U.S. ATOMIC ENERGY COMMISSION

DIRECTORATE OF REGULATORY OPERATIONS

REGION I

RO Inspection Report No: 50-219/74-13 Docket No: 50-219

Licensee: Jersey Central Power and Light Company License No: DPR-16

Madison Avenue at Punch Bowl Road Priority:

Morristown, New Jersey 07960 Category: C

Location: Oyster Creek Forked River, New Jersey

Type of Licensee: 1930 MWt, BWR (GE)

Type of Inspection: Routine, unannounced

Dates of Inspection: July 10-12, 1974

Dates of Previous Inspection: June 6, 7, 17, 21, 22, 1974

Reporting Inspector: T. Rebelowski July 23/1974
Date

T. Rebelowski, Reactor Inspector
Nuclear Support Section

Accompanying Inspectors: Date

Date

Date

Date

Other Accompanying Personnel: Date

Reviewed By: E C McCabe, Jr 7/23/74
Date

E. C. McCabe, Senior Reactor Inspector, Nuclear Support Section
Reactor Operations Branch

B/491

## SUMMARY OF FINDINGS

### Enforcement Action

A. Violations

1. In violation of Technical Specification Article 4.6.B.1.g, the stack gas particulate filter was not analyzed for gross alpha, beta, and gamma activity within one week of removal. Licensee AO 50-219/74-24 refers. (Details 3a)

2. In violation of Technical Specification Article 3.4.A.1, the "B" Core Spray pump was unavailable for fifteen minutes in System II while Core Spray System I was out of service for maintenance. Licensee AO 50-219/74-28 refers. (Detail 4)

3. In violation of Technical Specification Article 3.4.B.4, the Auto depressurization system initiation timers failed to complete their timing cycle in less than two minutes. Licensee AO 50-219/74-33 refers. (Detail 8)

### Licensee Action on Previously Identified Enforcement Action

Not inspected.

### Unusual Occurrences

A. Low Pressure MSIV Closure Switches

The Low Pressure Main Steam Line MSIV closure pressure switches were found to trip at pressures less than the specified value. Licensee AO 50-219/74-35 refers. (Details 3b and 9)

B. Generator Load Anticipatory Scram Failure

Pressure switch malfunction resulted in failure to trip on generator load rejection anticipatory scram. Licensee AO 50-219/74-30 refers. (Detail 6)

C. Relief Valve Out-of-Tolerance Settings

Relief Valve pressure switches 1A83B and 1A83D were found out of tolerance during routine surveillance. Licensee to RO AO 50-219/74-29 refers. (Detail 5)

Other Significant Findings

A. Unresolved Items

Shock Arrestors

Two hydraulic shock and sway arrestors located on the Core Spray system were found inoperable. Licensee AO 50-219/74-31 refers. (Detail 7)

B. Current Findings

The inspector reviewed the status of the licensee action as documented in the following Abnormal Occurrence reports.

1. AO 50-219/74-24 (Detail 3a)
2. AO 50-219/74-28 (Detail 4)
3. AO 50-219/74-29 (Detail 5)
4. AO 50-219/74-30 (Detail 6)
5. AO 50-219/74-31 (Detail 7)
6. AO 50-219/74-33 (Detail 8)
7. AO 50-219/74-35 (Detail 3b and 9)

Management Interview

A management interview was held at the site on July 12, 1974 with the following attendees:

Jersey Central Power & Light Company

Mr. D. A. Ross, Manager, Nuclear Generating Stations
Mr. D. L. Reeves, Chief Engineer
Mr. E. Riggle, Maintenance Supervisor
Mr. R. Stoudnour, Staff Engineer
Mr. R. Swift Maintenance Engineer

The following summarizes items discussed.

A. Inspection Purpose

The inspector stated that the inspection was for a quarterly review of abnormal occurrences.

B. Abnormal Occurrences Discussed

The licensee's corrective action and his commitments related to the following abnormal occurrences were discussed.

1. AO 50-219/74-24 (Detail 3a)

2. AO 50-219/74-28 (Detail 4)

3. AO 50-219/74-29 (Detail 5)

4. AO 50-219/74-30 (Detail 6)

5. AO 50-219/74-31 (Detail 7)

6. AO 50-219/74-33 (Detail 8)

7. AO 50-219/74-35 (Details 3b and 9)

C. Followup on Abnormal Occurrence Actions

The inspector stated that the licensee's present method of controlling the completion of Abnormal Occurrence commitments appears ineffective.

The licensee stated that, to ensure timely completion of corrective action, an administrative procedure would be developed and implemented to provide current status of corrective action on abnormal occurrences and action items assignments made upon review of abnormal occurrences by PORC.

D. Snubber Replacement Status

The inspector asked the licensee to address the present status of evaluation of mechanical snubbers.

The licensee stated that a continuing effort to replace the hydraulic snubbers with mechanical snubbers was in progress but had not yet been completed. (Detail 7)

## DETAILS

1. Persons Contacted

Mr. B. Cooper, Shift Foreman
Mr. R. Dube, Q.A. Supervisor
Mr. K. Fickeissen, Jr., Technical Engineer
Mr. D. Ross, Manager Nuclear Generating Stations
Mr. D. Reeves, Chief Engineer
Mr. E. Riggle, Maintenance Supervisor
Mr. R. Stoudnour, Staff Engineer
Mr. R. Swift, Maintenance Engineer

2. General

The inspector informed the licensee that a review of abnormal occurrences on a sampling basis will be made at approximately quarterly intervals.

3. Engineered Safety Feature Abnormal Occurrences

a. Stack Gas Particulate Filter Analysis

The licensee's Abnormal Occurrence Report 50-219/74-24 was reported to RO:I as a violation of Technical Specification Article 4.6.B.1.g by licensee letter dated April 10, 1974, identifying the cause and details of the occurrence. PORC minutes 29-74 documented review of the occurrence, which consisted of failure to analyze the stack gas particulate filter (for alpha, beta, and gamma activity) within one week of removal. Limiting conditions for operation were not exceeded. No increase in radioactivity release has been attributed to this occurrence. Counting of the filter 9 days after removal reportedly indicated comparibility to preceding and succeeding filter values. Intended corrective action is to modify procedural check off sheets to better control task accomplishment, with the PORC committed to revise the procedure on particulate counting to incorporate current memorandums and instructions. This item is unresolved pending completion of corrective action.

b. Main Steam Line Low Pressure Switches

The licensee's Abnormal Occurrence Report 50-219/74-35 was reported to RO:I as a violation of Technical Specification Article 2.3.7 by licensee letter dated July 8, 1974. Three main steam line low pressure switches were found, during routine surveillance testing, to trip at values below the minimum trip

point of 860 psig. This occurrence represents an exceeding of a limiting safety setting which was detected and corrected by routine surveillance. The switches were reset and satisfactorily tested. Licensee generic treatment of switch drift problems is discussed in Detail 9. The inspector had no further questions on AO 50-219/74-3.

4. ECCS Core Spray System

The licensee's Core Spray system abnormal occurrence report AO 50-219/74-28 was reported to RO:I as a violation of Technical Specification Article 3.4.A.1 by licensee letter dated April 19, 1974. With core spray system I tagged out for maintenance, the suction valve to the "B" core spray pump failed in the shut position during surveillance testing, causing a loss of core spray pump redundancy in System II. Immediate corrective action consisted of manual realignment of the Core Spray system to re-establish redundancy. Further investigation revealed a "B" spray pump suction valve bypass limit switch malfunction which was corrected by readjustment. Checks of similar valves showed no similar problem. Limiting conditions for operation were exceeded for 15 minutes as a result of this occurrence. The inspector had no further questions on this item.

5. Electromatic Relief Valve Pressure Switches

Tripping of relief valves NR 108B and NR108D at 6 and 14 psig higher than the Technical Specification Article 2.3.4 limit of 1070 psig was reported to RO:I as a violation of a limiting safety system setting by licensee letter dated April 26, 1974 (abnormal occurrence report 50-219/74-29). PORC minutes 34-74 document licensee review of this item. Corrective action consisted of resetting and testing the switches. Licensee generic action on switch drifts is discussed in Detail 9. The inspector had no further questions on AO 50-219/74-29.

6. Generator Load Rejection Scram

Generator Load Rejection Scram setpoint of 197 psig vs the 180 psig value prescribed by Technical Specification Table 3.1.1.A.12 was reported to RO:I as a violation of a limiting condition for operation by licensee letter dated May 15, 1974 (abnormal occurrence report 50-219/74-29). PORC minutes 44-74 document licensee review of this item. The switch was recalibrated and tested satisfactorily. Licensee generic action on switch drifts is discussed in Detail 9. The inspector had no further questions on AO 50-219/74-29.

7. Shock and Sway Arrestors (Auxiliary System)

The licensee's abnormal occurrence report AO 50-219/74-31 was forwarded to RO:I by licensee letter dated May 20, 1974. PORC minutes 46-74 document licensee review of this item. Two inoperable units and five leaking units were found during licensee inspection. Corrective action consisted of replacement with units having different (ethylene propylene) seals and tested to 4000 psig. The licensee has been evaluating replacing the installed hydraulic units with mechanical ones, but considers presently available mechanical units to have limited applicability in the reactor building. This occurrence was reported as an item which, if uncorrected, threatened to cause the degradation of performance of an engineered safety feature in accordance with Technical Specification Article 1.15D. The inspector had no further questions on AO 50-219/74-31.

8. Automatic Depressurization System (Reactivity/Power Control)

Failure of the automatic depressurization system Initiation Timers to complete this cycle within 2 minutes was reported to RO:I by licensee letter dated May 22, 1974 (AO 50-219/74-33) as a violation of a limiting condition for operation established by Technical Specification Article 3.4.B.4 PORC minutes 46-74 document licensee review of this item. Corrective action consisted of resetting and testing the timers to complete their cycle in less than 105 seconds. The inspector questioned the surveillance procedure absence of instructions to the operator to set the timers and the licensee stated that the procedure would be revised. Pending completion of that revision, this item is unresolved. The inspector had no other questions on AO 50-219/74-33.

9. Switch Drift Abnormalities

The licensee reviewed with the inspector the progress of his continuing corrective actions to resol e the high percentage of total reported abnormal occurrences in the area of switch drifts and/or repeatability of settings.

This problem has occurred in the licensee surveillance program that monitors the settings of the Main Steam Line Low Pressure Switches. Seven of the licensee's reported abnormal occurrences reported to the AEC in 1974 involve these switches.

a. NSSS Supplier Action

The inspector reviewed licensee's correspondence and NSSS supplier replies to questions concerning the basis for the steam line low pressure setting of 850 psig. The licensee has requested the NSSS

to pursue the development of a Technical Specification change to lower the set point. The NSSS supplier correspondence reviewed by the inspector showed no substantive progress on the problem.

b. Licensee Testing

The inspector discussed with the licensee his program of testing of two additional switches. The data reviewed did not eliminate the zero tolerance presently necessary on the range of switch settings. Additional test results from the NSSS supplier did not provide any new ideas to resolve the problem. The switches tested would still be subject to a 1% tolerance on repeatability. The inspector viewed the licensee's testing area, and the piping configuration and readout lamps on the test rig. Continuing data accummulation in this area appears to confirm the licensee statement that the switch tolerance problem should be vigorously pursued in order to decrease the number of switch drift abnormalities.

The areas discussed will be reviewed for continuing progress at a subsequent inspection. This item is unresolved.