



UNITED STATES
 NUCLEAR REGULATORY COMMISSION
 REGION II
 101 MARIETTA STREET, N.W.
 ATLANTA, GEORGIA 30323

Report Nos.: 50-259/89-33, 50-260/89-33, and 50-296/89-33

Licensee: Tennessee Valley Authority
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 1101 Market Street
 Chattanooga, TN 37402-2801

Docket Nos.: 50-259, 50-260, and 50-296

License Nos.: DPR-33, DPR-52, and DPR-68

Facility Name: Browns Ferry Units 1, 2, and 3

Inspection at Browns Ferry Site near Decatur, Alabama

Inspection Conducted: July 15 - August 15, 1989

Inspector: *[Signature]*
 D. R. Carpenter, NRC Site Manager

8/24/89
 Date Signed

[Signature]
 G. A. Patterson, NRC Restart Coordinator

8/24/89
 Date Signed

Accompanied by: E. Christnot, Resident Inspector
 W. Bearden, Resident Inspector
 K. Ivey, Resident Inspector
 A. Johnson, Project Engineer

Approved by: *[Signature]*
 W. S. Little, Section Chief,
 Inspection Programs,
 TVA Projects Division

8/24/89
 Date Signed

SUMMARY

Scope: This routine resident inspection included surveillance observation, maintenance observation, modification, control of high radiation areas, operational safety verification, restart test program, site management, and organization.

Results: A violation was identified for failure to follow a SI procedure and review the results within the required time period. This resulted in invalidation of the SI and equipment being declared inoperable, paragraph 6.c. A TS violation was identified when two fire doors were found open without compensatory measures taken, paragraph 6.e.

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This item was significant in that the two doors were on a frequently traveled path to the control room and plant personnel did not question this condition.

The licensee demonstrated good planning and work control in successfully completing the condenser vacuum test. The maintenance department has reversed an upward trend and decreased the number of open MRs over the past several months. The number of open CAQRs in the maintenance area has been cut in half during this time period also. Greater emphasis has been placed on eliminating late preventive maintenance items. These improvements were observed while maintenance provided timely support for accomplishing the condenser vacuum test and in-leakage reduction.

A licensee identified violation was identified concerning the control of high radiation areas, paragraph 4. The licensee action to correct this problem was acceptable and aggressive. Housekeeping in the SBTG room should be improved, paragraph 6.d.

An unresolved item concerning SBTG LCO was identified, paragraph 6b. This item needs to be resolved with a TS change prior to restart.

REPORT DETAILS

1. Persons Contacted

Licensee Employees:

- *O. Zeringue, Site Director
- *G. Campbell, Plant Manager
- R. Smith, Project Engineer
- *J. Hutton, Operations Superintendent
- A. Sorrell, Maintenance Superintendent
- D. Mims, Technical Services Supervisor
- G. Turner, Site Quality Assurance Manager
- *P. Carrier, Site Licensing Manager
- *P. Salas, Acting Compliance Supervisor
- *J. Corey, Site Radiological Control Superintendent
- R. Tuttle, Site Security Manager

Other licensee employees or contractors contacted included licensed reactor operators, auxiliary operators, craftsmen, technicians, and public safety officers; and quality assurance, design, and engineering personnel.

NRC Attendees

- *W. Little, Section Chief
- *D. Carpenter, Site Manager
- *C. Patterson, Restart Coordinator
- *E. Christnot, Resident Inspector
- *W. Bearden, Resident Inspector
- *K. Ivey, Resident Inspector

*Attended exit interview

Acronyms used throughout this report are listed in the last paragraph.

2. Surveillance Observation (61726)

The inspectors observed and/or reviewed the SI procedures discussed below. The inspections consisted of a review of the SIs for technical adequacy and conformance to TS, verification of test instrument calibration, observation of the conduct of the test, confirmation of proper removal from service and return to service of the system, and a review of the test data. The inspector also verified that limiting conditions for operation were met, testing was accomplished by qualified personnel, and the SIs were completed at the required frequency.

- a. The inspector reviewed and observed the performance of 2-SI-2, Instrument Checks and Observations. The SI stated the following:

This Surveillance Instruction will ensure instrument checks and observations, as required by the Technical Specifications (TS), are performed. The majority of the instrument checks and observations are required on a once per shift, daily, or



semi-weekly frequency. A separate Surveillance Instruction is not warranted to govern their performance.

This instruction fulfills most once per four hours, once per shift, daily, and weekly instrument checks and observations required by the Technical Specification. Although this instruction addresses the majority of the requirements, many are addressed by other Surveillance Instructions. The waste gas radiation monitors and liquid effluent radiation monitors are two examples. Attachment C provides a cross reference of subject Technical Specification and the section of this Surveillance Instruction which satisfies the requirement.

This Surveillance Instruction will be performed once per week. The required frequency for individual surveillance items are addressed within this instruction to fulfill both Technical Specification, Final Safety Analysis Report, and regulatory commitment requirements.

The inspector noted that by the use of attachments the data entries cover a seven day period, from Sunday at 12:00 a.m. to Saturday at 12:00 p.m. Attachment "A" covers information on applicable parameters monitored such as RHR Discharge Pressure and Primary Containment Oxygen and Hydrogen Concentration. Attachment B is divided up into three shifts with Shift One covering the morning shift, Shift Two the day shift, and Shift Three the evening shift. This attachment is used to record the various parameter values. The NRC inspector also noted that the data on Attachment "B" references information that can be obtained from Attachment "A". The entries reviewed in the SI were legible, personnel interviewed displayed adequate knowledge of the SI, and the SI covered the necessary information needed to status the unit on a shift to shift basis.

- b. The inspector reviewed a draft to Unit 2 surveillance instruction 2-SI-3.3.1.B, ASME Section XI Hydrostatic Pressure Testing of the Reactor Pressure Vessel and Main Steam Piping (ASME Section III, Class 1 and Class 2). The NRC inspector noted items involving the use of second party verification instead of independent verification, the adequacy of identifying equipment by number and name, and the detail of individual step instructions. These items were discussed with licensee representatives. The licensee stated that an approved SI for the pressure boundary test will be submitted to the NRC at least 30 days prior to performance.
- c. The inspector observed the July 20, 1989, performance of procedure 3-SI-4.5.C.1(2) "EECW Pump Operation Surveillance Instruction" which was to establish the operability of the "D1" EECW pump. This performance was required when the licensee identified that the July 14 performance did not include required pump vibration data (see paragraph 6.b). No deficiencies were identified during this performance of the SI.

No violations or deviations were identified in the Surveillance Observation area.

3. Maintenance Observation (62703)

Plant maintenance activities of selected safety-related systems and components were observed/reviewed to ascertain that they were conducted in accordance with requirements. The following items were considered during this review: the limiting conditions for operations were met; activities were accomplished using approved procedures; functional testing and/or calibrations were performed prior to returning components or system to service; quality control records were maintained; activities were accomplished by qualified personnel; parts and materials used were properly certified; proper tagout clearance procedures were adhered to; Technical Specification adherence; and radiological controls were implemented as required.

Selected maintenance requests were reviewed to determine status of outstanding jobs and to assure that priority was assigned to safety-related equipment maintenance which might affect plant safety. The inspectors observed the below listed maintenance activities during this report period:

- MR 101084 - This MR involved the troubleshooting and repair of a failed relay in the Unit 3 Diesel Generator 3D. The failed relay would not allow the shutdown of the DG from the control room. The licensee replaced the relay and returned the DG to the operable status. The system engineer traced the hardware failure to a set of contacts on the relay.
- MR 864197 and 864198 - These MRs involved a failure of an equipment drain line on the emergency chiller for the Unit 1 and 2 Shutdown Board Rooms "A" and "B". The chiller filled with water and spilled over dripping onto the top of the 4160 V Shutdown Board "A". The licensee maintenance personnel disconnected the drain line, flushed it out, used a hose and barrel to drain out the system, and returned the system to normal.

Activities involved with the above MRs were controlled, adequately documented, and communications between the various onsite groups were satisfactory.

During this reporting period the licensee was involved in an effort aimed at establishing a vacuum in the Unit 2 condenser. The NRC inspector observed and reviewed the following MRs written to fix leaks, repair equipment, and adjust instrumentation:

- MR 900734 - Involved the replacement of gaskets on the Low Pressure Turbine manways.
- MRs 870030 and 101012x - Involved repairs to the Unit 2 Mechanical Vacuum Pumps "2A" and "2B".

A total of 25 MRs were identified during this evolution. Although these MRs involved non-safety related activities the NRC inspector considered this as a part of the RTP.

Additional MRs were reviewed on a day to day basis by the outage management group. Personnel involved in these activities, which were required to support the RTP procedure displayed a cooperative attitude and a systematic approach in accomplishing the individual tasks. The licensee representatives also displayed the same type of cooperation with the NRC inspector as they have had when safety related activities were involved.

The maintenance organization over the past few months made a significant impact in reducing the number of open MRs and CAQRs. From January to June 1989, the number of open MRs steadily increased to 7500. Since June, the number of MRs has steadily decreased to 6225 except for a slight increase centering around the condenser vacuum test. The number of open CAQRs related to maintenance has been reduced from 59 in May to 28 in August. Increased emphasis has been placed on eliminating late preventive maintenance items in preparation for restoring systems to operation.

No violations or deviations were identified in the Maintenance Observation area.

4. Control of High Radiation Areas

On July 18, 1989, at 6:20 p.m., a contract engineer was found by a health physics technician alone inside the high radiation area posted around the Unit 2 fuel pool cooling HX. Contrary to the high radiation area entry requirements of Unit 2 RWP number 89-2030, revision 4 and Technical Specification 6.8.3.1, the engineer did not have in his possession a dose warning device, a dose rate instrument, nor was he accompanied by anyone who had one of these devices in their possession. This area was posted with the maximum whole body dose rate of 110 mr/hr. The person was removed from the area and based on his PRD had received 30 mRem during the entry. Discussion with the individual indicated that he worked in the same area the previous day and had not obtained a dose warning device for that entry either. Subsequently, the individual's TLD was processed and he was assigned a total dose for the quarter of 145 mRem.

The root cause for this event is personnel error due to inattention to detail by the contract engineer. The engineer failed to pay proper attention to and comply with the requirements stated on the RWP.

This is considered an isolated event. The last known similar event occurred in 1983.

As a result of the event, the licensee took the following corrective actions:

- Removed individual from c-zone and radiologically controlled area
- Pulled individual's TLD badge.
- Revoked individual's Health Physics general employee training.
- Revoked individual's access to BFPN protected area.

- Rewrote RWP's to separate high radiation areas from radiation areas.
- Instituted use of a stamp on the RWP requiring individuals to contact RADCON before entering a high radiation area.
- Initiated a RIR and Condition Adverse to Quality Report for the event.

While this event is a violation of the RWP requirements and TS 6.8.3.1, the event meets the criteria for a licensee identified violation. The event was discovered by the licensee, no other known similar events have occurred since 1983, exposure limits were not exceeded, and corrective actions were promptly completed. This licensee identified violation is not being cited because criteria specified in Section V.G. of the NRC Enforcement Policy were satisfied. No other follow-up on NCV 259, 260, 296/89-33-01, "Entry into High Radiation Area Without Proper Monitoring Device", is required.

5. Modifications (37700)

EECW Piping Modifications

The inspectors continued to review selected activities associated with a major ongoing modification to the Unit 2 EECW and RCW systems. This modification is identified by DCN H5121A and is part of the licensee's corrective actions due to the discovery of the presence of multiple discharge flowpaths which include vitrified clay piping in portions of the RCW buried yard piping. Vitrified clay piping cannot be seismically qualified and the affected lines are part of the EECW discharge flow path for various safety related components. Additional information on this issue is included in NRC Inspection Report 89-10.

DCN H5121A reroutes the EECW discharge piping for the Unit 2 Shutdown Board Room Air Conditioning Units from the Unit 2 Reactor Building RCW discharge line to the Unit 2 EECW discharge piping which is seismically qualified.

The inspectors observed ongoing activities including welding of a new section of six inch diameter stainless piping and removal of abandoned EECW discharge piping that had connected to the RCW system. The unused EECW connection to the 24-inch diameter carbon steel RCW was capped.

Although completed Quality Control inspection records associated with the work were not yet available for review by the NRC inspector, no problems associated with any ongoing work were noted. Completed pipe welding appeared adequate with no visible flaws.

In this area, violations of deviations were not identified.



6. Operational Safety Verification (71707)

The NRC inspectors were kept informed of the overall plant status and any significant safety matters related to plant operations. Daily discussions were held with plant management and various members of the plant operating staff.

The inspectors made routine visits to the control rooms. Inspection observations included instrument readings, setpoints and recordings; status of operating systems; status and alignments of emergency standby systems; onsite and offsite emergency power sources available for automatic operation; purpose of temporary tags on equipment controls and switches; annunciator alarm status; adherence to procedures; adherence to limiting conditions for operations; nuclear instruments operability; temporary alterations in effect; daily journals and logs; stack monitor recorder traces; and control room manning. This inspection activity also included numerous informal discussions with operators and supervisors.

General plant tours were conducted. Portions of the turbine buildings, each reactor building, and general plant areas were visited. Observations included valve positions and system alignment; snubber and hanger conditions; containment isolation alignments; instrument readings; housekeeping; proper power supply and breaker alignments; radiation area controls; tag controls on equipment; work activities in progress; and radiation protection controls. Informal discussions were held with selected plant personnel in their functional areas during these tours.

a. Unit Status

All three units remained in an extended outage as part of the BFNP recovery plan. Units 1 and 3 are defueled with Unit 2 in cold shutdown with fuel loaded. Work activities continued toward the restart of Unit 2 in 1990. No activity had begun on Unit 1 and 3.

b. TS LCO for SBTG Exceeded

On July 17, 1989, at 4:25 a.m., the licensee identified that a LCO had expired due to the inoperability of SBTG train "C" for more than 7 days.

TS 3.7.B.1a and 3.7.B.3 require that all three trains of the SBTG be operable at all times when secondary containment is required except that one SBTG train may be inoperable for seven days during reactor power operations or fuel handling activities. If these requirements cannot be met, TS 3.7.B.4 requires that the unit be placed in a condition where the SBTG is not required.

SBTG train "C" was declared inoperable on July 10, 1989, at 4:25 a.m., when its emergency power source, the "3D" Diesel Generator (DG), was taken out of service for scheduled maintenance. The "3D" DG was returned to service at 4:45 a.m., on July 17, 1989, and at that time SBTG train "C" was declared operable. This resulted in the LCO being exceeded for 20 minutes. Unit 2 could not be placed



in a condition where the SBTG was not required because secondary containment integrity is required to be maintained at all times except when certain conditions can be met, including primary containment integrity. Primary containment integrity could not be met since Unit 2 was in cold shutdown with the reactor and drywell heads removed.

The delay in returning SBTG train "C" to service was caused by delays in the completion of work activities on the "3D" DG and were not directly related to the SBTG. Unit 2 was in cold shutdown with the reactor vessel loaded and no fuel handling activities were taking place.

The licensee interpreted the TS LCO as meaning that the seven day exclusion applied only during power operations or while conducting activities above the fuel pool. The NRC inspectors questioned this interpretation and raised this question to the licensee's Senior management. At the exit interview the licensee committed to review the TS LCO and submit a TS change to the NRC. This is identified as an URI 259, 260, 296/89-33-02, TS LCO Exceeded for SBTG pending NRC review of the licensee's TS review and change submittal.

c. Failure to Follow SI Procedure

On July 10, 1989, the "D1" EECW pump was declared inoperable when its emergency power source, the "3D" DG, was taken out of service for scheduled maintenance. On July 14, 1989, procedure 3-SI-4.5.C.1(2) "EECW Pump Operation Surveillance Instruction" was completed to establish operability of the "D1" EECW pump and the pump was subsequently declared operable on July 17, 1989, when the "3D" DG was returned to service. However, on July 20, 1989, while conducting technical reviews for the SI, the licensee identified that the SI performers failed to take complete pump vibration data as required by step 7.13.24. Vibration data was required to satisfy acceptance criteria in the SI and the vibration acceptance step (7.13.25) was signed off as being within the specified limits. This SI performance was then invalidated and the "D1" EECW pump was declared inoperable. Therefore, the "D1" EECW pump was declared operable on July 17, without completion of its operability test and was not operable per the TS. The licensee reperformed 3-SI-4.5.C.1(2) successfully on July 20, 1989, and declared the "D1" EECW pump operable.

Further review of this event by the licensee revealed that a completed analysis of the test data was not performed within four working days of the test as required by 3-SI-4.5.C.1(2) step 3.7. Test data review was not completed until July 21, 1989, six days after completion of the test. This review discovered the missing vibration data.

TS 6.8.1.1.c requires that written procedures be established, implemented and maintained covering surveillance and test activities for safety related equipment. Site Directors Standard Practice

(SDSP) 2.1, "Site Procedures and Instructions," requires that the site be operated and maintained in accordance with written, approved procedures and instructions which have been formally issued and distributed for use. The failure to follow procedure 3-SI-4.5.c.1(2) was identified as a violation of Technical Specification 6.8.1.1.c (VIO 259, 260, 296/89-33-03, Failure to Follow SI Procedure). The violation was licensee identified, however, since failure to follow surveillance procedures is a recurring problem that is yet to be corrected, this violation will not be considered a non-cited violation. Special attention should be focused on the root cause of these failures to preclude their recurrence in the use of any procedure.

d. Safety System Walkdown

During a routine tour of the SBTG rooms on August 2, 1989, the NRC inspectors noted the following:

- Water dripping from the overhead onto SBTG Train "C" panel 4596 which contains the SBTG Train "C" control switch (O-HS-65-69B) and SBTG Train "C" Outlet Damper control switch (O-HS-65-67B). The shift supervisor was immediately notified of this problem.
- The moisture indicating switch for all three trains were removed. A tag indicated the switches had been sent back to the factory to be rebuilt. These switches alarm in the control room when relative humidity in the filter trains exceeds 80%.
- A possible fire hazard from an open green poly bag containing charcoal.
- A radiological control concern with yellow poly found in a green trash can in the SBTG building.
- The "A" train fan motor contained pieces of metal inside the motor stator casing in a ventilation opening.
- There was an open conduit above the charcoal temperature switches for all three trains.
- A welding machine tagged with an equipment-in-use tag showing the location of the machine in the diesel generator room.
- A loose unsecured ladder was on the floor.
- Several burnt out light bulbs in the building were found.
- A sink or wash basin mounted on a cart not secured or wheel locked.
- Numerous leaks in the room and some indication of building settlement noted by caulking or sealant pulled away at various building seams.



- A radioactive material storage sign lying on the floor.

In discussion with the shift supervisor, all trains of SBTG were considered operable with no known compensatory measures in place for any missing alarms or instrumentation. All of the above concerns were discussed with operations management immediately following the tour. Operations management took prompt action to correct these items and kept the NRC inspector informed of the corrective actions taken.

e. Breach of Fire Doors

At 5:00 p.m. on August 6, 1989 while on backshift plant tour the NRC inspector identified two examples of breached fire doors. TS 3.11.G.1.a requires that "with one or more of the required fire-rated assemblies and/or sealing devices inoperable, within one hour establish a continuous fire watch on at least one side of the affected assembly(s) and/or sealing device(s) or verify the operability of fire detectors on at least one side of the inoperable assembly(s) or sealing device(s) and establish an hour fire watch patrol." Procedure FPP-2, Revision 3, "Fire Protection-Attachments", implements the above TS requirements. Per FPP-2, Attachment F, Fire Protection Equipment and Barrier Penetration Removal From Service Permit should have been completed and approved by the SOS prior to blocking the fire doors open. Additionally, step 5.7 of FPP-2, Attachment F requires that a copy of the permit shall be placed at the location of the impairment and step 5.0 requires compensatory measures be in place, if required, before the impairment.

While on tour, the NRC inspector noted fire rated door 607 wedged open with two welding leads running down to the landing between Unit 1 & 2 cable spreading rooms. Craftsmen in the area were setting up for work when asked if they had a valid Attachment F. They were unsure and directed the NRC inspector to the job foreman. The NRC inspector was on the way to the ASOS to check the Attachment F printout when fire rated door 455 located by the control bay elevator was observed wedged open. Inspection of the door indicated the door knob was missing, thus it too was impaired. No attachment F was posted. The Attachment F printout did not have either door listed as authorized to be impaired. The SOS was contacted and he had no knowledge of either door being authorized as impaired and no compensatory measures were in effect. The SOS took prompt action on both situations.

The significance of this issue is that both doors are in the main route to the control room. The NRC inspectors observations were made just after shift change. Someone must have passed through one or both of the propped open fire doors before the NRC inspector, but they took no action to resolve the unacceptable condition. This is an example of licensee personnel having "blindness" on while in the plant for situations that are not their primary assignments. Additionally, the individuals who impaired the doors failed to

follow procedures, violated TS, and compromised the BFN fire plan. This is a violation (259, 260, 296/89-33-04, Breach of Fire Rated Door.)

- f. At 10:00 a.m., on August 10, 1989, an engineered safety feature (ESF) actuation occurred when a high radiation isolation signal was received due to the control room air supply duct radiation monitor, 0-RM-90-259B, source being inserted for an unknown reason. There were several pipe insulators working in the vicinity of the radiation monitor and they may have inadvertently caused insertion of the calibration source. The ESF actuation resulted in a control room ventilation isolation and auto start of train "A" of the control room emergency ventilation (CREV) system. The "B" train of CREV was out of service for maintenance. An operability and functional test were performed before placing the radiation monitor back in service. The licensee made a 4-hour non-emergency ENS report to the NRC duty officer. This issue will be followed up during the review of the associated LER.

At 5:50 p.m., on August 10, 1989, diesel generator "B" became inoperable when both starting air compressors were lost during maintenance. This made the "2C" RHR pump and "2C" Core Spray pump inoperable as well. At the time of the event, Loop II of both the RHR system and the Core Spray system for Unit 2 as well as the standby coolant supply valve (1-FCV-23-57) were already inoperable for maintenance. This left only the 2A RHR pump and the 2A Core Spray pump available for makeup to the Unit 2 reactor vessel. With the Unit 2 reactor vessel at atmospheric pressure, the minimum TS requirements are 2 RHR pumps and one Core Spray pump. The licensee made a 4-hour non-emergency ENS report to the NRC duty officer.

The licensee repaired the compressor and returned the DG to service. This issue will be followed up during the review of the associated LER.

Two violations and an unresolved item were identified in the Operational Safety Verification area.

7. Restart Test Program (99030B)

The inspector maintained cognizance of ongoing restart test activities, and monitored particular activities in detail as appropriate. Specific inspection observations during this reporting period involved the activities associated with RTP procedure 2-BFN-RTP-ICF, Revision 000, ICF, Section 5.4, "Turbine Systems Integrated Functional." The overall purpose of the ICF was not only to check out systems, but also to have the various plant operations personnel line up and operate such systems as condensate, reactor building closed cooling water, control rod drive, and feed water. Included within the test procedure is an appendix which was used by the RTP Test Director to document the activities of the operators. This appendix indicated which operator received hands on experience for which system. The activities monitored during this reporting period were those needed to establish a vacuum in the Unit 2

condenser. The NRC inspector noted that all personnel associated with the test demonstrated a professional approach to the required activities and indicated as a group an adequate knowledge of the systems required for establishing the vacuum. The licensee utilized the mechanical vacuum pumps to establish a pressure of 10 inches Hg absolute and shifted to the SJAE to further reduce pressure. The acceptance criteria for this RTP procedure is 30 SCFM to the offgas system from the SJAE. During the first attempt at establishing a vacuum using the SJAE the pressure dropped to approximately one inch Hg absolute with 350 CFM to the offgas system. After identifying several leaks, the licensee was able to lower the CFM to 100.

The NRC inspector noted that during this activity the operators referred to the pressure in the Unit 2 condenser in terms of "vacuum". However, the indicator in the control used by the operators is an absolute pressure indicator which uses inches of mercury. It was also noted that operating procedure 2-0I-66, "Off-Gas System Operating Instructions," Section 5.1, step 5.1.7.26 states:

Verify main condenser vacuum, as indicated on Hotwell Press and Temperature recorder, 2-P-TR-2-2, Panel 2-9-6, is \geq 20 inches Hg.

Notes in the procedure also refer to the pressure in the condenser in terms of vacuum rather than absolute pressure. When the operators were asked about the pressure in the Unit 2 condenser they replied in terms of vacuum such as, the vacuum is indicating 20 inches. The control panel indicator was setting on a reading of 10 inches. This difference between the control room indicator and the procedures was discussed with the licensee.

No violations or deviations were identified in the Restart Test Program area.

8. Site Management and Organization (36301, 36800, 40700)

The licensee was able to accomplish a milestone toward plant recovery by successfully completing a condenser vacuum test. Good planning and work control enabled the test to be carried out and significantly reduce the air in-leakage. During various meetings, the licensee displayed a genuine concern for balance of plant equipment and performance of preventive maintenance items in an effort to upgrade the overall material condition of the plant. Despite the effort made in accomplishing the physical work, the licensee continues to have difficulty closing out the engineering paperwork for work activities. Efforts are being made to improve engineering output with some gains noted. Additional contractor support is being applied to this concern.

9. Exit Interview (30703)

The inspection scope and findings were summarized on August 15, 1989 with those persons indicated in paragraph 1 above. The inspectors described the areas inspected and discussed in detail the inspection findings

listed below. The licensee did not identify as proprietary any of the material provided to or reviewed by the inspectors during this inspection. Dissenting comments were not received from the licensee.

The licensee committed to review the TS LCO associated with URI 259, 260, 296/89-33-02, and to revise the TS to clarify the requirements pertaining to SGBT operability.

<u>Item</u>	<u>Description</u>
259, 260, 296/89-33-01	NCV, Entry Into High Radiation Area Without Proper Monitoring Device, paragraph 4.
259, 260, 296/89-33-02	URI, TS LCO Exceeded for SGBT, paragraph 6.b.
259, 260, 296/89-33-03	VIO, Failure to Follow SI Procedure, paragraph 6.c.
259, 260, 296/89-33-04	VIO, Break of Fire Rated Doors, paragraph 6.e.

11. Acronyms

ASME	American Society of Mechanical Engineers
ASOS	Assistant Shift Operations Supervisor
BFNP	Browns Ferry Nuclear Power Plant
CAQR	Condition Adverse to Quality Report
CFM	Cubic Feet per Minute
DCN	Design Change Notice
DG	Diesel Generator
EECW	Emergency Equipment Cooling Water
Hg	Mercury
ICF	Integrated Cold Functional
LCO	Limiting Condition for Operation
LER	Licensee Event Report
MR	Maintenance Request
NRC	Nuclear Regulatory Commission
RCW	Raw Cooling Water
RHR	Residual Heat Removal
RIR	Radiological Incident Report
RTP	Restart Test Program
RWP	Radiological Work Permit
SDSP	Site Director Standard Practice
SGBT	Standby Gas Treatment System
SI	Surveillance Instruction
SJAE	Steam Jet Air Ejector
SOS	Shift Operations Supervisor
TLD	Thermoluminescent Dosimeter
TS	Technical Specifications
TVA	Tennessee Valley Authority
VIO	Violation

