Commonwealth Edison
1400 Opus Place
Downers Grove, Illinois 60515

June 7, 1991

Office of Nuclear Reactor Regulation
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

Attn: Document Control Desk

Subject: LaSalle Station Units 1 and 2
Supplemental Response to Generic Letter 89-13
NRC Docket Nos. 50-373 and 50-374

References: (a) NRC Generic Letter 89-13, dated July 18, 1989.
(b) M.H. Richter letter to the NRC dated January 29, 1990.
(c) D. Taylor letter to the NRC dated November 14, 1990.

Dear Sir:

NRC Generic Letter 89-13 (Generic Letter) indicated that recent operating experience and studies had raised concerns about service water systems in nuclear power plants. The Generic Letter requested licensees to take actions which would ensure that their service water systems were in compliance with, and would be maintained in compliance with, 10 CFR Part 50, Appendix A, General Design Criteria 44, 45, and 46 and Appendix B, Section XI. Additionally, the Generic Letter required a response which would confirm that each licensee had established programs to implement the recommended actions of the Generic Letter, or that equally effective actions had been pursued. References (b) and (c) provided Commonwealth Edison's (CECo) response for Dresden, Quad Cities, Zion, LaSalle County, Byron and Braidwood Stations to Generic Letter 89-13.

The purpose of this letter is to notify the NRC that all the actions committed to by CECo in response to Generic Letter 89-13 have been completed for LaSalle Station Unit 1. The attachment to this letter outlines those actions taken.

Please direct any questions that you may have concerning this response to this office.

Respectfully,

D.L. Taylor
Generic Issues Administrator

Attachment

cc: A.B. Davis - Regional Administrator, Region III
B. Siegel - Project Manager - NRR
Resident Inspectors - LaSalle

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GL 89-13 Item I:

Implement and maintain an ongoing program of surveillane and control techniques to significantly reduce the incidence of flow blockage problems as a result of biofouling.

CECo ACTIONS

The Service Water Tunnel in the Lake Screenhouse is the source of water to LaSalle's essential service water systems, referred to as the Core Standby Cooling Systems (CSCS). Due to safety concerns regarding the inspections of the Service Water Tunnel (ie. extremely turbulent water currents, zero visibility), LaSalle Station will not visually inspect the tunnel. Because turbulent water currents exist in the tunnel, sedimentation should not be significantly present. LaSalle Station is chemically treating the Service Water Tunnel with a biocide and silt dispersant. It is expected that this chemical feed system will eliminate the need to inspect this portion of the Lake Screenhouse.

A surveillance is performed once per 18 months to monitor and chart the bottom of the Circulating Water (CW) Pump Suction Bays in the Lake Screenhouse. By comparing the charted depth of the bottom of the CW Pump Suction Bays to the known depth of the bottom of the Lake Screenhouse structure, sediment and macroscopic biofouling accumulations are identified and appropriate corrective actions are taken. The surveillance references the 1 foot sediment limit as specified in the LaSalle Technical Specifications.

The CSCS cooling water screen bypass line has been inspected. The results showed acceptable levels of sedimentation with no evidence of biofouling or corbicula.

LaSalle Station has installed a Chemical Feed System, in order to minimize biofouling and silting in the Service Water System. A biocide and silt dispersant are injected into each of the six service water tunnel inlet pipes.

By treating the entire Service Water Tunnel; the CSCS Systems, the Fire Protection System and the Non-Essential Service Water System will receive Chemical Treatment.

Initially, the Chemical Feed System will be operated continuously to ensure that chemically treated water will always be drawn into the CSCS when they are started for surveillances or by auto start signals. If inspections and testing of CSCS components show that biofouling and microbiologically influenced corrosion (MIC) can be controlled through the intermittent use of the biocide, LaSalle Station may pursue this option.

New procedures have been put in place or existing procedures have been revised to require and document periodic flushing and flow testing of infrequently used or stagnant lines in the CSCS.

GL 89-13 ITEM II

Conduct a test program to verify the heat transfer capability of all safety-related heat exchangers cooled by service water. The total program should consist of an initial test program and a periodic retest program.

CECo ACTIONS

LaSalle Station has established a program to test (or inspect/clean) safety-related heat exchangers. The heat exchanger testing procedures have been revised to correspond to the testing program outlined in Enclosure 2 of NRC Generic Letter 89-13. Each heat exchanger test or inspection has been scheduled and will be performed at least once per 18 months. The initial test or inspection of each Unit 1 safety-related heat exchanger has been performed in accordance with the revised procedure. The heat exchanger test and inspection results were satisfactory.

GL 89-13 ITEM III

Ensure by establishing a routine inspection and maintenance program for open-cycle service water system piping and components that corrosion, erosion, protective coating failure, silting, and biofouling cannot degrade the performance of the safety-related systems supplied by service water. The maintenane program should have at least the following purposes:

A. To remove excessive accumulations of biofouling agents, corrosion products, and silt;

B. To repair defective protective coatings and corroded service water system piping and components that could adversely affect performance of their intended safety functions.

CECo ACTIONS

The results of the Service Water System Evaluation Program concluded that the LaSalle Station CSCS Service Water System has no high flow locations susceptible to erosion. As a result, LaSalle Station will not perform inspections of the CSCS Service Water System for high flow erosion.

Low flow locations in the CSCS Service Water System were identified, based on their susceptibility to corrosion. The locations were inspected for wall thickness measurements and detection of silt. The Unit 1 inspections were performed during the Unit 1 refueling outage with satisfactory results.

GL 89-13 ITEM IV

Confirm that the service water system will perform its intended function in accordance with the licensing basis for the plant. Reconstitution of the design basis of the system is not intended. This confirmation should include a review of the ability to perform required safety functions in the event of failure of a single active component. To ensure that the as-built system is in accordance with the appropriate liensing basis documentation, this should include recent system walkdown inspections.

CECo ACTIONS

A design review for each Safety-Related Service Water System has been performed. The design review consisted of the following five areas of study:

- -System Configuration Review
- -Single Failure of Active Component Review
- -Field Verification of P&ID's
- -Flood Protection Review
- -Pipe Support Review

No open items were identified during the design review.

GL 89-13 ITEM V

Confirm that the maintenance practices, operating and emergency procedures and training that involves the service water system are adequate to ensure that safety-related equipment cooled by the service water system will function as intended and that operators of the equipment will perform effectively.

CECo ACTIONS

Maintenance practices, training programs, and operating and emergency procedures have been evaluated to assure that the CSCS Service Water Systems will function as intended and that operators will perform effectively. Results of this evaluation will be reviewed for their applicability at LaSalle Station.