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Report No.: 50-416/8	7-26	
Licensee: System Ener Jackson, MS	rgy Resources, Inc. S 39205	
Docket No.: 50-416		License No.: NPF-29
Facility Name: Grand	Gulf	
Inspection Conducted: Inspector: R. C. Butche J. L. Mathie Approved by: H. C. Danc Division d	September 19 - October 16, 1987 Dancer, Senior Resident, Inspector Senior Resident Inspector S, Resident Inspector Cancer Ce, Section Chief of Reactor Projects	$\frac{10/27/87}{\text{Date Signed}}$ $\frac{10/27/87}{\text{Date Signed}}$ $\frac{10/27/87}{\text{Date Signed}}$

## SUMMARY

Scope: This routine inspection was conducted by the resident inspectors at the site in the areas of Licensee Action on Previous Enforcement Matters, Operational Safety Verification, Maintenance Observation, Surveillance Observation, ESF System Walkdown, Reportable Occurrences, Operating Reactor Events, and Inspector Followup and Unresolved Items.

Results: One violation was identified. Failure to document and evaluate test discrepancies during Standby Liquid Control System testing.

## REPORT DETAILS

- 1. Licensee Employees Contacted
  - J. E. Cross, GGNS Site Director
  - \*C. R. Hutchinson, GGNS General Manager
  - R. F. Rogers, Manager, Unit 1 Projects
  - A. S. McCurdy, Manager, Plant Operations
  - \*J. D. Bailey, Compliance Coordinator \*M. J. Wright, Manager, Plant Support

  - \*L. F. Daughtery, Compliance Superintendent
  - D. G. Cupstid, Start-up Supervisor
  - R. H. McAnulty, Electrical Superintendent
  - \*J. P. Dimmette, Manager, Plant Maintenance
  - W. P. Karris, Compliance Coordinator
  - J. L. Robertson, Licensing Superintendent \*L. G. Temple, ï & C Superintendent

  - J. H. Mueller, Mechanical Superintendent
  - L. B. Moulder, Operations Superintendent
  - J. V. Parrish, Chemistry/Radiation Control Superintendent
  - S. M. Feith, Director, OA

Other licensee employees contacted included technicians, operators, security force members, and office personnel.

\*Attended exit interview

2. Exit Interview (30703)

> The inspection scope and findings were summarized on October 16, 1987, with those persons indicated in paragraph 1 above. The licensee did not identify as proprietary any of the materials provided to or reviewed by the inspectors during this inspection. The licensee had no comments on the following inspection findings:

416/87-26-01, Inspector Followup Item: Specify allowable voltage tolerances in surveillance procedures. (paragraph 6)

416/87-26-02, Inspector Followup Item: Revise surveillance procedures to incorporate steps for placing Standby Service Water motor operated valves in test mode. (paragraph 6)

416/87-26-03. Violation: Failure to document and evaluate test discrepancies during Standby Liquid Control System testing. (paragraph 10)

## 3. Licensee Action on Previous Enforcement Matters (92702)

(Closed) Violation 416/87-10-10. The background of this violation was discussed in Inspection Reports 416/87-01, 416/87-05 and 416/87-10. The licensee conducted a complete inspection of the Control Rod Drive (CRD) Hydraulic Control Units (HCUs) for adherence to installation requirements and corrected identified discrepancies. Material Nonconformance Report (MNCR) 0079-87 documented the licensee's inspection findings and actions. To establish the acceptability of Reactor Control Incorporated (RCI) construction work, a walkdown was performed on RCI designed and installed pir supports, Hoffman box supports and raceway supports. The results of this inspection were documented in the licensee's internal letter (PMI 87/34218) dated June 30, 1987. Corrective Action Request (CAR) No. 2249 documents the discrepancies identified and corrective actions taken.

## 4. Operational Safety, Radiological Protection and Physical Security Verification (71707, 71709 and 71881)

The inspectors kept themselves informed on a daily basis of the overall plant status and any significant cafety matters related to plant operations. Daily discussions were held with plant management and various members of the plant operating staff.

The inspectors made frequent visits to the contact room such that it was visited at least daily when an inspector was on site. Observations included instrument readings, setpoints and recordings, status of operating systems, tags and clearances on equipment controls and switches, annunciator alarms, adherence to limiting conditions for operation, temporary alterations in effect, daily journals and data sheet entries, control room manning, and access controls. This inspection activity included numerous informal discussions with operators and their supervisors.

Weekly, when the inspectors were onsite, selected ingineered Safety Feature (ESF) systems were confirmed operable. The confirmation is made by verifying the following Accessible valve flow path alignment, power supply treaker and fuse status, major component leakage, lubrication, cooling and general condition, and instrumentation.

General plant yours were conducted on at least a biweekly basis. Portions of the control building, turbine building, auxiliary building and outside areas were visited. Observations included safety related tagua. verifications sait turnover, sampling program, housekeeping and general plant conditions, fire protection equipment, control of activities in progress, problem identification systems, and containment isolation. At least monthly, the license is onsite emergency response facilities were toured to determine facility readiness. Monthly, the inspectors reviewed at least one Radiation Work Permit (RWP), observed health physics management involvement and awareness of significant plant activities, and observed plant radiation controls. At least quarterly the inspectors reviewed the licensee's program to limit personnel radiation exposure As Low As Reasonably Achievable (ALARA). Monthly, the inspectors verified licensee compliance with physical security manning and access control requirements. At least quarterly the inspectors verified the adequacy of physical security detection and assessment aids.

No violations or deviations were identified.

5. Maintenance Observation (62703)

During the report period, the inspectors observed portions of the maintenance activities listed below. The observations included a review of the Maintenance Work Orders (MWOs) and other related documents for adequacy, adherence to procedure, proper tagouts, adherence to technical specifications, radiological controls, observation of all or part of the actual work and/or retesting in progress, specified retest requirements, and adherence to the appropriate guality controls.

WO M75024, Remove manway cover and inspect for red rubber gasket material.

6-ME-1C41-R-0001, Revision 21, Standby Liquid Control System Relief Valve Functional Test.

On September 23, 1987 the licensee initiated Maintenance Work Order (MWO) M74962 to remove Standby Liquid Control (SLC) relief valve (Q1C41F029A) and test per procedure 06-ME-1C41-R-0001. Because the testing method for SLC relief valve F029B was inadequate the licensee modified the testing method to be performed in accordance with the Work Instruction and Inspection Record (WI&IR) in MWO M74962. The F029A valve was removed from the SLC system and bench tested on September 27, 1987. The new test method consisted of, prior to each valve lift, increasing accumulator pressure to between 700-1100 psi with the test bench pump to conserve nitrogen and minimize air induction in the test system impairs the test by adversely affecting repeatability. Preliminary lifts must be performed to establish the test conditions. Once the test conditions were established the licensee successfully ran three consecutive valid runs on the relief valve.

No violations or deviations were identified.

6. Surveillance Observation (61726)

The inspectors observed the performance of portions of the surveillances listed below. The observation included a review of the procedure for technical adequacy, conformance to technical specifications, verification of test instrument calibration, observation of all or part of the actual surveillances, removal from service and return to service of the system or components affected, and review of the data for acceptability based upon the acceptance criteria.

9-S-06-17, Revision 1, Spent Fuel Pool Poison Specimen Coupon Kemova? and Inspection.

6-IC-1821-M-1001, Revision 25, Safety Relief Valve High Pressure Trip/Low Low Set Relief/ECCS Vessel Pressure Injection Permissive.

6-IC-1B21-R-CO13, Revision 25, Drywell High Pressure Calibration High Pressure Core Spray (HPCS).

6-IC-1E30-M-0001, Revision 22, Suppression Pool Level Wide Range Functional Test.

6-IC-1E12-M-0005, Revision 24, Containment Pressure High Functional Test.

6-EL-1B21-M-0001, Revision 26, Automatic Depressurization System (ADS) Timer Functional Test.

6-0P-1P81-M-0002, Revision 30, High Pressure Core Spray (HPCS) Diesel Generator Functional Test.

6-ME-1M61-V-0001, Revision 30, Local Leak Rate Test.

6-IC-1E12-M-0001, Revision 23. Low Pressure Core Injection (LPCI) System Discharge Line Hi/Low Pressure Functional Test.

6-OP-1P75-M-0002, Revision 30, Standby Diesel Generator (SDG) 2 Functional Test.

During performance of surveillance test 06-IC-1B21-M-1001. Safety Relief Valve High Pressure Trip/ Low Low Set Relief/ECCS Vessel Pressure Injection Permissive, the inspector noted that during step 5.13.4.c the I&C technician performing the surveillance test is to verify a nominal 24 volts between terminals JJ-101 and JJ-92; JJ-102 and JJ-92; JJ-103 and JJ-92; JJ-104 and JJ-92; and JJ-108 and JJ-92. The actual voltage measured by the technician was as follows: JJ-101 was 21.52; JJ-302 was 22.49; JJ-103 was 21.39; JJ-104 was 21.99 and JJ-108 was 21.99. There was no tolerance specified in the procedure for the 24 volts. The measured voltage deviated from the 24 volts required by the procedure. The procedure is inadequate by not specifying a tolerance for the specified 24 volts since the technician in the field must determine what is or is not acceptable. Revision of the procedure to specify an allowable tolerance will be followed up by the inspector as Inspector Followup Item (IFI) 416/87-26-01.

During the performance of surve'lance test 06-0P-1P75-M-0002, Standby Diesel Generator (SDG) 12 Functional Test, on October 14, 1987, the inspector questioned the licensee on procedural steps for placing the Standby Service Water (SSW) Division 2 Motor Operated Valve (MOV) test switch to test. A review of procedure 06-0P-1P75-0002, revealed no procedural step existed to place the MOV test switch to test. The operator had used System Operating Instruction (SOI) 04-1-01-P41-1 to place the SSW Division 2 MOV test switch to test. The licensee plans to revise procedures for SDG 11 and SDG 12 to incorporate steps for placing SSW Division 1 and 2 MOVs in test position and returning the test switch back to normal when performing diesel surveillances. This will be tracked as Inspector Followup Item 416/87-26-02.

No violations or deviations were identified.

Engineered Safety Features System Walkdown (71710)

A complete walkdown was conducted on the accessible portions of the High Pressure Core Spray (HPCS) System. The walkdown consisted of an inspection and verification, where possible, of the following required system valve alignment, including valve power available and valve locking where required; instrumentation valved in and functioning; electrical and instrumentation cabinets free from debris, loose materials, jumpers and evidence of rodents; and system free from other degrading conditions.

No violations or deviations were identified.

8. Reportable Occurrences (90712 & 92700)

The below listed event reports were reviewed to determine if the information provided met the NRC reporting requirements. The determination included adequacy of event description and corrective action taken or planned, existence of potential generic problems and the relative safety significance of each event. Additional inplant reviews and discussions with plant personnel as appropriate were conducted for the reports indicated by an asterisk. The event reports were reviewed using the guidance of the general policy and procedure for NRC enforcement actions, regarding licensee identified violations.

The following License Event Reports (LERs) are closed.

LER No.	Event Date	Event
*87-010	June 30, 1987	Unintentional Closure Of Isolation Valves Due To Manually Opened Breaker.
*87-014	July 31, 1987	New Fuel Dropped From Transfer Cart Due To Personnel Error.

The event of LER 87-014 was previously discussed in Inspection Report 416/87-18.

No violations or deviations were identified.

9. Operating Reactor Events (93702)

The inspectors reviewed activities associated with the below listed reactor events. The review included determination of cause, safety significance, performance of personnel and systems, and corrective action. The inspectors examined instrument recordings, computer printouts, operations journal entries, scram reports and had discussions with operations, maintenance and engineering support personnel as appropriate.

At 12:09 p.m, on October 4, 1987, Safety Relief Valve (SRV) logic "A" and "E" initiated causing SRVs 821-F051B and B21-F051D to open momentarily. The "A" and "E" Lo Lo set logic sealed in resulting in the lifting of F051B and F051D SRVs. At the time of the lifting of the SRVs an Instrumentation and Controls (I&C) technician was performing surveillance O6-IC-1C11-M-0004-03, Rod Pattern Control System Low and Intermediate Limiter, functional test. The trip unit, Q1C11N654C, was in the calibration status and untripped at the time of the SRVs lifting. Incident Report 87-10-3 was written to document this event. During refueling outage 2 the licensee plans to incorporate Design Change Package (BCP) 87/0037 and 87/0038. DCP 87/0037 will involve installation of common signal and power bus for trip units in panels P618 and P625. DCP 87/0038 will involve installation of class IE diode external to the relay. The resolution of the spurious actuation of SRVs is presently being tracked as Inspector Followup Item 416/87-61-06.

No violations or deviations were identified.

10. Inspector Followup and Unresolved Items (92701)

(Closed) Inspector Followup Item 50-416/86-20-02. The licensee revised System Operating Instruction 04-1-01-P81-1, Revision 30, to specify a position for valve P81F803 and correct the descriptions of valves P81F036A and P81F039B. Drawing M-1093A, HPCS Diesel Generator System, Revision 5, displays instrument root valves FX001, FX002, and FX003. The thermometer installed in the A HPCS diesel water jacket is not used in testing and is not a problem. The licensee's program to place permanent plastic nameplates in breaker panels is in progress.

(Closed) Unresolved Item 416/87-22-01. In Inspection Report 416/87-22 the inspectors discussed the conduct of Surveillance Procedure 06-0P-1C41-M-0001, Revision 27, Standby Liquid Control Operability, and Surveillance Procedure 06-ME-1C41-R-0001, Revision 21, Standby Liquid Control System Relief Valve Functional Test. As discussed in Report 416/87-22 the relief valve POP pressure was outside the allowable + 3% tolerance and the relief valve lifted during the Standby Liquid Control (SLC) system operability test. The licensee failed to initiate a nonconformance report on either of the two discrepancies. TS 4.1.5.d.2 requires demonstrating that the relief valve does not actuate during recirculation to the test tank. Paragraph 5.1.7, 5.1.9 and 5.2.13.c of 06-0P-1C41-M-001 state that the operator is to verify relief valve F029A(B) does not lift during recirculatio. to the test tank. The ASME B & PV Code, Section III, NC-7513.1 (1980 Edition) requires the relief valve lift tolerance not exceed + 3 % of set pressure. TS 6.8.1 require procedures Appendix B, Criterion XVI as incorporated by the licensee's Operational Quality Assurance Manual, MPL-TOP-1, Chapter 16, states in part that procedures shall be established and implemented to provide for the evaluation of conditions such as nonconformances, failures, malfunctions, deficiencies, etc, to determine the need for corrective action and to identify possible adverse quality trends. Administrative Procedure (AP) 01-S-03-3, Revision 20, Material Nonconformance Reports (MNCRs), paragraph 1.2 states "This procedure shall be used to document discrepancies concerning material related documentation, i.e. test results, certification, etc, which leave the continued acceptability of installed hardware indeterminate." Contrary to the above, the licensee did not initiate a nonconformance report on the noted discrepancies and no formal evaluation of the acceptability of test performance/results was performed. Failure to document and evaluate the noted discrepancies is a violation (416/87-26-03).