



UNITED STATES  
NUCLEAR REGULATORY COMMISSION  
REGION III  
799 ROOSEVELT ROAD  
GLEN ELLYN, ILLINOIS 60137

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Docket No. 50-483  
Docket No. 50-486

Union Electric Company  
ATTN: Mr. John K. Bryan  
Vice President - Nuclear  
P. O. Box 149  
St. Louis, MO 63166

Gentlemen:

This Information Notice is provided as an early notification of a possibly significant matter. It is expected that recipients will review the information for possible applicability to their facilities. No specific action or response is requested at this time. If further NRC evaluations so indicate, an IE Circular or Bulletin will be issued to recommend or request specific licensee actions. If you have questions regarding this matter, please contact the Director of the appropriate NRC Regional Office.

Sincerely,

*James G. Keppler*  
James G. Keppler  
Director

Enclosure: IE Information  
Notice No. 80-01

cc w/encl:  
Mr. W. H. Weber, Manager,  
Nuclear Construction  
Central Files  
Director, NRR/DPM  
Director, NRR/DOR  
PDR  
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Ms. K. Drey  
Mr. Ronald Fluegge, Utility  
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UNITED STATES  
NUCLEAR REGULATORY COMMISSION  
OFFICE OF INSPECTION AND ENFORCEMENT  
WASHINGTON, D.C. 20555

SSINS NO.: 6870  
Accessions No.:  
7910250523

DUPLICATE

January 4, 1980

IE Information Notice No. 80-01

FUEL HANDLING EVENTS

Description of Circumstances:

Two recent fuel handling events at the Pilgrim Nuclear Station have been reported to the NRC wherein there were no interlocks to control or limit the movement of nuclear fuel in the reactor building.

The first event occurred on December 11, 1979 when a spent fuel assembly was inadvertently raised high enough in the fuel pool to activate area radiation alarms. The reactor building overhead crane was being used to move new fuel from the inspection rig to the high density storage racks in the fuel pool. After the release of a new fuel element, the lifting hook became caught between the lifting bail and the assembly channel of a spent fuel assembly. The operating personnel were unaware of the fact that the spent fuel assembly was being raised until radiation alarms sounded. The operators quickly lowered the assembly to clear the radiation alarms and ultimately placed it in a storage position. The licensee subsequently increased the administrative controls on fuel handling activities by assigning more personnel and limiting concurrent duties.

On December 17, 1979, the second fuel handling event occurred at Pilgrim Nuclear Station when a new fuel assembly was dropped while it was being transferred to its storage location in the spent fuel pool. The assembly was being transported with the reactor building overhead crane when it struck the top edge of the high density fuel racks and the latching device on the auxiliary hook failed to retain the fuel assembly lifting bail in the hook. The assembly fell, striking the lifting bails on four spent fuel elements, then coming to rest on the top of the fuel racks. It has since been moved to a spent fuel preparation stand; an inspection of the assembly will be made at the site and then it will be returned to the supplier for further evaluation. A visual inspection of the four spent assemblies was performed and there was no apparent damage. Samples of the fuel pool water were analyzed and no change in activity levels was detected. The licensee has terminated the use of contract personnel and will use members of the plant operating staff for future fuel handling operations; a licensed Nuclear Plant Operator (NPO) will be responsible for proper alignment of the crane before fuel movement and a Reactor Engineer will supervise all fuel movement. All fuel movement will be limited to the minimum speed of the crane.

The events described above occurred at a boiling water reactor, however, the potential for raising a spent fuel element with the new fuel elevator may also exist at some pressurized water reactors. Movement of spent fuel by cranes or

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mechanisms intended for use on new fuel, which are not interlocked to prevent withdrawal from the pool, have the potential for producing extremely high dose rates or resulting in fuel damage.

This IE Information Notice is provided as an early notification of a possibly significant matter that is still under review by the NRC staff. It is expected that recipients will review the information for possible applicability to their facilities. No specific action or response is requested at this time. If NRC evaluations so indicate, further licensee actions may be requested or required.

No written response to this IE Information Notice is required. If you have any questions regarding this matter please contact the Director of the appropriate NRC Regional Office.

Enclosure: List of Recently  
Issued IE Information Notices

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RECENTLY ISSUED  
IE INFORMATION NOTICES

Information Notice No.	Subject	Date Issued	Issued To
79-37	Cracking in Low Pressure Turbine Discs	12/28/79	All power reactor OLs and CPs
79-36	Computer Code Defect in Stress Analysis of Piping Elbow	12/31/79	All power reactor OLs and CPs
79-35	Control of Maintenance and Essential Equipment	12/31/79	All power reactor facilities with an OL or CP
79-34	Inadequate Design of Safety-Related Heat Exchangers	12/27/79	All holders of power reactor OLs and CPs
79-33	Improper Closure of Primary Containment Access Hatches	12/21/79	All power reactor facilities holding OLs and CPs
79-32	Separation of Electrical Cables for HPCI and ADS	12/21/79	All power reactor facilities holding OLs and CPs
79-31	Use of Incorrect Amplified Response Spectra (ARS)	12/13/79	All holders of power reactor OLs and CPs
79-30	Reporting of Defects and Noncompliance, 10 CFR Part 21.	12/6/79	All power reactor facilities holding OLs and CPs and vendors inspected by LCVIP
79-29	Loss of NonSafety-Related Reactor Coolant System Instrumentation During Operation	11/16/79	All power reactor facilities holding OLs or CPs
79-28	Overloading of Structural Elements Due to Pipe Support Loads	11/16/79	All power reactor facilities with an OL or CP
79-27	Steam Generator Tube Ruptures At Two PWR Facilities	11/16/79	All power reactor facilities holding OLs and CPs
79-12A	Attempted Damage To New Fuel Assemblies	11/9/79	All Fuel Facilities, research reactors, and power reactors with an OL or CP