting. This retraining emphasized the severity of the subject infraction. In addition to the training, craft supervision is conducting a surveillance program to determine the effectiveness of the training program.

Date of Full Compliance

We are now in full compliance.