

Illinois Power Company Clinton Power Station P.O. Box 678 Clinton, IL 61727 Tel 217 935-5623 Fax 217 935-4632

Walter G. MacFarland IV Chief Nuclear Officer

U-602926 8G.120

February 20, 1998

Docket No. 50-461

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

Subject:

Illinois Power's (IP's) Submittal of a Revised Response to Generic Letter 89-13, "Service Water System Problems Affecting Safety-Related Equipment"

Dear Madam or Sir:

As a result of deficiencies identified during the Integrated Safety Assessment (ISA) of Clinton Power Station (CPS), IP is re-evaluating implementation of the CPS Generic Letter (GL) 89-13 program. The purpose of this letter is to notify the NRC of deficiencies in GL 89-13 implementation at CPS and to provide actions being taken to address GL 89-13 compliance.

Attachment 2 to this letter provides a matrix which shows commitments that IP has previously made with regard to GL 89-13 actions and CPS experience in implementing these commitments. The present activ ns being taken with respect to GL 89-13 are also provided in Attachment 2.

When the re-evaluation of the CPS GL 89-13 program is complete, IP will notify the NRC of the actions which will be taken to address GL 89-13 at CPS. These actions are to ensure that the CPS safety-related Shutdown Service Water system, does not have an adverse affect on safety-related equipment operability. This action will be completed before startup. 4065/

Commitments made within this letter include:

IP will notify the NRC of the actions which will be taken to ensure the SX system does not have an adverse affect on safety-related equipment operability before startup.

802260083

Attachment 1 provides an affidavit supporting the facts set forth in this letter.

Sincerely yours,

Walter G. MacFarland, IV Chief Nuclear Officer

JSP/krk

Attachment

NRC Clinton Licensing Project Manager NRC Resident Office, V-690 Regional Administrator, Region III, US/NRC Illinois Department of Nuclear Safety Walter G. MacFarland, IV, being first duly sworn, deposes and says: That he is the Chief Nuclear Officer at Illinois Power; that this letter supplying information for Generic Letter 89-13 has been prepared under his supervision and direction; that he knows the contents thereof, and that to the best of his knowledge and belief said letter and the facts contained herein are true and correct.

Date: This 20th day of February 1998.

Signed:

Walter G. MacFarland, IV

STATE OF ILLINOIS

De Witt COUNTY

SS.

* OFFICIAL SEAL.*
Jacqueline S. Matthias
Notary Public, State of litinois
My Commission Expires 11/24/2001

Subscribed and sworn to before me this 20th day of February 1998.

Poqueline J Marchias (Notary Public)

GL 89-13 Committed Action	Potential Deficiencies in Implementation	Present Actions Being Taken
Treat Shutdown Service Water (SX) System. On April 4, 1991, in letter U-601817, IP informed the NRC that the challenge in treating SX was to design a treatment system which would be compatible with the environment of Clinton Lake and the other systems using raw lake water [i.e., Potable Water (WD), Circulation Water (CW), Plant Service Water (WS), and Makeup Water (WM) Systems].	From January 1992 until present, there have been various periods where systems have not been chemically treated for various reasons; for example, noncompliance with the CPS National Pollutant Discharge Elimination System (NPDES) permit, potential unmonitored (relating to NPDES compliance) discharges to Clinton Lake.	Treatment of SX via WS can occur when NPDES permit compliance is maintained and when there is no conflicting plant operations/maintenance or chemical injection equipment maintenance. The WD, CW, WS, and WD systems are not safety-related shutdown service water systems. Therefore, these systems are not part of the CPS GL 89-13 program and will not be included in future IP/NP on 89-13 correspondence.
Treatment of the systems was suspended as noted in IP letter U-602504 dated October 24, 1995.	Flushing of the emergency diesel generator heat exchangers was stopped in January 1996, due to procedural changes. Flushing resumed in April 1997.	
Inspect the intake structures at CPS every refueling outage (RF).	The intake structures were inspected in December 1996. There were no acceptance criteria prior to the fourth quarter of 1997. Inspection in the fourth quarter of 1997 showed unacceptable silt levels.	Cleaning was performed in December 1997. IP will continue to inspect intake structures at least on a refueling outage basis and clean as necessary.

GL 89-13 Committed Action	Potential Deficiencies in Implementation	Present Actions Being Taken
In IP letter U-602504 dated October 24, 1995, it was stated regarding the Fire Protection (FP) System, "Makeup water to the FP system has been chemically treated since 1990. Makeup water to the FP system will continue to be chemically treated by the permanent modifications discussed in item one."	The FP System can indirectly receive some treated makeup water from the Makeup Water Pump House (MWPH) filtered water storage tank via the FP jockey pump used to maintain FP pressure. However, chlorination in the MWPH is primarily performed for the purpose of achieving high filtered water quality. It is not intended for FP System treatment.	GL 89-13, Supplement 1 states that no actions are required regarding GL 89-13, "For a fire protection system supplied by raw water which meets flow requirements and does not provide safety-related cooling." Therefore, the FP system is not part of the CPS GL 89-13 program and will not be included in future IP/NRC GL 89-13 correspondence.
Residual Heat Removal (RHR) Heat Exchangers (HXs) will be tested/inspected annually.	RHR HXs were tested in 1996. In 1997, the RHR HXs were not tested due to high Clinton Lake temperatures.	IP intends to perform RHR HX performance tests during the first quarter of 1998. The "B" RHR HX performance test has been conducted. Preiiminary performance evaluations indicate that the RHR "B" HX is acceptable.
Periodic performance testing of heat exchangers, which are cooled by the service water system and which are needed to perform a safety function, to verify heat exchanger heat transfer capability.	There have been several instances from January 1993, through September 1997, where neat exchangers, cooled by SX, have had performance tests performed late. This is due to various problems associated with scheduling and obtaining proper test conditions. Additionally, review of the test methodology has revealed problems with data scatter and uncertainties.	Presently, IP has increased the HX inspection frequency to assess their current condition. In addition, the test methodologies are being corrected. HX operability is being addressed by inspection, test, or evaluation.