

June 2, 1997

Mr. D. N. Morey
Vice President - Farley Project
Southern Nuclear Operating
Company, Inc.
Post Office Box 1295
Birmingham, Alabama 35201-1295

SUBJECT: JOSEPH M. FARLEY NUCLEAR PLANT, UNIT 1 - CORRECTION TO AMENDMENT 124
WITH REGARD TO VOLTAGE-BASED ALTERNATE REPAIR CRITERIA FOR STEAM
GENERATOR TUBES (TAC NO. M97510)

Dear Mr. Morey:

On March 24, 1997, the U.S. Nuclear Regulatory Commission issued Amendment No. 124 to Facility Operating License No. NPF-2 for the Joseph M. Farley Nuclear Plant (FNP), Unit 1. The amendment changes Technical Specification (TS) 3/4.4.6, "Steam Generators" and associated Bases to implement the voltage-based alternate repair criteria for steam generator tubes in FNP Unit 1 in accordance with Generic Letter 95-05, "Voltage-Based Repair Criteria for Westinghouse Steam Generator Tubes Affected by Outside Diameter Stress Corrosion Cracking."

On page 7 of the staff's safety evaluation, we erroneously refer to the FNP Unit 1 TS limit for primary-to-secondary leakage through one steam generator as 150 gallons per day instead of 140 gallons per day, which is consistent with the guidance of GL 95-05. Enclosed is the corrected page 7 of the safety evaluation. The TS pages are correct as issued.

We regret any inconvenience this oversight may have caused. If you have any questions on this correction, please call me at (301) 415-2426.

Sincerely,
ORIGINAL SIGNED BY:

Jacob I. Zimmerman, Project Manager
Project Directorate II-2
Division of Reactor Projects - I/II
Office of Nuclear Reactor Regulation

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Docket No. 50-348

Enclosure: As stated

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UNITED STATES
NUCLEAR REGULATORY COMMISSION

WASHINGTON, D.C. 20555-0001

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Southern Nuclear Operating
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Sincerely,

A handwritten signature in cursive script, reading "Jacob I. Zimmerman", is written over the typed name.

Jacob I. Zimmerman, Project Manager
Project Directorate II-2
Division of Reactor Projects - I/II
Office of Nuclear Reactor Regulation

Docket No. 50-348

Enclosure: As stated

cc w/encl: See next page

Joseph M. Farley Nuclear Plant
Unit 1

cc:

Mr. R. D. Hill, Jr.
General Manager -
Southern Nuclear Operating Company
Post Office Box 470
Ashford, Alabama 36312

Mr. Mark Ajluni, Licensing Manager
Southern Nuclear Operating Company
Post Office Box 1295
Birmingham, Alabama 35201-1295

Mr. M. Stanford Blanton
Bajch and Bingham Law Firm
Post Office Box 306
1710 Sixth Avenue North
Birmingham, Alabama 35201

Mr. J. D. Woodard
Executive Vice President
Southern Nuclear Operating Company
Post Office Box 1295
Birmingham, Alabama 35201

State Health Officer
Alabama Department of Public Health
434 Monroe Street
Montgomery, Alabama 36130-1701

Chairman
Houston County Commission
Post Office Box 6406
Dothan, Alabama 36302

Regional Administrator, Region II
U.S. Nuclear Regulatory Commission
Atlanta Federal Center
61 Forsyth Street, S.W., Suite 23T85
Atlanta, Georgia 30303

Resident Inspector
U.S. Nuclear Regulatory Commission
7388 N. State Highway 95
Columbia, Alabama 36319

3.3.2 Accident Leakage

The licensee will use the methodology described in Revision 1 of WCAP-14277 for calculating the steam generator tube leakage from the faulted steam generator during a postulated main steam line break event. The model consists of two major components: (1) a model predicting the probability that a given indication will leak as a function of voltage (i.e., the probability of leakage model); and (2) a model predicting leak rate as a function of voltage, given that leakage occurs (i.e., the conditional leak rate model). The staff concludes that the licensee's proposed methodology for calculating the tube leakage is consistent with the guidance in GL 95-05 and is acceptable.

3.3.3 Primary-to-Secondary Leakage During Normal Operation

When the voltage-based repair criteria is implemented, tubes may have or may develop through-wall or near through-wall cracks during an operational cycle, thus creating the potential for primary-to-secondary leakage during normal operation, transients, or postulated accidents. Postulated accident leak rates were discussed previously.

The staff concludes adequate leakage integrity during normal operation is reasonably assured by the TS limits on allowable primary-to-secondary leakage. GL 95-05 specifies the operational leakage limits of the plant TS should be reduced to 150 gallons per day. Farley Unit 1 TS currently limit the primary-to-secondary leakage through one steam generator to 140 gallons per day. This requirement is consistent with the guidance in GL 95-05 and is, therefore, acceptable.

3.4 Degradation Monitoring

To confirm the nature of the degradation occurring at the tube support plate elevations, tubes are periodically removed from the steam generators for destructive tests. The test data from removed tubes can confirm that the nature of the degradation observed at these locations is predominantly axially oriented ODSCC, provide data for assessing the reliability of the inspection methods, and supplement the existing databases (e.g., burst pressure, probability of leakage, and leak rate). GL 95-05 specifies that at least two tube be removed from steam generators with the objective of retrieving as many intersections as practical (minimum of four intersections) during the plant steam generator inspection outage preceding initial application of the voltage-based repair criteria. On an ongoing bases, additional tube specimen removals (minimum of two intersections) should be obtained at the first refueling outage following 34 effective full power months of operation or at the maximum interval of three refueling outages after the previous tube pull. Alternatively, the licensee may participate in an industry-sponsored tube pull program endorsed by the staff as described in GL 95-05.