TOLEDO EDISON
A Centerior Energy Company

EDISON PLAZA
300 MADISON AVENUE
TOLEDO, OHIO 43652-0001

AB-94-0041
NP-33-94-004

Docket No. 50-346

License No. NPF-3

November 7, 1994

United States Nuclear Regulatory Commission
Document Control Desk
Washington, D. C. 20555

Gentlemen:

LER 94-003
Davis-Besse Nuclear Power Station, Unit No. 1
Date of Occurrence - October 8, 1994

Enclosed please find Licensee Event Report 94-003, which is being submitted to provide 30 days written notification of the subject occurrence. This LER is being submitted in accordance with 10 CFR 50.73(a)(2)(i)(B).

Very truly yours,

John K. Wood

John K. Wood
Plant Manager
Davis-Besse Nuclear Power Station

JKW/eld

Enclosure

cc: Mr. John B. Martin
Regional Administrator
USNRC Region III

Mr. Stan Stasek
DB-1 NRC Sr. Resident Inspector

Utility Radiological Safety Board

IE22

NRC FORM 366 (5-92) U.S. NUCLEAR REGULATORY COMMISSION

APPROVED BY OMB NO. 3150-0104
EXPIRES 5/31/95

ESTIMATED BURDEN PER RESPONSE TO COMPLY WITH THIS INFORMATION COLLECTION REQUEST: 50.0 HRS. FORWARD COMMENTS REGARDING BURDEN ESTIMATE TO THE INFORMATION AND RECORDS MANAGEMENT BRANCH (MNBB 7714), U.S. NUCLEAR REGULATORY COMMISSION, WASHINGTON, DC 20555-0001, AND TO THE PAPERWORK REDUCTION PROJECT (3150-0104), OFFICE OF MANAGEMENT AND BUDGET, WASHINGTON, DC 20503.

LICENSEE EVENT REPORT (LER)

(See reverse for required number of digits/characters for each block)

FACILITY NAME (1)	DOCKET NUMBER (2)	PAGE (3)
Davis-Besse Unit Number 1	05000 -346	1 OF 04

TITLE (4)

Spent Fuel Pool Gate Moved in Spent Fuel Pool While Emergency Ventilation Inoperable

EVENT DATE (5)			LER NUMBER (6)			REPORT NUMBER (7)			OTHER FACILITIES INVOLVED (8)	
MONTH	DAY	YEAR	YEAR	SEQUENTIAL NUMBER	REVISION NUMBER	MONTH	DAY	YEAR	FACILITY NAME	DOCKET NUMBER
										05000
10	08	94	94	-- 003 --	00	11	07	94	FACILITY NAME	DOCKET NUMBER 05000

OPERATING MODE (9)	6
POWER LEVEL (10)	0

THIS REPORT IS SUBMITTED PURSUANT TO THE REQUIREMENTS OF 10 CFR §: (Check one or more) (11)

20.402(b)		20.405(c)		50.73(a)(2)(iv)		73.71(b)	
20.405(a)(1)(i)		50.36(c)(1)		50.73(a)(2)(v)		73.71(c)	
20.405(a)(1)(ii)		50.36(c)(2)		50.73(a)(2)(vii)		OTHER	
20.405(a)(1)(iii)	X	50.73(a)(2)(i)		50.73(a)(2)(viii)(A)		(Specify in Abstract below and in Text, NRC Form 366A)	
20.405(a)(1)(iv)		50.73(a)(2)(ii)		50.73(a)(2)(viii)(B)			
20.405(a)(1)(v)		50.73(a)(2)(iii)		50.73(a)(2)(x)			

LICENSEE CONTACT FOR THIS LER (12)

NAME	TELEPHONE NUMBER (Include Area Code)
Norman K. Peterson, Senior Engineer - Licensing	(419) 321-8450

COMPLETE ONE LINE FOR EACH COMPONENT FAILURE DESCRIBED IN THIS REPORT (13)

CAUSE	SYSTEM	COMPONENT	MANUFACTURER	REPORTABLE TO NPRDS		CAUSE	SYSTEM	COMPONENT	MANUFACTURER	REPORTABLE TO NPRDS

SUPPLEMENTAL REPORT EXPECTED (14)

	YES (If yes, complete EXPECTED SUBMISSION DATE)		NO
		X	

EXPECTED SUBMISSION DATE (15)	MONTH	DAY	YEAR

ABSTRACT (Limit to 1400 spaces, i.e., approximately 15 single-spaced typewritten lines) (16)

On October 8, 1994 at approximately 1130 hours with the plant shutdown in Mode 6, the Spent Fuel Pool (SFP) to Fuel Transfer Tube Pit Gate was moved in the SFP area using the Spent Fuel Pool Cask Crane with the Emergency Ventilation System (EVS) servicing the SFP area inoperable. The SFP area EVS was inoperable because the Containment Equipment Hatch was removed, the Containment Purge Supply and Exhaust Fans were running, and a door leading from the SFP area to the outside atmosphere was opened during the evolution. This event was a violation of Technical Specification (TS) 3.9.12, Action b., which prohibits crane operations and movement of loads over the SFP with the SFP area EVS inoperable. This event involved personnel error by the maintenance crew performing the evolution in that the Control Room was not notified immediately prior to the move as was previously arranged so that SFP area ventilation system operability could be restored. This event is being reported under 10CFR50.73(a)(2)(i)(B) as a condition prohibited by the Technical Specifications.

Description of Occurrence:

On October 8, 1994 with the plant shutdown in Mode 6, the Spent Fuel Pool (SFP) to Fuel Transfer Tube Pit Gate was moved in the SFP area using the Spent Fuel Pool Cask Crane with the Emergency Ventilation System (EVS) servicing the SFP area inoperable. The SFP area EVS was inoperable because the Containment Equipment Hatch was removed, the Containment Purge Supply and Exhaust Fans were running, and a door leading from the SFP area to the outside atmosphere was opened during the evolution. This condition prevents the SFP area EVS from establishing a negative pressure in the SFP area.

The SFP to Fuel Transfer Tube Pit Gate was to be moved into position the morning of October 8, 1994 by a maintenance crew in preparation for refueling operations. A maintenance supervisor briefed the crew on the expected sequence of events and directed the crew to contact the Control Room. The crew leader contacted the Control Room, as directed, and was further instructed by the Shift Supervisor to inform the Control Room immediately prior to the lift so the operating crew could establish the proper ventilation system lineup to allow lifting of loads over the SFP. Because of minor difficulties encountered by the maintenance crew in preparing for the lift, the crew leader was not in the immediate vicinity of the jobsite when the lift was ready to begin. The crew leader also neglected to properly communicate his expectations to the crew that the lift was not to begin until he returned. In the crew leader's absence the crew began the lift, assuming that the crew leader had informed the Control Room of the lift as he was directed. However, the Control Room was not informed of the lift. Unaware that the SFP to Fuel Transfer Tube Pit Gate lift was in progress, the Shift Supervisor granted permission to other personnel to open a door leading to the outside atmosphere to facilitate movement of equipment into the SFP area in support of other refueling outage activities.

At approximately 1124 hours, an equipment operator entered the SFP area and noted that the gate lift was in progress and that the door had been opened. The equipment operator immediately informed the Control Room. The Control Room ordered the SFP area ventilation system to be properly realigned, the door to be closed, and the gate to be placed in a safe condition and secured.

This event was a violation of Technical Specification (TS) 3.9.12, Action b., which prohibits crane operations and movement of loads over the SFP with the SFP area EVS inoperable. This event is reportable under 10CFR50.73(a)(2)(i)(B) as a condition prohibited by the TSs.

Apparent Cause of Occurrence:

The cause of the event was personnel error on the part of the maintenance crew performing the evolution. Although the crew leader was aware of the task requirements and management expectations, he became too involved with the details of the evolution and less involved with the job oversight. This led to the inadequate coordination of the task with the Control Room.

A contributing factor to the event was that the procedure used by the maintenance crew to perform the crane lift and movement of the gate was inadequate. The applicable maintenance procedure does not address the requirements and expectations for movement of loads in the SFP area by the Maintenance Department. However, the procedural requirements for moving the SFP gate and proper ventilation system lineups are contained in the applicable system operating procedures, which were not being used by the maintenance crew.

Analysis of Occurrence:

The safety significance of this event is minimal.

The spent Fuel Pool Cask Crane and handling equipment is subject to a routine periodic and preventive maintenance and load test program. In addition, the SFP to Fuel Transfer Tube Pit Gate weighs approximately 8000 lbs., which is well within the capacity of the crane. Therefore, the likelihood of the gate being dropped during the lift due to equipment failure was small. Furthermore, the gate was prohibited from being moved directly over fuel in the SFP by TS 3.9.7 to minimize the potential damage to fuel assemblies stored in the SFP due to heavy loads.

On the day of the lift, all of the fuel assemblies in the SFP had been discharged from the reactor for more than 18 months. As such, the radioactive inventory that could potentially be released if fuel assemblies were damaged was significantly less than that assumed in analyses performed to determine the effects of postulated equipment and fuel handling accidents.

Corrective Actions:

As was previously described, upon discovery of the lift being performed improperly, the outside door was closed, the SFP gate was moved into a safe position and secured, and the SFP area ventilation system lineup was restored. The lift was successfully completed.

The individuals involved in the event were counseled as to the management expectations for evolutions of this type. In addition, tailgate sessions were held with other supervisors in the Mechanical Maintenance Department to reinforce management's expectations.

The maintenance procedure (DB-MM-06004) governing the operation of the Spent Fuel Pool Cask Crane will be revised to incorporate lessons learned from this event. This procedure change will provide enhanced guidance for coordination of lifts using this crane and for communications with the Control Room. This procedure revision will be completed by January 6, 1995. Training for maintenance personnel on the revised procedural requirements will also be completed by this date.

Failure Data:

A previous occurrence of a violation of TS 3.9.12 was documented in LER 90-004. The event described in LER 90-004 involved the movement of a spent fuel assembly in the SFP with the SFP area ventilation system improperly aligned. Although both of these events involved personnel error, the earlier event was found to be caused by an error of an individual. As such, the actions taken in response to that event were directed toward the individual and would not have been expected to have prevented this event.

NP-33-94-004 PCAQ No. 94-0895