



UNITED STATES
NUCLEAR REGULATORY COMMISSION
REGION II
SAM NUNN ATLANTA FEDERAL CENTER
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ATLANTA, GEORGIA 30303-8931

April 13, 2001

NOED 2001-2-001

Tennessee Valley Authority
ATTN: Mr. J. A. Scalice
Chief Nuclear Officer and
Executive Vice President
6A Lookout Place
1101 Market Street
Chattanooga, TN 37402-2801

SUBJECT: NRC INTEGRATED INSPECTION REPORT NO. 50-390/00-06 AND
50-391/00-06

Dear Mr. Scalice:

On March 17, 2001, the NRC completed an inspection at your Watts Bar Nuclear Plant, Units 1 and 2. The enclosed report documents the inspection findings which were discussed on March 20, 2001, with Mr. W. Lagergren and other members of your staff.

The inspection examined activities conducted under your license as they relate to safety and compliance with the Commission's rules and regulations and with the conditions of your license. The inspectors reviewed selected procedures and records, observed activities, and interviewed personnel.

No findings of significance were identified.

In accordance with 10 CFR 2.790 of the NRC's "Rules of Practice," a copy of this letter and its enclosure will be available electronically for public inspection in the NRC Public Document Room or from the Publicly Available Records (PARS) component of NRC's document system (ADAMS). ADAMS is accessible from the NRC Web site at <http://www.nrc.gov/NRC/ADAMS/index.html> (the Public Electronic Reading Room).

Sincerely,

/RA/

Paul E. Fredrickson, Chief
Reactor Projects Branch 6
Division of Reactor Projects

Docket Nos. 50-390, 50-391
License No. NPF-90 and Construction
Permit No. CPPR-92

Enclosure: (See page 2)

Enclosure: NRC Inspection Report 50-390/00-06, 50-391/00-06

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U.S. NUCLEAR REGULATORY COMMISSION

REGION II

Docket Nos: 50-390, 50-391
License Nos: NPF-90 and Construction Permit CPPR-92

Report No: 50-390/00-06, 50-391/00-06

Licensee: Tennessee Valley Authority (TVA)

Facility: Watts Bar Nuclear Plant, Units 1 and 2

Location: 1260 Nuclear Plant Road
Spring City TN 37381

Dates: December 17, 2000 through March 17, 2001

Inspectors: J. Bartley, Senior Resident Inspector
D. Rich, Resident Inspector
R. Gibbs, Senior Reactor Inspector
D. Jones, Senior Health Physicist

Approved by: P. Fredrickson, Chief
Reactor Projects Branch 6
Division of Reactor Projects

Enclosure

SUMMARY OF FINDINGS

IR 05000390-00-06, IR 05000391-00-06, on 12/17/2000 - 03/17/2001, Tennessee Valley Authority, Watts Bar, Units 1 & 2.

The inspection was conducted by resident inspectors, a regional radiation specialist, and a regional reactor inspector. No findings of significance were identified. The NRC's program for overseeing the safe operation of commercial nuclear power reactors is described at its Reactor Oversight Process website at <http://www.nrc.gov/NRR/OVERSIGHT/index.html>.

Report Details

Unit 1 operated at or near 100 percent power during the inspection period. Unit 2 remained in a suspended construction status.

On March 6, 2001, via a conference call, the licensee requested and was granted enforcement discretion (Notice of Enforcement Discretion (NOED) 2001-2-001) in order to complete repairs to the 1-I vital inverter. Subsequent to this conference call, the licensee submitted a formal request in a letter, dated March 7, 2001. The NRC issued the NOED, formally, in a letter dated March 8, 2001; however, the repair and testing of the 1-I vital inverter was completed within the technical specifications (TS) allowed outage time and therefore, the NOED was not used.

1. REACTOR SAFETY

Cornerstones: Initiating Events, Mitigating Systems, and Barrier Integrity

IR02 Evaluations of Changes, Tests, or Experiments

a. Inspection Scope

This inspection was conducted to review implementation of the licensee's program for performing changes, tests, and experiments. The objective was to verify that the requirements of 10 CFR 50.59 were met and to verify that NRC approval was not required prior to implementing the changes, tests, and experiments. The inspection was conducted by review of a sample of completed 10 CFR 50.59 safety evaluations performed by the licensee. The sample selected included evaluations from all three reactor safety cornerstones and included the most risk significant evaluations performed by the licensee within the last year. The sample also included all site groups performing evaluations and consisted of evaluations of plant modifications, procedure revisions, changes to the Updated Final Safety Analysis Report (UFSAR), tests, and non-routine operating configurations. The following are 10 CFR 50.59 documents reviewed to evaluate the licensee's program for performing changes, tests, and experiments. The sample included 11 10 CFR 50.59 safety evaluations and 18 documents that had been screened out as not requiring a 10 CFR 50.59 safety evaluation.

10 CFR 50-59 Safety Evaluations Reviewed:

- Design Change Notice (DCN) D-50341-A, Unit 1 Main Generator 100% Stator Ground Fault Protection, Revision 0
- DCN 50440-A, AC and DC Electrical Power Distribution System Review, Revision 0
- DCN D 50506-A, Abandonment of CVCS Positive Displacement Pump, Revision 0
- DCN E-50498-A, Resolution of DDs 99-0096 and 00-0005, Revision 0
- Engineering Document Change E-50372-A, Evaluation of Replacement ERCW Valve 1-FCV-67-9A, Revision 0
- Maintenance Instruction (MI)-61.010, Installation of Equipment to Remove Ice Condenser Water from Lower Containment, Revision 0
- Periodic Instruction 1-PI-OPS-1-MCR, TA to Disable Unit 1 Main Generator 100% Stator Ground Fault Protection, Revision 18

- System Operating Instruction (SOI)-47.02, TA to Disable Unit 1 Main Generator 100% Stator Ground Fault Protection, Revision 24
- Technical Instruction (TI)-100.006, Removal of Two Valves from the IST Program Due to Abandonment of CVCS PD Pump, Revision 5
- TS Change Package TSB-98-012, Revision to T/S Bases Table B 3.8.9-1, Revision 0
- TS Change Package TSB-2000-002, Remove Details of ANSI/ANS - 19.6.1 from TS Basis for Physics Testing, Revision 0

10 CFR 50.59 Screen Outs Reviewed:

- DCN E-50256-A, Clarify minimum RCS Temperature Requirement for Mode 6, Revision 0
- DCN E-50303-A, Evaluation of Alternate Valves for the DG Air Start System, Revision 0
- DCN E-50468-A, Evaluation of Alternate Fisher Pressure Regulators, Revision 0
- DCN E-50395-A, Approval of Installation of Test Adapters at Certain SI System Flow Element Test Connections, Revision 0
- DCN E-50491-A, Provide Technical Requirements for Use of Exhaust Fans in Electrical Board Rooms Based on Outside Temperature, Revision 0
- DCN D-50596-A, Approval of Change to Main Transformer Sudden Pressure Relays, Revision 0
- DCN E-50607-A, Approval of Additional Ice Basket Supports, Revision 0
- DCN E-50673-A, Determination of RCS Flow in Percent and RVLIS Scaling, Revision 0
- Chemistry Manual 6.02, Procedure Change to Provide Additional Space for Chemistry Data, Revision 3
- Fire Operating Requirement 1-FOR-3-1, Procedure Change to Provide Additional Accuracy to Calibration of 1-PI-3- 127, Revision 2
- MI-82.012, Procedure Revised to Provide Verification of Air Start System Operability, Revision 4
- SI 0-SI-18-1, Added Section to Procedure to Remove Water from DG Oil, Revision 4
- SI 1-SI-63-915-B, Procedure Revised to Provide Revised Stroke Time for Valve 1-FCV- 63-11, Revision 4
- SI 1-SI-68-907, Revised Inspection Requirements for SG Tube Inspection, Revision 5
- SI 1-Technical Requirement Instruction (TRI) -74-901-A, Revised to Provide Limits for Outside of Containment RCS Leakage, Revision 3
- SI 1-SI-99-226, Procedure Revised to Delete or Change Items Requiring Response Time Testing, Revision 6
- SI 0-SI-67-901-A, Procedure Changed to Use Test Equipment Installed by DCN, Revision 10
- SI 1-SI-3-903-A, Procedure Revised to Provide Precaution for Erratic Valve Operation, Revision 5

In addition, the inspection included review of the following problem evaluation reports, (PERs) which identified problems with the licensee's 10 CFR 50.59 program, and two recently completed self-assessments of the program to determine its effectiveness.

- PER 99-002319-000 Improper documentation of 10 CFR 50.59 Screening Review (SR)
- PER 99-003620-000 10 CFR 50.59 evaluation not performed for leakage catch basin instruction revision
- PER 99-007545-000 Inappropriate non-intent change was processed for a surveillance instruction which resulted in not obtaining a 10 CFR 50.59 review
- PER 99-014969-000 Safety Assessment/Safety Evaluation(SA/SE) for EDC 50220 lacked sufficient background information
- PER 99-016981-000 10 CFR 50.59 self-assessment identified improper completion of forms for SR/SA/SE
- PER 99-016995-000 Three Enterprise Document Management System (EDMS) problems noted in 10 CFR 50.59 self-assessment
- PER 00-005266-000 Improper submission of 10 CFR 50.59 documents into EDMS
- PER 00-009263-000 Approval of procedure change evaluation that was lacking a 50.59 coversheet
- PER 00-015079-000 Nuclear Assurance assessment identified problems with work flow/audit trail process in CURATOR/EDMS
- PER 00-015189-000 Unqualified personnel conducted 50.59 screening review for 1-TRI-62-902 and also an intent procedural revision resulting from DCN D-50506
- PER 00-016987-000 Incorrect procedure change evaluations identified by NSRB 50.59 subcommittee
- PER 01-003459-000 Incorrect document number placed in 50.59 SR header
- Watts Bar Nuclear Plant (WBN), Browns Ferry Nuclear Plant (BFN), Sequoyah Nuclear Plant (SQN), and Corporate Engineering (CE) - Fiscal Year (FY) 1999 Multi-site 50.59 Self Assessment," November 30, 1999
- Nuclear Assurance-TVAN-Wide- Audit Report No. SSA0006- Engineering Functional Area Audit," February 16, 2001

b. Observations and Findings

No findings of significance were identified.

1R04 Equipment Alignment

.1 Partial Walkdowns

a. Inspection Scope

The inspectors conducted equipment alignment partial walkdowns to evaluate the operability of selected redundant trains or backup systems, listed below, with the other train or system inoperable or out-of-service. The walkdowns included, as appropriate, consideration of plant procedures and reviews of documents to determine correct system lineups, and verification of critical components to identify any discrepancies which could affect operability of the redundant train or backup system.

- 1A Containment Spray System
- 1A Residual Heat Removal System
- 1A Emergency Diesel Generator

b. Findings

No findings of significance were identified.

.2 Complete Walkdown

a. Inspection Scope

The inspectors conducted a complete system walkdown on accessible portions of the Unit 1 component cooling water (CCS) system. The walkdown emphasized material condition and system alignment. The selection of the system was determined using the site specific Individual Plant Examination plant operating mode, and observations from previous walkdowns. The walkdown included reviews of:

- UFSAR Section 9.2, Water Systems
- System Description Manual N3-70-4002, CCS
- SOI-70.01, Component Cooling System, Revision 40
- Open maintenance work requests
- Outstanding design issues including temporary modifications
- Related operator work-arounds
- System health reports

b. Issues and Findings

No findings of significance were identified.

1R05 Fire Protection

.1 Fire Protection - Tours

a. Inspection Scope

The inspectors conducted tours of areas important to reactor safety, listed below, to evaluate, as appropriate, conditions related to (1) licensee control of transient combustibles and ignition sources; (2) the material condition, operational status, and operational lineup of fire protection systems, equipment and features; and (3) the fire barriers used to prevent fire damage or fire propagation.

- Motor and turbine-driven auxiliary feedwater pump areas
- Penetration rooms on 713 and 737 elevations
- CCS pump areas
- Electric board room chiller and air handling unit areas

- Cable spreading room
- Control room emergency ventilation equipment room
- 480 V board room chiller and air handling unit equipment rooms

b. Findings

No findings of significance were identified.

.2 Fire Protection - Drill Observation

a. Inspection Scope

The inspectors observed a fire brigade drill on February 9, 2001, to evaluate the readiness of the plant fire brigade to fight fires. Specific attributes evaluated were: (1) proper wearing of turnout gear and self-contained breathing apparatus; (2) proper use and layout of fire hoses; (3) employment of appropriate fire fighting techniques; (4) sufficient fire fighting equipment brought to the scene; (5) effectiveness of fire brigade leader communications, command and control; (6) search for victims and propagation of the fire into other plant areas; (7) smoke removal operations; (8) utilization of pre-planned strategies; (9) adherence to the pre-planned drill scenario; and (10) drill objectives were met.

b. Findings

No findings of significance were identified.

1R06 Flood Protection Measures

a. Inspection Scope

The inspectors reviewed internal and external flood protection barriers. The inspectors reviewed the flood analysis documents listed below to identify those design features important to flood protection and to identify those areas that can be affected by internal or external flooding. The inspectors also reviewed the condition and test reports and operating instructions listed below which were pertinent to the performance of flood protection equipment.

- UFSAR, sections 2.4, 3.6, and 3.8
- Abnormal Operating Instruction 7.01, Maximum Probable Flood, Revision 6
- MI-17.019, Flood Preparation-Auxiliary Charging System Spool Piece, Revision 6
- TI-50.047, Flood Mode Auxiliary Charging Booster Pump Performance Test, Revision 3
- TI-50.048, Flood Mode Auxiliary Charging Pump 1A Performance Test, Revision 3
- DCN 34564-A and DCN 32864-A, Auxiliary Charging Booster Pumps Did Not Meet Head Curve
- N3-84-4001, Flood Mode Boration Makeup System
- PER 00-011281-000, Auxiliary Charging Booster Pump B Failed to Meet Acceptance Criteria

- PER 99-007569-000, Flood Mode Auxiliary Charging Pump 1A Failed Performance Test
- PER 99-008763-000, Water Observed Leaking Through Watertight Hatch
- Watts Bar-Design Criteria (WB-DC)-40-59, Personnel Access Doors, Revision 3
- WB-DC-20-28, Intake Pumping Station Watertight Doors at Elevation 722.0, Revision 4
- WB-DC-40-60, Special Hatches and Manways, Revision 2
- WB-DC-40-31.51, Evaluating the Effects of Flooding Due to Moderate Energy Pipe Failures Inside and Outside Containment, Revision 3

The inspectors walked down selected areas, listed below, which contain risk important equipment and are below design flood levels to evaluate the adequacy of the flood protection features. The inspectors also reviewed licensee instructions for shutdown in the event of severe flooding and evaluated the availability of selected structures, systems, and components (SSCs), listed below, for safe shutdown under design worst case assumed water levels.

- Intake pumping structure, lower level
- North valve vault room, ground level
- Control building, elevation 708
- Flood mode boration system

b. Issues and Findings

No findings of significance were identified.

1R07 Heat Sink Performance

a. Inspection Scope

The inspectors reviewed the licensee's heat exchanger performance program to verify that potential heat exchanger deficiencies which could mask degraded performance were identified and corrected. The inspectors selected the A and C CCS heat exchangers based on their risk significance. The inspectors observed portions of the cleaning and inspection of the C CCS heat exchanger during Unit 1 Refueling Outage 3 while the licensee was taking corrective actions for clam and silt buildup in the essential raw cooling water system. In addition, the inspectors verified that: (1) test acceptance criteria and results appropriately considered differences between testing conditions and design conditions; (2) inspection results were appropriately categorized against pre-established acceptance criteria and were acceptable; (3) frequency of testing or inspection was sufficient to detect degradation prior to loss of heat removal capabilities below design basis values; and (4) test results considered test instrument inaccuracies and differences. The following documents were reviewed during this inspection:

- TI-79.000, Generic Letter 89-13 Heat Exchanger Test Program, Revision 6
- TI-79.703, Component Cooling System Heat Exchanger C Performance Test, Revision 1

- TI-79.701, Component Cooling System Heat Exchanger A Performance Test, Revision 1
- Work Order (WO) 00-00808-00, Component Cooling System Heat Exchanger C Performance Test, performed September 2000
- WO 98-08546-00, Component Cooling System Heat Exchanger A Performance Test, performed February 1999
- WO 98-08546-01, Component Cooling System Heat Exchanger A Performance Test, performed April 1999
- Calculation EPM-JN-010890, Performance of CCS Heat Exchangers, Revision 7

b. Issues and Findings

No findings of significance were identified.

1R11 Licensed Operator Requalification

a. Inspection Scope

The inspectors observed operators in the plant simulator during licensed operator retraining and the post-training critiques. The inspectors verified emergency operating procedures and radiological emergency plan procedures were followed and observed that the licensee's critique adequately addressed observed weaknesses.

b. Findings

No findings of significance were identified.

1R12 Maintenance Rule Implementation

a. Inspection Scope

The inspectors sampled portions of selected SSCs, listed below, as a result of performance-based problems, to assess the effectiveness of maintenance efforts that apply to scoped SSCs. Reviews focused, as appropriate, on (1) Maintenance Rule scoping in accordance with 10 CFR 50.65; (2) characterization of failed SSCs; (3) safety significance classifications; (4) 10 CFR 50.65 (a)(1) or (a)(2) classifications; and (5) the appropriateness of performance criteria for SSCs classified as (a)(2) or goals and corrective actions for SSCs classified as (a)(1).

- Failure of #4 steam generator power-operated relief valve to fully open
- Failure of #1 steam generator power-operated relief valve to open

b. Findings

No findings of significance were identified.

1R13 Maintenance Risk Assessments and Emergent Work Evaluation

a. Inspection Scope

The inspectors evaluated, as appropriate for the selected SSCs listed below: (1) the effectiveness of the risk assessments performed before maintenance activities were conducted; (2) the management of risk; (3) that, upon identification of an unforeseen situation, necessary steps were taken to plan and control the resulting emergent work activities; and (4) that maintenance risk assessments and emergent work problems were adequately identified and resolved.

- B train motor-driven auxiliary feedwater pump maintenance with concurrent work on #1 steam generator power-operated relief valve
- Concurrent work on B train main control room air conditioner, shutdown board room chiller, and 480 volt board room chiller
- B train control room emergency ventilation system trouble shooting with B train auxiliary building isolation inoperable.
- Failure of 1-I Vital Inverter

b. Findings

No findings of significance were identified.

1R14 Personnel Performance During Non-Routine Plant Evolutions and Events

a. Inspection Scope

The inspectors reviewed personnel performance during a control room isolation and partial auxiliary building isolation caused by inadvertent breaker operation. The inspectors: (1) reviewed operator logs and plant computer data to determine what occurred and how the operators responded; (2) determined if operator responses were in accordance with the response required by procedures and training; (3) evaluated the occurrence and subsequent personnel response using the significance determination process (SDP); and (4) confirmed that personnel performance deficiencies were captured in the licensee's corrective action program.

b. Findings

No findings of significance were identified.

1R15 Operability Evaluations

a. Inspection Scope

The inspectors reviewed selected operability evaluations affecting risk-significant mitigating systems, listed below, to assess, as appropriate: (1) the technical adequacy of the evaluations; (2) whether continued system operability was warranted; (3) whether other existing degraded conditions were considered as compensating measures; (4) where compensatory measures were involved, whether the compensatory measures

were in place, would work as intended, and were appropriately controlled; (5) where continued operability was considered unjustified, the impact on TS Limiting Condition for Operations and the risk significance in accordance with the SDP.

- PER 01-002774-000, Auxiliary Building Isolation Spare Relay Failure
- PER 00-014560-000, Essential Raw Cooling Water Pipe Hanger
67-1ERCW-R479000

b. Findings

No findings of significance were identified.

1R16 Operator Work-Arounds

a. Inspection Scope

The inspectors evaluated a work-around involving frequent rod control urgent failures, for potential effects on the functionality of mitigating systems. The work-around was reviewed to determine: (1) if the functional capability of the system or human reliability in responding to an initiating event was affected; (2) the effect on the operator's ability to implement abnormal or emergency procedures; and (3) if the operator work-around problem was captured in the licensee's corrective action program.

b. Findings

No findings of significance were identified.

1R19 Post-Maintenance Testing

a. Inspection Scope

The inspectors reviewed post-maintenance test procedures and/or test activities, contained in the maintenance documents listed below, for selected risk-significant mitigating systems to assess whether: (1) the effect of testing on the plant had been adequately addressed by control room and/or engineering personnel; (2) testing was adequate for the maintenance performed; (3) acceptance criteria were clear and adequately demonstrated operational readiness consistent with design and licensing basis documents; (4) test instrumentation had current calibrations, range, and accuracy consistent with the application; (5) tests were performed as written with applicable prerequisites satisfied; (6) jumpers installed or leads lifted were properly controlled; (7) test equipment was removed following testing; (8) and equipment was returned to the status required to perform its safety function.

- Implementation of DCN 50494-A, 1.4% power uprate
- WO 01-001765-000, replace eagle partial trip card, solid state protection set rack 5
- WO 00-012594-000, C common station service transformer tap changer calibration
- WO 01-002772-000, repair Train B auxiliary building isolation circuit
- WO 01-002048-000, replace containment wide-range pressure channel 1-LPP-30-311 power supply

- WO 01-003270-000, replace failed transformers in 120 VAC Vital Inverter 1-1
- WO 01-003560-000, troubleshoot turbine-driven auxiliary feedwater pump speed controller

b. Findings

No findings of significance were identified.

1R22 Surveillance Testing

a. Inspection Scope

The inspectors witnessed surveillance tests and/or reviewed test data of selected risk-significant SSCs, listed below, to assess, as appropriate, whether the SSCs met TS, UFSAR, and licensee procedure requirements, and to determine if the testing effectively demonstrated that the SSCs were operationally ready and capable of performing their intended safety functions.

- SI 1-SI-43-211, 31 Day Channel Operational Test LOCA Containment Hydrogen Analyzer Loop 1-H2AN-43-210, Train B, Revision 11
- SI 0-SI-82-11-B, Monthly Diesel Generator Start and Load Test DG 1B-B, Revision 12
- SI 1-SI-1-907, Testing and Setpoint Adjustment of Main Steam Safety Valves Using Trevitest Equipment, Revision 7

b. Findings

No findings of significance were identified.

1R23 Temporary Plant Modifications

a. Inspection Scope

The inspectors reviewed a temporary plant modification, Temporary Alteration Control Form (TACF) 1-01-1-030, related to the removal from service of control rod drive mechanism cooler 1B-B Fan 2. The inspectors reviewed this modification to ensure that the system would still perform its 10 CFR 50 Appendix R safe shutdown cooling function as described in the UFSAR and the Watts Bar Nuclear Plant Fire Protection Report. The inspectors also verified that: 1) the accessible portions of the temporary modification were performed consistent with the TACF documentation; 2) selected plant documents, procedures and drawings, were updated and adequate; and 3) the post-installation test was completed satisfactorily.

b. Issues and Findings

No findings of significance were identified.

2. RADIATION SAFETY

Cornerstone: Occupational Radiation Safety

2PS3 Radiological Environmental Monitoring Program (REMP)

a. Inspection Scope

The inspectors reviewed the licensee's most recent Annual Radiological Environmental Operating Report which described implementation of the REMP during the year 1999 and provided an assessment of the program results. The review included verification that the report included the information required to be reported regarding surveillance results, analysis of data, land use census, interlaboratory comparison program, and 8 permitted program deviations. The review also included verification that the REMP was implemented as required with respect to sampling locations, monitoring and measurement frequencies.

The inspectors observed collection of air particulate filters and charcoal cartridges at four air sampling stations and verified that the samples were collected in accordance with the sampling procedures and that good techniques were used. Calibration procedures and records for the most recent calibration of the gas meters used at those air sampling stations were reviewed to verify that the calibrations were current. The inspectors also verified that thermoluminescence dosimeters were in place at ten locations as described in the Offsite Dose Calculation Manual (ODCM). The inspectors reviewed REMP Self-Assessment Report dated July 27, 2000, and verified that substantive issues were identified and adequately addressed. Calibration procedures and records for the most recent calibrations of the meteorological monitoring instruments for air temperature and for wind speed and direction were also reviewed. The inspectors verified that the instruments were operable and that current meteorological conditions were available in the control room. Surveys of potentially contaminated materials being released from the radiologically controlled area for unrestricted use were also observed. The inspectors verified that appropriate criteria were used for unrestricted release of potentially contaminated materials, that appropriate instrumentation was used for those surveys, and that the instruments were calibrated with appropriate sources. The effectiveness of characterization and resolution of selected radiation monitoring related issues identified during April 2000 through January 2001 was evaluated by the inspectors. Through the above reviews and observations, the licensee's practices and implementation of their radiological monitoring program, meteorological monitoring program, and radioactive material control program were evaluated by the inspectors for consistency with the ODCM, and UFSAR, TS and 10 CFR Part 20 requirements.

The following licensee procedures were reviewed:

- Satellite Collection (SC)-01, Collection of Environmental Monitoring Samples
- SC-03, Calibration Procedure for Radiological Environmental Monitoring Air Sampler System Gas Meter

- Emergency Preparedness Field Support EPFS-6, Calibration of Environmental Data Station Data Logger and Sonic Channels
- SI 1-SI-0-2-00, Shift and Daily Surveillance Log
- Standard Program and Process SPP-5.1, Radiological Controls
- Radiological Control Instruction RCI-101, Radiation, Contamination, and Airborne Surveys
- RCI-102, Contamination and Hot Particle Control
- RCI-103, Radioactive Material Control

b. Findings

No findings of significance were identified.

4. Other Activities

4OA1 Performance Indicator (PI) Verifications

Licensee records were reviewed to determine whether the submitted PI statistics were calculated in accordance with the guidance contained in Nuclear Energy Institute 99-02, Regulatory Assessment Performance Indicator Guideline, Revision 0.

.1 Initiating Events Cornerstone

a. Inspection Scope

The inspectors reviewed operating logs and monthly operating reports for the period of April 1, 2000, through February 28, 2001, to verify the accuracy and completeness of the Unplanned Scrams Per 7000 Critical Hours and Scrams With Loss of Normal Heat Removal PIs.

b. Findings

No findings of significance were identified.

.2 Mitigating Systems Cornerstone

a. Inspection Scope

The inspector reviewed operating logs and TS LCO entry records for the period of October 1 through December 31, 2000, to verify the accuracy and completeness of the High Pressure Injection and Residual Heat Removal Safety System Unavailability PIs.

b. Findings

No findings of significance were identified.

.3 Barrier Integrity Cornerstone

a. Inspection Scope

The inspector reviewed the chemistry results database for reactor coolant system (RCS) dose equivalent iodine for the period of July 1 through December 31, 2000, to verify the accuracy and completeness of the RCS Specific Activity PI.

b. Findings

No findings of significance were identified.

4OA5 Management Meetings

The inspectors presented the inspection results to Mr W. Lagergren and other members of licensee management at the conclusion of the inspection on March 20, 2001. The licensee acknowledged the findings presented.

The inspectors asked the licensee whether any of the material examined during the inspection should be considered proprietary. No proprietary information was identified.

PARTIAL LIST OF PERSONS CONTACTED

Licensee

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 D. Boone, Radiological Control Manager
 L. Bryant, Plant Manager
 S. Casteel, Radiological and Chemistry Control Manager
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NRC

J. Bartley, Senior Resident Inspector
 D. Rich, Resident Inspector

ITEMS OPENED AND CLOSED

Opened

None

Opened and Closed

None