



UNITED STATES
NUCLEAR REGULATORY COMMISSION
REGION II
245 PEACHTREE CENTER AVENUE, SUITE 1200
ATLANTA, GEORGIA 30303-1257

October 26, 2011

Mr. Jon A. Franke
Vice President, Crystal River Nuclear Plant
Crystal River Nuclear Plant (NA2C)
15760 W. Power Line Street
Crystal River, FL 34428-6708

SUBJECT: CRYSTAL RIVER UNIT 3 – NRC INTEGRATED INSPECTION REPORT
05000302/2011004

Dear Mr. Franke:

On September 30, 2011, the US Nuclear Regulatory Commission (NRC) completed an inspection at your Crystal River Unit 3. The enclosed integrated inspection report documents the inspection findings which were discussed on October 13, 2011, with you and other members of your staff.

The inspection examined activities conducted under your license as they related 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. Based on the results of this inspection, no findings were identified.

In accordance with 10 CFR 2.390 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 the NRC's document system (ADAMS). Adams is accessible from the NRC Web site at <http://www.nrc.gov/reading-rm/adams.html> (the Public Electronic Reading Room).

Sincerely,

/RA/

Daniel W. Rich, Chief
Reactor Projects Branch 3
Division of Reactor Projects

Docket No. 50-302
License No. DPR-72

Enclosure: Inspection Report 05000302/2011004
w/Attachment: Supplemental Information

cc w/encl: (See page 2)

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DATE	10/25/2011	10/25/2011	10/12/2011	10/12/2011	10/26/2011		
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3

Letter to J. Franke from Daniel W. Rich dated October 26, 2011

SUBJECT: CRYSTAL RIVER UNIT 3 – NRC INTEGRATED INSPECTION REPORT
05000302/2011004

Distribution w/encl:

C. Evans, RII

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OE Mail

RIDSNRRDIRS

PUBLIC

RidsNrrPMCrystal River Resource

U.S. NUCLEAR REGULATORY COMMISSION

REGION II

Docket No.: 50-302

License No.: DPR-72

Report No.: 05000302/2011004

Licensee: Progress Energy (Florida Power Corporation)

Facility: Crystal River Unit 3

Location: Crystal River, FL

Dates: July 1, 2011 – September 30, 2011

Inspectors: T. Morrissey, Senior Resident Inspector
N. Childs, Resident Inspector

Approved by: D. Rich, Chief,
Reactor Projects Branch 3
Division of Reactor Projects

Enclosure

SUMMARY OF FINDINGS

IR 05000302/2011004; 07/01/2011-09/30/2011, Crystal River Unit 3; Routine Integrated Report.

The report covered a three month period of inspection by the resident inspectors. The NRC's program for overseeing the safe operation of commercial nuclear power reactors is described in NUREG-1649, "Reactor Oversight Process", Revision 4, dated December 2006.

A. NRC Identified & Self-Revealing Findings

No findings were identified

B. Licensee-Identified Violations

None

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REPORT DETAILS

Summary of Plant Status:

Crystal River 3 began the inspection period in “No Mode” with the full core off-loaded to the spent fuel pool. The unit remained in this condition for the remainder of the inspection period.

REACTOR SAFETY

Cornerstones: Initiating Events, Mitigating Systems, Barrier Integrity

1R04 Equipment Alignment

.1 Partial Equipment Walkdowns

a. Inspection Scope

The inspectors performed walkdowns of the critical portions of selected trains to verify correct system alignment. The inspectors reviewed plant documents to determine the correct system and power alignments, and the required positions of select valves and breakers. The inspectors verified that the licensee had properly identified and resolved equipment alignment problems that could cause initiating events or impact mitigating system availability. The inspectors verified the following three partial system alignments through system walkdowns. Documents used to facilitate the system walkdowns are listed in the attachment.

- control complex chiller CHHE-1A while CHHE-1B was out of service for planned maintenance
- “A” train decay heat removal (DHR), raw water (RW), and decay heat closed cycle cooling (DC) systems while “B” train emergency core cooling system (ECCS) was out of service for a planned outage
- decay heat closed cycle cooling pump DCP-1A, emergency diesel generator EGDG-1A, 4160 volt engineered safeguards (ES) bus 3A, and 480 volt ES bus 3A while DCP-1B was out of service for planned maintenance

b. Findings

No findings were identified

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1R05 Fire Protection

Fire Area Walkdowns

a. Inspection Scope

The inspectors walked down accessible portions of the plant to assess the licensee's implementation of the fire protection program. The inspectors checked that the areas were free of transient combustible material and other ignition sources. Also, fire detection and suppression capabilities, fire barriers, and compensatory measures for fire protection problems were verified. The inspectors checked fire suppression and detection equipment to determine whether conditions or deficiencies existed which could impair the function of the equipment. The inspectors selected the areas based on a review of the licensee's probabilistic risk assessment. The inspectors also reviewed the licensee's fire protection program to verify the requirements of final safety analysis report (FSAR) Section 9.8, Plant Fire Protection Program, were met. Documents reviewed are listed in the attachment. The inspectors toured the following five areas important to safety:

- auxiliary building spent fuel pool area
- motor control center (MCC) 3A1 and 3B1 areas
- HVAC equipment fan room (control complex 164' elevation)
- fire pump house
- emergency feedwater pump EFP-3 building

b. Findings

No findings were identified.

1R11 Licensed Operator Requalification Program

Resident Inspector Quarterly Review

a. Inspection Scope

On August 8, 2011, the inspectors observed and assessed licensed operator crew response and actions for Crystal River Unit 3 licensed operator simulator evaluated session SES-130.

Session SES-130 involved a pressurizer level transmitter failure, a pressurizer steam space leak and loss of coolant accident (LOCA) resulting in a rapid reactor coolant system (RCS) pressure reduction, an automatic transient without scram (ATWS) event requiring a manual reactor trip, and several high pressure injection (HPI) equipment failures. The plant degraded to a point where the licensee entered an Unusual Event, followed by an Alert emergency declaration. The inspectors observed the operators' use of emergency operating procedures EOP-02, Vital System Status Verification, EOP-03,

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Inadequate Subcooling Margin, EOP-08A, LOCA Cooldown, and abnormal procedure AP-520, Loss of RCS Coolant or Pressure.

The operators' actions were verified to be in accordance with the above procedures. Event classification and notifications were verified to be in accordance with emergency management procedure EM-202, Duties of the Emergency Coordinator. The simulator instrumentation and controls were verified to closely parallel those in the actual control room. The inspectors attended the crew critique and evaluation to verify the licensee had entered any adverse conditions into the corrective action program. The inspectors evaluated the following attributes related to crew performance:

- clarity and formality of communication
- ability to take timely action to safely control the unit
- prioritization, interpretation, and verification of alarms
- correct use and implementation of abnormal and emergency operation procedures; and emergency plan implementing procedures
- control board operation and manipulation, including high-risk operator actions
- oversight and direction provided by supervision, including ability to identify and implement appropriate technical specification actions, regulatory reporting requirements, and emergency plan classification and notification
- crew overall performance and interactions

b. Findings

No findings were identified.

1R12 Maintenance Effectiveness

a. Inspection Scope

The inspectors reviewed the licensee's effectiveness in performing routine maintenance activities. The review included the identification, scope, and handling of degraded equipment conditions, as well as common cause failure evaluations, and the resolution of historical equipment problems. For those systems, structures, and components within the scope of the Maintenance Rule (MR) per 10 CFR 50.65 (a)(1) and (a)(2), classifications were justified in light of the reviewed degraded equipment condition. The documents reviewed are listed in the attachment. The inspectors conducted this inspection for the following two items:

- system engineering (SE) report SE 11-0029, transition of condensate (CD) system from MR (a)(1) to (a)(2)
- SE 11-0036, transition of reactor coolant (RC) system instrument reliability performance monitoring group (PMG) from (a)(1) to (a)(2)

b. Findings

No findings were identified.

1R15 Operability Determinations and Functionality Assessments

a. Inspection Scope

The inspectors reviewed two condition reports (CRs) to verify that operability or functionality of systems important to safety was properly established, that the affected components or systems remained capable of performing their intended design functions, and that no unrecognized increase in plant or public risk occurred. The inspectors assessed whether operability or functionality assessments of systems or components important to safety were consistent with the improved technical specifications (ITS), the FSAR, 10 CFR Part 50 requirements, and when applicable, NRC Inspection Manual Part 9900, Technical Guidance - Operability Determinations & Functionality Assessments for Resolution of Degraded or Nonconforming Conditions Adverse to Quality or Safety. The inspectors reviewed licensee CRs, work schedules, and engineering documents to verify that operability and functionality issues were being identified at an appropriate threshold and documented in the corrective action program, consistent with 10 CFR 50, Appendix B requirements as well as licensee corrective action procedure CAP-NGGC-0200, Condition Identification And Screening Process. Additional documents reviewed are listed in the attachment.

- CR 470742, spent fuel pool leakage requiring operation at lower level (structural integrity perspective)
- CR 465799, EGDG bearing oil analysis results show continued high iron (FE) particle counts

b. Findings

No findings were identified.

1R18 Plant Modifications

Permanent Plant Modifications

a. Inspection Scope

The inspectors reviewed the two engineering change (EC) packages listed below to verify they met the requirements of engineering procedures EGR-NGGC-0003, Design Review Requirements, and EGR-NGGC-0005, Engineering Change. The inspectors observed the installation and as-built configuration of the modifications and observed testing activities associated with the modifications. Documents reviewed included surveillance procedures, design and implementation packages, work orders (WOs), system drawings, corrective action documents, applicable sections of the FSAR, ITS, and design basis information. Post maintenance testing data and acceptance criteria were also reviewed. The inspectors verified that issues found during the course of the installation and testing associated with the modification were entered and properly dispositioned in the licensee's corrective action program.

- EC 74750, EGDG air receiver tank inlet check valves; replacement with in-line resilient seat check valves
- EC 72263, reroute drains for raw water pump (RWP) flush flows to the raw water pump pits

b. Findings

No findings were identified.

1R19 Post Maintenance Testing

a. Inspection Scope

The inspectors either witnessed or reviewed post-maintenance test procedures and test activities, as appropriate, for selected risk significant systems to verify whether: (1) testing was adequate for the maintenance performed, (2) acceptance criteria were clear, and adequately demonstrated operational readiness consistent with design and licensing basis documents, (3) test instrumentation had current calibrations, range, and accuracy consistent with the application, (4) tests were performed as written with applicable prerequisites satisfied, and (5) equipment was returned to the status required to perform its safety function. The six post-maintenance tests reviewed are listed below:

- SP-370, Quarterly Cycling of Valves (Section 4.8.15 only for MUV-586), after performing planned maintenance per WO 1832174
- EGDG air receiver tank check valve EGV-23 and -24 testing per WOs 1745334 and 1745335 after valve replacements
- SP-354A, Monthly Functional Test of EGDG-1A (fast start), after generator bearing oil flush per WO 1946374
- SP-435, Valve Testing During Cold Shutdown (Section 4.1 for decay heat valve DHV-6 only), after planned maintenance per WOs 1726462, 1727012, and 1711997
- SP-354A, Monthly Functional Test of EGDG-1A (fast start), after diesel jacket pump DJP-1 seal replacement per WO 1957579
- SP-340A, RWP-3A, DCP-1A, and Valve Surveillance, after planned maintenance on RWP-3A per WOs 1703488, 1724085, and 1824144

b. Findings

No findings were identified.

1R20 Refueling and Outage Activities

Steam Generator Replacement Refueling Outage (RFO16)

a. Inspection Scope

On September 26, 2009, the unit was shut down for a steam generator replacement refueling outage. The previous quarter's NRC inspection activities in this area were

documented in NRC integrated inspection report 05000302/2011003. During this quarter, the inspectors observed and monitored licensee controls over the outage activities listed below. Documents reviewed are listed in the attachment.

- outage related risk assessment monitoring
- controls associated with reactivity management
- controls associated with electrical and mechanical alignments for those systems used to support spent fuel pool cooling
- implementation of equipment clearance activities

b. Findings

No findings were identified.

1R22 Surveillance Testing

a. Inspection Scope

The inspectors either observed or reviewed the four surveillance tests listed below to verify that ITS surveillance requirements were followed and that test acceptance criteria were properly specified. The inspectors verified that proper test conditions were established as specified in the procedures, that no equipment preconditioning activities occurred, and that acceptance criteria had been met. Additionally, the inspectors also verified that equipment was properly returned to service and that proper testing was specified and conducted to ensure that the equipment could perform its intended safety function following maintenance or as part of surveillance testing.

In-Service Test:

- SP-334A, Spent Fuel Pool Pump 1A (SFP-1A) Quarterly Surveillance
- SP-334B, SFP-1B Quarterly Surveillance

Surveillance Test:

- SP-904A, Calibration of 4160 Volt ES "A" Bus Undervoltage and Bus Degraded Grid Relays
- SP-602, ASME Section XI Relief Valve Testing (Section 9.5 for DHV-70 only)

b. Findings

No findings were identified.

4. OTHER ACTIVITIES

4OA1 Performance Indicator (PI) Verification

Initiating Events and Mitigating Systems Cornerstones

a. Inspection Scope

The inspectors checked licensee submittals for the PIs listed below for the period July 1, 2010 through June 30, 2011 to verify accuracy. Performance indicator definitions and guidance contained in NEI 99-02, "Regulatory Assessment Performance Indicator Guideline," Rev. 6, were used to check the reporting for each data element. The inspector checked licensee events reports, operator logs, and daily plant status reports to verify the licensee accurately reported the data. The inspectors checked that any deficiencies affecting the licensee's performance indicator program were entered into the corrective action program (CAP) and appropriately resolved.

- Safety System Functional Failures

b. Findings

No findings were identified.

4OA2 Problem Identification and Resolution

.1 Daily Review

a. Inspection Scope

As required by Inspection Procedure 71152, Identification and Resolution of Problems, and in order to help identify equipment failures or specific human performance issues for follow-up, the inspectors performed a daily screening of items entered into the licensee's CAP. This review was accomplished by attending daily plant status meetings, interviewing plant operators and applicable system engineers, and accessing the licensee's computerized database.

b. Findings

No findings were identified.

.2 Annual Sample Review

a. Inspection Scope

The inspectors reviewed priority 2 condition report (CR) 472053 that addressed an issue with the vital bus inverter VBIT-1A rectifier master control board. The vital bus inverter would not swap to the AC source when a new master control board (X-302) was installed; only the existing (old) master control board would work in VBIT-1A. The

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inspectors checked that the issues were completely and accurately identified in the licensee's corrective action program, safety concerns were properly classified and prioritized for resolution, cause determination was sufficiently thorough, and appropriate corrective actions were initiated. The inspectors also evaluated the CR using the requirements of the licensee's CAP as delineated in corrective action procedure CAP-NGGC-0200, Condition Identification and Screening Process.

b. Findings and Observations

No findings were identified. The licensee had not observed this issue in similar inverters and determined that the configuration of VBIT-1A was apparently different from similar inverters such that only the old master control board would work in VBIT-1A. Through troubleshooting with the vendor, it was discovered that the installed slave control board (X-304) for VBIT-1A had an additional integrated circuit chip installed that should not have been. The licensee verified that the replacement X-304 boards in the warehouse did not have the additional chip. The issue was resolved by installing replacement X-302 and X-304 boards in VBIT-1A. However, the licensee was not able to determine why the old X-302 board worked with the X-304 board with the additional chip. The licensee initiated CR 481415 to evaluate the issue of the additional chip installed on the X-304 board. The inspectors noted that the licensee took appropriate actions to address the identified deficiencies. The inspectors found that the investigation was thorough and complete, and the assigned corrective actions addressed the issue.

.3 Annual Sample Review

a. Inspection Scope

The inspectors reviewed the licensee's equipment layup plan that was initiated as a result of the extended outage. The inspectors reviewed Plant Layup Plan, Revision 2, RCS Extended Outage Primary Side Layup, Revision 6, and Unit Preservation Plan, Revision 0, to verify the plans were comprehensive and properly implemented. The inspectors' review focused on systems that are not routinely operated or surveillance tested. The review focused on the building spray, emergency feed water, makeup, reactor coolant and once through steam generator (OTSG) systems. The inspectors reviewed the licensee's work management database to verify preventative maintenance items associated with the above systems had been completed. In addition, the inspectors interviewed several system engineers to determine if they had a firm understanding of the layup requirements for their systems. Additional documents reviewed are in the attachment.

b. Findings and Observations

No findings were identified. The inspectors determined that layup conditions for the selected systems had been established for the systems reviewed with the exception of the diesel driven emergency feed water pump EFP-3. After discussion with the licensee, condition report CR 487407 was initiated to evaluate the timeliness of implementing the preservation plan.

.4 Semi-Annual Trend Review

a. Inspection Scope

As required by Inspection Procedure 71152, Identification and Resolution of Problems, the inspectors performed a review of the licensee's CAP and associated documents to identify trends that could indicate the existence of a more significant safety issue. The inspectors' review was focused on repetitive equipment issues, but also considered the results of daily inspector CAP item screening discussed in section 4OA2.1 above, plant status reviews, plant tours, and licensee trending efforts. The inspectors' review nominally considered the six month period of April 2011 through September 2011, although some examples extended beyond those dates when the scope of the issue warranted. The review also included issues documented in various departmental CAP Rollup & Trend Analysis reports for the 1st and 2nd quarters of 2011, the licensee's Plant Health Committee Site Focus List – September 2011, daily operator log entries, and maintenance rule (MR) reports. Corrective actions associated with a sample of the issues identified in the licensee's corrective action program were reviewed for adequacy.

b. Findings and Observations

No findings were identified. The inspectors evaluated the licensee's trend methodology and observed that the licensee had performed adequate trending reviews and appropriately addressed identified trends within the CAP. The inspectors did not identify any new trends.

4OA5 Other Activities

.1 Quarterly Resident Inspector Observations of Security Personnel Activities

a. Inspection Scope

During the inspection period, the inspectors conducted observations of security force personnel and activities to ensure that the activities were consistent with licensee security procedures and regulatory requirements relating to nuclear plant security. These observations took place during normal and off-normal plant working hours.

These quarterly resident inspector observations of security force personnel and activities did not constitute any additional inspection samples. Rather, they were considered an integral part of the inspectors' normal plant status reviews and inspection activities.

b. Findings

No findings were identified.

.2 Steam Generator Replacement Project and Containment Wall Repair (IP 50001)

a. Inspection Scope

The inspectors reviewed the issues below associated with the reactor containment building repair. Documents reviewed are listed in the attachment.

Condition of reactor containment wall bordered by buttresses 5 and 6 (Bay 5-6)

During this quarter, the inspectors observed and monitored the licensee's actions in response to cracking or delamination that was identified during a previous inspection period (documented in NRC integrated inspection report 05000302/2011002). The inspectors reviewed licensee activities associated with installation of temporary radial anchor bolts on the outer surface of the containment wall in Bay 5-6. The anchor bolts function to limit the propagation of the delamination by providing a compressive load on the concrete. The inspectors observed the installation of several anchor bolts to verify that the work was properly conducted per approved work documents.

Condition of reactor containment wall bordered by buttresses 1 and 2 (Bay 1-2)

On July 26, 2011, acoustical monitors indicated a high level of acoustic activity in Bay 1-2. The initial licensee inspection found that an approximately 1 inch thick piece of concrete had fallen from Bay 1-2 onto the intermediate building 119' elevation. The falling concrete had no adverse effect on safety-related equipment. The area of spalled concrete measured about 3 to 4 feet wide by 12 feet long. Additional inspections found surface cracks at higher elevations above the intermediate building adjacent to buttresses 1 and 2. Non-destructive examination using impulse response testing was utilized to determine the condition of the concrete. At the close of this inspection period, impulse response testing of Bay 1-2 had not been completed, but numerous indications consistent with cracking or delamination within the concrete wall of Bay 1-2 had been detected. Those delaminations appeared to have propagated in a plane parallel to the surface of the containment wall. At the end of the inspection period, the licensee had installed temporary radial anchor bolts in Bay 1-2 to prevent the propagation of the delamination. The inspectors observed the installation of several anchor bolts to verify that the work was properly conducted per approved work documents.

Temporary Anchor installation in Bays 2-3, 4-5, and 6-1

During this inspection period, the licensee completed installation of temporary radial anchor bolts in each of these bays just above the roof line of the adjacent buildings. In the event of a delamination of any of the bays, the anchors bolts should prevent the delamination from propagating into the lower elevations of the reactor building. The inspectors observed the installation of several anchor bolts to verify that the work was properly conducted per approved work documents.

Detensioning of all reactor building vertical tendons to 75 percent

During this inspection period, the licensee detensioned all the vertical tendons to 75 percent tension. The licensee determined that this partial detensioning would reduce stresses in the reactor building concrete and would add additional margin to any further delamination events. The inspectors reviewed the licensee's vertical tendon detensioning plans, procedures, and drawings. Partial detensioning began on August 16 and was completed on August 20, 2011. The inspectors observed some of the detensioning work on selected tendons as it was being performed to verify that the work was properly conducted per approved work documents.

b. Findings

No findings were identified.

40A6 ExitExit Meeting Summary

On October 13, 2011, the resident inspectors presented the inspection results to Mr. J. Franke, Site Vice President, and other members of licensee management. The inspectors confirmed that proprietary information was not provided or examined during the inspection.

ATTACHMENT: SUPPLEMENTAL INFORMATION

KEY POINTS OF CONTACT

Licensee personnel:

B. Akins, Superintendent, Radiation Protection
S. Cahill, Manager, Engineering
P. Dixon, Manager Training
D. Douglas, Manager, Maintenance
J. Franke, Vice President, Crystal River Nuclear Plant
D. Herrin, Licensing Engineer
T. Hobbs, (Interim) Plant General Manager
J. Huegel, Manager, Nuclear Oversight
C. Poliseno, Supervisor, Emergency Preparedness
J. Swartz, Director, Site Operations
D. Westcott, Supervisor, Licensing
B. Wunderly, Manager, Operations

NRC personnel:

D. Rich, Chief, Branch 3, Division of Reactor Projects

LIST OF ITEMS OPENED, CLOSED

Opened and Closed

None

LIST OF DOCUMENTS REVIEWED

Section 1R04: Equipment Alignment

Procedures

OP-409, Plant Ventilation System
OP-404, Decay Heat Removal System
OP-408, Nuclear Services Cooling System
OP-700A, 6900, 4160, and 480 Volt AC Buses

Section 1R05: Fire Protection

Condition Reports (CRs)

479433, NRC finds procedural error in AI-2205C
479620, NRC identified – AI-2205A transposition error

Procedures

AI-2205A, Pre Fire Plan – Control Complex
AI-2205C, Pre Fire Plan – Auxiliary Building
AI-2205F, Pre Fire Plan – Miscellaneous buildings and Components

Section 1R12: Maintenance Effectiveness

CRs

261226, CDP-1B decoupled and caused rapid power reduction
227266, Repetitive maintenance rule functional failure of pressurizer level recorder

Other

System Engineering Report SE 08-0068, CD System Exceeded (a)(1) Goal
SE 11-0038, 8/11/11 Maintenance Rule Expert Panel Meeting Minutes
Reactor Coolant (RC) system health report (Q2-2011)
Condensate (CD) system health report (Q2-2011)

Section 1R15: Operability Determinations and Functionality Assessments

Procedures

SP-300, Operating Daily Surveillance Log

Section 1R18: Plant Modifications

Procedures

SP-370, Quarterly Cycling of Valves

Drawings

Piping and Instrument Flow Diagram 302-282, Sheet 1, Rev 31

Engineering Changes (ECs)

76711, EC 74750 Child – Replace EGV-23 with in-line resilient seats
76712, EC 74750 Child – Replace EGV-24 with in-line resilient seats

Work Orders (WOs)

1745334, Implement Child EC 76712, replace EGV-24
1745335, Implement Child EC 76711, replace EGV-23
1519589, Install EC 72263 to Modify Pump Packing Gland Leakoff Line

Section 1R19: Post Maintenance Testing

CRs

477817, EGV-24 failed PMT
477946, EGV-23 failed PMT
488420, SP-340A Delays
488438, SP-340A Delayed due to Improper Discharge Pressure

Section 1R20: Refueling and Outage Activities

Procedures

AI-504, Guidelines for Cold Shutdown and Refueling
WCP-102, Outage Risk Management

Section 1R22: Surveillance Testing

CRs

476364, Removed DHV-70 failed to meet setpoint criteria
480590, During SP-904A, "A" SLUR relay #0461 had to be recalibrated

WOs

1906368, SFP-1A Quarterly Surveillance
1926029, SFP-1B Quarterly Surveillance
1738122, SP-904A 4160 Volt A Bus UV and Bus Deg Grid Relays
1544259, DHV-70 Relief valve testing

Section 40A2: Problem Identification and Resolution

Procedures

CAP-NGGC-0200, Condition Identification and Screening Process
CAP-NGGC-0206, Nuclear Generation Group (NGG) Performance Assessment and Trending

CRs

481766, Found Bad/Swollen Capacitor during Troubleshooting on VBIT-1A

WOs

1400178, Vital inverter VBIT-1A troubleshooting
1732050, Makeup pumps periodic rotation during dry layup
1614326, Reactor coolant pumps periodic rotation during extended shutdown
1732051, Auxiliary feedwater pump periodic rotation during dry layup

Section 40A5: Other Activities

CRs

475123, Bay 5/6 expanded delamination
478650, Spalled concrete in intermediate building

Other

Acoustic Sound System Graphs and Records
EC 82247, Partial Detension Vertical Tendons
EC 79831, Installation of Delamination Control Anchor Bolts
EC 82354, Evaluate Sequence of Containment Delamination Mitigation Strategies
EC 81283, Containment Repair Options