

U. S. NUCLEAR REGULATORY COMMISSION
OFFICE OF INSPECTION AND ENFORCEMENT
REGION I

IE Inspection Report No: 50-219/75-24 Docket No: 50-219
Licensee: Jersey Central Power and Light Co. License No: DPR-16
Madison Ave. at Punch Bowl Road Priority: _____
Morristown, New Jersey 07960 Category: C
Safeguards Group: _____
Location: Oyster Creek Nuclear Generating Station
Forked River, New Jersey 08731
Type of Licensee: BWR, 1930 MW(t) (GE)
Type of Inspection: Routine
Dates of Inspection: October 30 and 31 and November 5, 1975
Dates of Previous Inspection: September 30, 1975
Reporting Inspector: K. E. Plumlee DATE 1/5/76
K. E. Plumlee, Reactor Inspector
Accompanying Inspectors: None DATE _____
DATE _____
DATE _____
DATE _____
Other Accompanying Personnel: None DATE _____
Reviewed By: P. J. Knapp DATE 1/5/76
P. J. Knapp, Chief, Radiation Support Section

B/698

SUMMARY OF FINDINGS

Enforcement Action

A. Items of Noncompliance

1. Violations

None

2. Infractions

- a. Contrary to requirements of 10 CFR 20.203(c)(2)(iii) and the Technical Specifications section 6.2.B.2, entrances to a high radiation area were not maintained locked on October 31 and November 5, 1975. (Details, 4)

B. Deviations

None

Licensee Action on Previously Identified Enforcement Items

None applicable.

Design Changes

None applicable.

Unusual Occurrences

- A. Pump motor overload trips in "A" train of stack gas monitor - Licensee's AO Nos. 75-22 and 75-25. (Details, 6.a)
- B. Operation of stack gas sample train with no filter in the line - Licensee's AO 75-23. (Details, 6.b)
- C. Orifice valve failure on Standby Gas Treatment System - Licensee's AO No. 75-28. (Details, 7)

D. High readings on two TLD badges. (Details, 9.f)

Other Significant Findings

A. Current Findings

1. Acceptable Areas

Inspection of work in progress, working conditions and equipment, and sampling of the licensee's records did not identify any noncompliance, deviation or unresolved item in the following areas.

- a. Organization (Details, 3)
- b. Licensee audits (Details, 9.a)
- c. Discussions with management (Details, 9.b)
- d. Training (Details, 9.c)
- e. Radiological protection procedures (Details, 9.d)
- f. Instrumentation and equipment (Details, 9.e)
- g. Personnel dosimetry (Details, 9.f)

2. Unresolved Items

- a. Licensee's estimates of the types and quantities of radioactive materials shipped in radwaste drums. (Details, 10.a)

3. Infractions and Deficiencies Identified by Licensee

- a. AO's 75-22 and 75-25

Noncompliances with Technical Specifications section 3.6.A.3 requirements for continuous stack gas monitoring. (Details 6)

B. Status of Previously Unresolved Items

None

Management Interview

Management interviews were held at the site on October 31 and November 5, 1975.

Persons Present

J. Carroll, Plant Superintendent
E. Gowney, Technical Engineer (October 31 only)
D. Ross, Manager, Generating Stations - Nuclear (by telephone intercom
on October 31, and present November 5)
E. Scalsky, Radiation Protection Supervisor
J. Sullivan, Operations Engineer (November 5 only)
R. Swift, Maintenance Engineer (November 5 only)

The following items were discussed.

A. Scope of the Inspection

The inspector pointed out that this was a routine inspection of radiological protection during reactor operation, unusual occurrences, and radwaste shipments.

B. Items of Noncompliance

The inspector stated that four high radiation area entrances had been found unlocked on October 31 and one of them was again found unlocked on November 5. The inspector stated all personnel onsite should know to maintain such doors locked, particularly if entrusted with keys. (Details, 4)

The requirements of 10 CFR 19 were discussed. (Details, 5)

C. Unusual Occurrences

The inspector stated on October 31 that he was concerned that the stack gas sample line was not tagged or somehow clearly shown to need servicing before use. (Details, 6.b)

The inspector asked the licensee's personnel if any other equipment was not tagged to identify any servicing, repairs or clearance necessary before use?

The licensee stated that all such equipment was tagged to show its status except for this one example.

Reinspection on November 5 showed that tags had by then been placed on this equipment. The inspector stated that the problem was resolved.

D. Radwaste Shipments

The inspection of radwaste shipments was discussed. The inspector stated that he understood that the licensee's determination of the quantity of radioactivity shipped would be better documented, and pending such information, the licensee's values were an unresolved item. (Details, 10)

DETAILS

1. Persons Contacted

D. Arbach, Radiation Protection Foreman
J. Carroll, Plant Superintendent
N. Cole, Shift Operating Foreman
J. Cook, Radiation Protection Foreman
E. Growney, Technical Engineer
R. Heffner, Engineering Assistant
D. Kaulback, Radiation Protection Foreman
J. Knubel, Training Supervisor
B. Mays, Operating Foreman
M. Obersted, Radiation Protection Technician
D. Reeves, Chief Engineer
D. Ross, Manager, Generating Stations - Nuclear
E. Scaleky, Radiation Protection Supervisor
W. Spoulos, Station Helper Foreman
J. Sullivan, Jr., Operations Engineer
R. Swift, Maintenance Engineer

2. Reactor Status

The reactor was operating at about 86% power with a stack release rate of 6,400 uCi/sec.

3. Radiation Protection Staffing

Discussion indicated that a request for a technical specification change was submitted, but has not yet been issued by Licensing, which would change the Radiation Protection Supervisor's title to Health Physicist. Changes in staffing since November, 1974 (Inspection Report No. 50-219/74-17) included the addition of an Engineering Assistant reporting to the Supervisor, and two Radiation Protection Technicians. The organization is as follows (not including the Engineering Assistant):

Plant Superintendent
Radiation Protection Supervisor
Five Foremen, including;
 Three Health Physics Foreman, directing eight Radiation Technicians and four Assistant Radiation Technicians
 Two General Foremen, directing fifteen Station Helpers

The staffing, organization and qualifications appear to meet requirements.

4. Condenser Room Entrances

A tour of the facility on October 30, 1975 identified four entrances to the condenser room that were not secured, and also that the lock had been removed from one door making it impossible to lock at that time even though these entrances were posted as high radiation area entrances.

Inspection at 5:30 P.M. on October 31 showed that one entrance still could not be locked but the licensee stated that the job would be finished promptly.

Although the licensee had sent a man to check the doors at 11:00 A.M., inspection at 3:00 P.M. on November 5, 1975 showed that one entrance was held open by an improperly placed receptacle for protective clothing. The licensee immediately closed and locked the door. No other control and no surveillance was evident.

A tour indicated that exposure up to 1,250 millirems per hour was accessible to an individual standing on the floor or standing on pipes near the steam separators in the condenser room, and as a consequence, that the licensee was required to maintain the entrances locked or controlled or under surveillance in compliance with 10 CFR 20.203(c) (2)(iii) and Technical Specification 6.2.B.2.

The inspector requested an explanation on November 5, 1975 (during Management Interview) of the failure to keep these doors locked.

The licensee stated that the individual who blocked the door open on November 5 had been identified and shown to have been out when instructions on doors were reemphasized earlier in the week but he had now been reinstructed on this matter.

The inspector identified the licensee's failure to maintain these entrances locked as an item of noncompliance, as is stated under Enforcement Items in the Summary section of this report.

5. Requirements Pursuant to 10 CFR 19

a. Non-Current Items

Inspection of the licensee's compliance with requirements of 10 CFR 19 indicated that the following posted and referenced material was not current. Before the completion of the inspection the licensee replaced this material with information dated April 30, 1975. The current material included information not shown by the older documents (example: 10 CFR 19.32 Discrimination Prohibited) as well as being identified as NRC instead of AEC documents. At least five supplements involving 48 page changes to these documents were issued following April, 1973.

<u>Item Found</u>	<u>Issue Date of Item</u>	<u>Issue Date of Replacement</u>
AEC-3	(Not Checked)	April 30, 1975 (NRC-3)
10 CFR 19	April, 1973	April 30, 1975
10 CFR 20	April, 1973	April 30, 1975

b. Location of Referenced Information Maintained to Meet
10 CFR 19.11 Requirements

The referenced copies of the license, technical specifications and operating procedures were kept in a vital area of the facility. The inspector questioned the availability of this information with respect to the availability indicated by 10 CFR 19.11, and conversely the feasibility of admitting people to the vital area who request this information and otherwise might not be allowed therein.

The licensee modified the posted sign to show that referenced information was also available for examination at the Radiation Protection Supervisor's office.

No other problems were identified.

c. Postponement of Meeting with Workers' Representative

Inspection Report No. 50-219/74-17 (in the Details, Paragraph 14) stated that a follow-up would be made on a question by a workers' representative. The workers' representative did not contact the inspector during this inspection and this item will be followed up on a subsequent inspection.

6. Stack Gas Monitor System Problems

a. Thermal Overload Protector trips

The licensee reported three AO's, Nos. 75-06, 75-22, and 75-25, when on three occasions the "A" train stack monitor system pump motor tripped off and interrupted monitoring contrary to technical specification 3.6.A.3 which requires continuous monitoring. AO 75-06 was reviewed previously (Inspection Report No. 50-219/74-17).

The licensee's investigations showed in one case (No. 75-06) that the pump oil was low, and later that the "A" pump motor drew more current than the "B" pump motor.

When inspected, the "B" train was operating and the "A" train motor and pump were out for repairs. The "A" train was observed to be tagged out of service.

The licensee's corrective action is not completed. This item will be followed up on a subsequent inspection.

b. Inadvertent Use of a Stack Gas Sample Line That Contained No Filters

Follow-up to a previous inspection (Inspection Report No. 50-219/75-18) was to verify that procedural corrections were made by the licensee following inadvertent use of a stack gas sample line that contained no filters (AO 75-23).

The procedure (#1201) did not require tagging of the line involved above even though no filters were to be installed until it was used again. The procedure, if followed, would require a formal clearance to use that line.

This item was discussed in the management interview on October 31.

Inspection of physical equipment on November 5, 1975 verified that this equipment had by then been tagged to show its status.

No other problems were identified.

7. Standby Gas Treatment System Orifice Valve Failure

The licensee reported that a solenoid operated pilot valve failed and made one train of the standby gas treatment system inoperable (AO 75-28). The failure was thought to be found promptly because of simultaneous failure of a fuse and a resulting trouble indication.

The valve was replaced and the system was satisfactorily tested.

Inspection indicated no recurrence of the problem. Surveillance test records appeared satisfactory.

The inspector had no further questions regarding this item.

8. Standby Gas Treatment System Handhole Covers

Follow-up to Inspection Report No. 50-219/75-21 indicated that PORC review has not been completed on proposed procedures for surveillance of the Standby Gas Treatment System developed following AO 75-18.

Inspection of the physical parts of the system showed that the handhole covers were not marked "Do Not Remove" or "Keep Secured" to show the required status as might be done following the inadvertent removal of covers as reported by AO 75-18. Covers were not identified as to which hole each cover fits and although the covers appeared unlikely to fall out, some of the latches were not engaged to the full depth of the groove provided when inspected. The licensee promptly engaged the latches fully.

The procedure involved above is an enforcement item from Inspection No. 50-219/75-07 and further follow-up will be made on this item on a subsequent inspection.

9. Acceptable Areas

Inspection of the following items did not identify any items of non-compliance, deviations or unresolved items. Inspection included observation during tours of the facility, discussions with personnel, and sampling of records.

a. Licensee's Audits

- (1) General Office Review Board audits of Radiological Protection activities. No records were available onsite when inspected. This item will be followed up on a subsequent inspection.

(2) Licensee's Audits of Services and Contractors

The licensee's auditing of TLD badge service was inspected. No problem was identified.

b. Initial Discussion with Management

Discussion included previous unresolved items, unusual occurrences and reportable events. No problems were identified.

c. Training

- (1) Records and examination papers for initial training of each individual. These records were kept by a Radiation Protection Foreman.

No problems were identified.

- (2) Retraining. This item was postponed to a subsequent inspection because of absence or unavailability of the training supervisor on each day of the inspection.

d. Radiological Protection Procedures

- (1) Radiation Safety Manual, Third Edition, March 1975 (22 pages). This manual is issued to each employee. No problem was identified.
- (2) Radiation Protection Procedures. The licensee is reviewing and rewriting these procedures section by section. Inspection showed that none of the recently revised material had been inserted in the copies posted or distributed for use. The licensee hopes to complete the review by December 31, 1975.

This item will be followed up on a subsequent inspection.

e. Licensee's Use of Instrumentation and Equipment

Inspection indicated that the constant air monitor (CAM) calibrations were not included in the quarterly calibration card file used for health physics instruments. The licensee stated that CAM records are kept separate at this time.

No problem was identified.

f. Personnel Dosimetry

The use of portal monitors, TLD badges and pocket dosimeters was observed throughout the facility. The badge service print-out for all of 1975 up to September was inspected. The licensee's written evaluations of two high exposure badges were reviewed. One badge was known to have been exposed or wet from being dropped into the fuel storage pool. The other badge was unexplained. In both cases the assigned wearer's time and dose-rates were accounted for and shown not to have exceeded 10 CFR 20 limits.

10. Licensee's Radwaste Shipments

a. Observation of Shipments

The inspector observed the loading of solid radwaste drums, and the pumping of liquid radwaste concentrate, into low specific activity (LSA) shipping casks for shipment to burial sites.

The licensee's estimate of the number of curies contained in each solid radwaste drum was based on a radiation reading at one foot from the surface of the drum. A conversion chart was used to convert that reading to an estimate of the radioactive content of the drum.

The inspector requested an explanation of any self-shielding allowance in this conversion because lack of such an allowance would result in a significant underestimation of the radioactive contents of heavily loaded drums.

The licensee stated that this matter would be evaluated, but the details of the origin of the chart were not available during this inspection.

The inspector stated that this item is unresolved, and further information is needed to verify that the licensee's records of radwaste meet 10 CFR 71.61 and 10 CFR 71.62(a)(4) requirements for types and quantities of materials in shipments.

11. Turbine Building Exhaust Monitor

Means for monitoring of effluent discharge paths are required by 10 CFR 50, Appendix A, Criterion 64.

The licensee obtained assistance by a service organization to monitor radioactive release through the turbine building ventilation exhaust, which does not go to the reactor building stack. The purpose of the study is to determine any need for monitoring, or alternatively to establish a justification for not monitoring this release path.

Inspection of data indicated that 10 CFR 20 limits were not exceeded during the period for which information was provided (February - September, 1975). Further work was being done when inspected. The resulting information will become available for inspection when reported to the licensee.

There was no indication of how this work would apply to any postulated accidents (a Criterion 65 condition).

The licensee stated that their study of the above matter is not yet completed and will continue.

This item will be followed up on a subsequent inspection.