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November 27, 1989

U.S. Nuclear Regulatory Commission
Attn: Document Control Desk
Washington, D.C. 20555

Dear Sir:

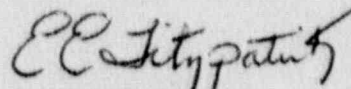
Subject: Oyster Creek Nuclear Generating Station
Docket No. 50-219
Inspection Report 89-80
Response to Notice of Violations and Deviations

In accordance with 10CFR2.201, the enclosed provides GPU Nuclear's response to the violations and deviations identified in NRC's Inspection Report 50-219/89-80.

In order to properly address each unresolved item and identified weakness, we will forward a separate submittal no later than January 15, 1990. For each, we will provide our evaluation, proposed corrective action and schedule for implementation.

If further information is required, please contact Kathy Barnes, OC Licensing Engineer at 609-971-4390, or David Jerko, BWR Licensing Engineer at 201-316-7976.

Very truly yours,



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Violation:

- A. 10CFR50, Paragraph 50.71(e) states that the updated FSAR shall be revised to include the effects of: all changes made to the facility or procedures as described in the FSAR; all safety evaluations performed by the licensee either in support of requested licensee amendments or in support of conclusions that changes did not involve an unreviewed safety question. Subsequent revisions shall be filed no less frequently than annually and shall reflect all changes up to a maximum of six months prior to the date of filing.

Contrary to the above, the licensee has not updated the FSAR in a timely manner to reflect emergency service water system and containment spray system design bases alignment, operation, and analyses. For example, errors were noted in subsections 6.2.2.1, 6.2.2.4, 6.2.2.3.1 and Tables 6.2-3 and 6.2-14.

RESPONSE:

GPUN concurs with the violation:

- 1) Corrective steps which have been taken and the results achieved:

For revision 4 to the FSAR, GPUN has proposed the following clarifications:

- a) Proposed new table delineating the peak suppression pool temperatures and the NPSH available (Core Spray Pumps) post LOCA with minimum Containment Spray System and Emergency Service Water System flows, 85° and 90° intake canal water temperatures, and heat exchanger cleanliness factors of 65% and 90%.
 - b) Enhanced the description of the automatic start sequence for the Containment Spray and Emergency Service Water pumps.
 - c) Revised pump flows to reflect current system operation, and corrected heat exchanger capacity.
 - d) Since Table 6.2-14 refers to valve positions for drywell purging (ventilation systems), the reference is assumed in error, and no changes are proposed.
- 2) Corrective steps which will be taken to avoid further violations.

Since GPUN recognizes that discrepancies exist in the Updated FSAR, efforts are already underway to upgrade its accuracy. There is currently a program which was initiated by the Licensing Department to obtain Technical reviews for each section of the FSAR. In addition, during 1990 one individual will be dedicated to the upgrade process. This person's function will be to coordinate the information received from the various technical reviews and existing projects in progress.

RESPONSE (CONT'D):

For example, GPUN has embarked on design basis reconstitution for various systems. We are also involved in conducting SSFI's in-house. These efforts will provide the primary source of information for the FSAR upgrade program. In addition, information from other ongoing projects such as the development of the Plant Specific Simulator, configuration control, and the development of a PRA for the IPE efforts will also aid in improving the accuracy of the FSAR. Our objective is to have an accurate and verified FSAR which can be used by GPUN personnel and NRC with a high degree of confidence.

- 3) Date when full compliance will be achieved: Revision 4 to the FSAR will contain the changes noted in (1). Revision 4 will be submitted by the end of 1989. As stated in item #1, the major upgrade effort will be conducted during 1990. Upgrading effort, however, will extend beyond 1990 and continue for the next several years.

VIOLATION:

B. Technical Specification 6.8.1 requires that written procedures shall be established, implemented and maintained. Contrary to this requirement, the following examples were identified in which procedures were not effectively implemented.

1. Station Procedure 107, Procedure Control, Revision 35, Step 5.1.5.7 states, supervisory personnel are responsible for ensuring that personnel understand procedures being used including the objectives and desired results to be achieved by following those procedures.

Contrary to the above, a significant temporary change was made to Station Procedure 312.1, Bypassing Isolation Interlocks and Automatic Scram During Emergency Conditions. This change altered the way containment spray system logics would be bypassed. Operators had been specifically trained on the existing method of bypassing these logics. The change was instituted without operating personnel being made aware of the change. In addition the change was not properly posted in the affected procedure, and the no longer required bypass jumpers were not retrieved from the emergency locker.

2. Station Procedure 607.4.005, Containment Spray and Emergency Service Water Pump System 2 Operability and Inservice Test, Revision 0, Step 6.6 provides instructions for containment spray pumps lubrication. Step 6.6.1.6 states, if grease cup is depleted then add grease to the cup using lubricant specified in 6.6.1.

Contrary to the above, during the performance of this surveillance on August 16, 1989, grease cups on the system 2 containment spray pumps were found depleted and grease had not been added during the previous surveillance.

3. Station Procedure 125.1, In Service Test Program Administration, Revision 5, provides direction to personnel for the administration and implementation of the In Service Testing Program. Step 4.2.1.a, IST Procedures/Standards, states in part, where Section XI cannot be complied with it shall be documented in the IST Program with appropriate NRC relief requested as provided by 10CFR 50.55a(g).

Contrary to the above, for the emergency service water pumps the pump differential pressure, a test quantity, the Section XI required upper and lower alert range limits have been deleted and the upper action limit increased without appropriate NRC relief requested.

RESPONSE to Item 1:

GPUN concurs with the violation:

- 1) Corrective steps which have been taken and the results achieved:
 - a) To ensure operating personnel are aware of temporary procedure changes, this item has been added as a entry on the Group Shift Supervisor's Preshift Brief Checklist.

- b) The temporary changes found improperly posted in the procedure books were immediately corrected by station personnel.
 - c) The extra bypass jumpers were removed from the emergency equipment locker.
- 2) Corrective steps which will be taken to avoid further violations:
- a) Review of temporary changes affecting Plant Operations will be proceduralized by incorporating the item into the Group Shift Supervisor's Turnover Check List, which is part of Procedure 106, "Conduct of Operations". In addition, all temporary changes will be reviewed by a department engineer and a summary of those changes affecting Plant Operations will be issued to operating personnel on an approximately bi-weekly interval. Significant temporary changes will still be covered by the required reading program.
 - b) Temporary changes affecting Plant Operations will be audited monthly for proper posting.
 - c) The quarterly inventory of the emergency equipment locker will be reviewed, and updated if required, at least twice per year to ensure correlation of emergency equipment to procedural requirements.
- 3) Date when full compliance will be achieved:
- a) The procedure change will be initiated by January 31, 1990. Issuance of temporary change summaries will begin by December 15, 1989.
 - b) Monthly audits of temporary changes affecting Plant Operations will commence by December 31, 1989.
 - c) Updates of the emergency equipment inventory will commence by December 31, 1989.

Response to Item 2:

GPUN concurs with the violation:

- 1) Corrective steps which have been taken and the results achieved:

The operator discovered the depleted grease cups while performing procedure steps preparatory for pump start. The surveillance was terminated. The test was performed the next day after the grease cups were filled.

- 2) Corrective steps which will be taken to avoid further violations:

The wording of the directions for grease addition was confusing and resulted in the addition of more grease than necessary for pump operation. Directions for adding grease to the pumps will be removed

from the surveillance procedures, since monthly addition of grease has been determined unnecessary. Greasing requirements will be fulfilled by the performance of a preventive maintenance task on a regular interval.

- 3) Date when full compliance will be achieved:

The procedures will be revised and the preventive maintenance task initiated by January 31, 1990.

Response to Item 3:

GPUN concurs with the violation in that the alert ranges for the ESW pumps were inappropriately eliminated without obtaining prior NRC approval:

- 1) Corrective steps which have been taken and the results achieved:

Due to nominal instrument errors and system influences, the Emergency Service Water System (ESW) had exceeded the stringent limits of Table IWP-3100-2, for high action differential pressure values and been declared inoperable, unnecessarily, on numerous occasions.

To address this situation, the guidance contained in ASME/ANSI OMa-1988 Part 6, Inservice Testing of Pumps in Light-Water Reactor Power Plants, which deletes high alert and increases high action values, was adopted for the ESW Pump IST differential pressure. It was not realized at the time that deleting the alert ranges for this specific application required an NRC relief request. The upper and lower alert ranges were re-established for ESW Pump Differential pressure testing.

- 2) Corrective steps which will be taken to avoid further violations:

Personnel involved in administering the Pump Inservice Testing program have been made more aware of the requirements to request NRC relief when Section XI cannot be complied with.

- 3) Date when full compliance will be achieved:

Full compliance was achieved on November 10, 1989.

VIOLATION:

- C. 10CFR 50, Appendix B, Criterion VIII requires that measures be established to assure that identification of components is maintained and that control measures prevent the use of incorrect or defective parts or components. The licensee purchased containment spray system heat exchanger relief valves to meet ASME Section VIII. Paragraphs UG-129 and 136 of that code require nameplates and lockwires on these components.

Contrary to the above, as of August 16, 1989, the measures for identification and control of the heat exchanger relief valves were inadequate in that the nameplates and lockwires required by ASME Section VIII were not maintained.

RESPONSE:

GPUN concurs with the violation:

- 1) Corrective steps which have been taken and the results achieved:

At the time of identification, a work order was initiated to replace the Containment Spray heat exchanger relief valves V-21-21, 22, 23 and 24, and V-3-82, 83, 84 and 85. The valves have not yet been replaced but are scheduled to be replaced during the next system out of service period.

The replacement valves located in the Warehouse were inspected and found to have the required manufacturer name plates and lock wires in place. It could not be determined why the lock wires were missing on some of the relief valves installed on the heat exchangers.

- 2) Corrective actions which will be taken to avoid further violations:

The heat exchanger relief valves will be included in the Oyster Creek Inservice Test (IST) program and will be serviced, as required, in accordance with the program.

- 3) Date when full compliance will be achieved:

The relief valves are scheduled to be replaced during the next outage of sufficient duration, not to exceed plant startup following 13R.

DEVIATION:

- A. FSAR UPDATE, Section 8.3.1.2.4, Revision 0, dated December 1984 states that the sizing of the emergency diesel generators is based on the requirements of AEC Safety Guide 9. Regulatory Position C2 of this guide states that the predicted loads on an emergency diesel generator unit not exceed the smaller of the 2000-hour rating or 90 percent of the 30-minute rating of the unit.

Contrary to the above, the licensee's calculation C-1302-741-5350-001, Revision 1, dated 6/27/88, indicates that while the predicted maximum loading of emergency diesel generator unit No. 2 is less than the 2000-hour rating, it does exceed 90 percent of the unit's 30-minute rating.

RESPONSE:

GPUN disagrees with the deviation.

GPUN's position is that NRC Safety Guide 9, Regulatory Position C.2, is clearly applicable to only the operating license stage when detailed plant design is in progress, and it is intended to ensure margin when beginning operation as a contingency for future load additions. For the operating license review, Amendment 68 to the FSAR provided a comparison of the actual installation (Oyster Creek) to the regulatory positions of the fourteen Safety Guides published prior to 12/1/71. For position C.2 of Safety Guide 9, Amendment 68 (p.3.8.2) stated:

"..., the predicted loads did not exceed the continuous rating of the set. (Ref. Amendment 32, Table 3.1: Predicted Load - 2030 KW, D-G Capability - 2500KW).

The loading of the emergency diesel generators at the operating license review was well within the continuous duty rating which met the requirements of Safety Guide 9.

Subsequent to the operating license review, GPUN has obtained from the manufacturer additional ratings for 2000-hour (2750KW) and 30-minutes (2950KW). The Oyster Creek criteria for diesel generator loading is based on the 2000-hour rating.

The updated FSAR section 8.3.1.2.4 did not accurately reflect the Amendment 68 submittal, since sizing of the emergency diesel generators was only reviewed against the requirements of AEC Safety Guide 9. A change is proposed to Revision 4 of the Updated FSAR to reflect these findings.

DEVIATION:

- B. FSAR UPDATE, Section 6.2.2.1.b, Revision 0, dated December 1984 states that the containment heat removal systems design bases provide redundancy in the event of a single active component failure, and FSAR Section 6.2.2.1.c., Revision 0, dated December 1984 states that the containment heat removal systems completely perform their design function automatically.

Contrary to the above, the containment spray control circuits are susceptible to single component failures that may prevent, during a postulated design basis loss of coolant accident automatic shutdown of the operating containment spray pumps on a valid low drywell pressure.

RESPONSE:

GPUN concurs with the deviation:

- 1) Corrective steps which have been taken and the results achieved:

In accordance with GPUN procedure 1000-ADM-7330.01, a preliminary safety concern (PSC 89-013) was initiated to investigate the licensing basis and safety significance of a single failure to the Containment Spray pump automatic trip logic on a valid low drywell pressure signal. Specifically, the PSC postulated the following failure modes for the automatic trip logic.

- a) Failure of Relay 16K2 in the energized condition; or
- b) Failure of Relays 16K21, 16K25, or 16K26 in the energized position; or
- c) Failure of Relay 16K16 in the deenergized position.

A PSC meeting was conducted (9/5/89) with representatives from Licensing, I&C and Safety Analysis & Plant Control. It was determined that the original FDSAR was silent on the basis for the automatic trip function. It was therefore concluded that it was necessary to determine the safety significance of a CSS pump trip failure. One concern is the possibility of a premature opening of the torus-to-reactor building vacuum breakers, and deinerting the containment.

- 2) Corrective steps which will be taken to avoid further deviations:

Based on the results of the evaluation, FSAR Section 6.2.2.1b will be revised to reflect the purpose of the automatic trip function of the CSS pumps.

- 3) Date when full compliance will be achieved: The evaluation is scheduled for completion in December 1989. Proposed changes to the FSAR will be incorporated in Revision 5 which is scheduled for calendar year 1990.