

APPENDIX (B)

U. S. NUCLEAR REGULATION COMMISSION
REGION IV

Inspection Report: 50-458/92-27

Operating License: NPF-47

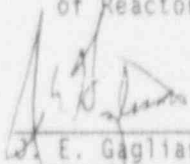
License: Gulf States Utilities
P.O. Box 220
St. Francisville, Louisiana 70775

Facility Name: River Bend Station

Inspection At: St. Francisville, Louisiana

Inspection Conducted: August 10-14, 1992

Inspector: D. L. Keiley, Reactor Inspector, Test Programs Section, Division
of Reactor Safety

Approved: 
E. Gagliardo, chief, Test Programs Section,
Division of Reactor Safety

9/17/92
Date

Inspection Summary

Areas Inspected: Routine, announced inspection of local leak rate testing and integrated leak rate testing activities.

Results:

- Personnel performing local leak rate test were very experienced (paragraph 2.1.2.2)
- Minor weakness was identified in the local leak rate test procedure revision process (paragraph 2.1.2.2)
- A minor weakness was identified in the operation of the specific leak rate monitor being used (paragraph 2.1.2.2)
- The integrated leak rate test procedure was well written (paragraph 3.2).

Attachments (and /or Enclosures):

- Attachment - Persons Contacted and Exit Meeting

DETAILS

1 PLANT STATUS

During this inspection period, the plant was in a refueling outage.

2 LOCAL LEAK RATE TESTING (61720)

This portion of the inspection consisted of the review of individual isolation device local leak rate testing procedures and the review of the associated test data package results. In addition to the above reviews, the inspector examined the qualification records of five testing personnel and interviewed three Level II test engineers.

2.1 Discussion

The inspector reviewed 18 completed local leak rate packages and their associated test procedures. The test packages encompassed the testing of approximately 25 valves, including any retesting due to valve leak rate testing failures. During the review of the local leak rate test procedures and test results packages, the inspector noted that the procedure contained comment sheets recommending changes to the procedures. There were also several temporary procedure changes that were generated during the performance of the tests. While the comments and temporary procedure changes did not invalidate any of the tests, they did point out the need for the licensee to improve their efforts in reviewing and revising the test procedures prior to performing the test. The three test engineers, who were interviewed also voiced this need for test procedure revision.

The test engineers also noted that the leak rate monitoring instrument appeared to lack point-to-point coordination between adjacent scales. After discussion with licensee personnel, the inspector learned that the leak rate monitor had inherent dead band areas at the upper and lower end of each scale so that there was an apparent inconsistency when reading the upper or lower extreme of adjacent scales. The manufacturer of the instrument was contacted and stated that the monitor was working correctly. He said that if the incorrect scale were selected it would be indicated on the monitor. Although the test engineers had concerns regarding the procedures and the instrumentation being used, they felt that the testing results were valid and they had no safety concerns with the local leak rate testing.

The qualification records of five leak rate test engineers were examined. All five testing engineers had several years experience in leak rate testing. In addition to the qualification records review, the inspector interviewed three of the leak rate testing engineers. All of the test engineers met the experience and training requirements required by the licensee and appeared to be very knowledgeable and experienced in leak rate testing.

The result review indicated a small number of failures. All of the failures

examined for correct test position and proper tagging. Additionally, several temperature and relative humidity sensor locations were examined for proper sensor placement and sensor physical condition.

The test monitoring instrument area and the area containing the test devices for the verification portion of the test were also examined. The inspector examined the test instrument calibration data and verified that the data was recorded in the test procedure and the instruments were in the calibration period specified.

Discussion with the integrated leak rate test coordinator indicated that the computer for monitoring the test had been validated by running the integrated leak rate program with a known leak rate data file.

A minor problem occurred when mis-communication allowed the upper personnel air lock door to be opened for containment access after the door had been seal tested in preparation for the leak rate test. This necessitated a retest on the door seals and the licensee instructed personnel again that the upper air lock was not to be used.

The licensee commenced pressurization at approximately 9:19 a.m. on Friday, August 14, 1992. The inspector periodically monitored the pressurization progress. The test pressure was reached at approximately 11:05 a.m. the same day. The air compressors were secured and disconnected from the pressurization line. The test then entered the mandatory temperature stabilization period for a minimum of four hours. The inspector periodically observed the computer graphical display of the average temperature noting that it was approaching a constant value. About 7:31 p.m. on August 14, 1992, the temperature stabilization criteria were reached and the start of the integrated leak rate test was declared.

The inspector was notified by the licensee at 3:30 a.m. on August 15, 1992, that the ILRT had been completed at 1:46 a.m. At this point a calculated leakage rate was superimposed on the containment, the temperature was stabilized for one hour and the verification test was performed and completed at 5:46 a.m. on August 15, 1992. Licensee representatives stated that no problems had been encountered and the leakage rate was within the acceptance criteria. The licensee had no exemptions to the Type A testing requirements required by Appendix J to 10 CFR Part 50.

4.2 Conclusions

A minor problem was noted with the opening of the upper personnel air lock resulting from mis-communications. No major problem areas were noted during the preparation or performance of the integrated leak rate test. The controls for the test were rigidly enforced.

The examination of the integrated leak rate test results will be performed when the final test report is issued.

ATTACHMENT 1

1 PERSONS CONTACTED

Licensee Personnel

- *D. L. Andrews, Director Quality Assurance
- H. A. Ely, Level II Test Engineer
- C. E. Fisher, Quality Assurance Engineer
- *K. D. Garner, Licensing Engineer
- K. J. Giadrosich, Supervisor Quality Engineering
- *P. D. Graham, Plant Manager
- *D. N. Lorfing, Supervisor - Nuclear licensing
- *R. C. Lundholm, Operations Engineer
- *C. W. Malik, Supervisor Operations Quality Assurance
- *R. H. Martin, Senior System Engineer
- *W. H. Odell, Manager Oversight
- J. R. Pass, Level II Test Engineer
- W. D. Roman, System Engineering (ILRT Coordinator)
- D. W. Slag, Level II Test Engineer
- *C. W. Walling, Process System Supervisor - System Engineering

In addition to the personnel listed above, the inspector contacted other personnel during this inspection period.

*Denote personnel that attended the exit meeting.

2 EXIT MEETING

An exit meeting was conducted on August 14, 1992. During this meeting, the inspector reviewed the scope and findings of the report. This information was updated with the licensee in a telephone conversation with the integrated leak rate coordinator on August 15, 1992. The licensee did not identify as proprietary, any information provided to, or reviewed by the inspector.