



UNITED STATES  
ATOMIC ENERGY COMMISSION  
DIRECTORATE OF REGULATORY OPERATIONS  
REGION III  
799 ROOSEVELT ROAD  
GLEN ELLYN, ILLINOIS 60137

TELEPHONE  
(312) 858-2660

July 27, 1973

Wisconsin Public Service Corporation  
ATTN: Mr. E. W. James, Senior Vice President  
Power Generation and Engineering  
P. O. Box 1200  
Green Bay, Wisconsin 54305

Docket No. 50-305

Gentlemen:

The attached Directorate of Regulatory Operations Bulletin No. 73-2 "Malfunction of Containment Purge Supply Valve Switch," is sent to you to provide you with information we received from the Wisconsin Electric Power Company concerning the Point Beach 2 pressurized water reactor facility. This information may relate to the design and performance of certain equipment at your facility. Action requested on your part is identified in Section B of the bulletin.

Very truly yours,

Boyce H. Grier  
Regional Director

Enclosure:  
RO Bulletin 73-2

bcc: RO Files  
DR Central Files  
PDR  
Local PDR  
OGC, Beth, P-506A  
R. Renfrow, GC (2)

76

## MALFUNCTION OF CONTAINMENT PURGE SUPPLY VALVE SWITCH

We recently received information from the Wisconsin Electric Power Company concerning a problem found during functional testing following maintenance at the Point Beach 2 pressurized water reactor which may relate to the design and operation of the control circuit for containment purge valves at your facility. Pertinent details relating to this problem are contained in Section A below. Action requested by this Bulletin is contained in Section B.

### A. Description of Circumstances

During the performance of functional testing of one of the Unit 2 containment purge valves following maintenance, the valve opened when the manual control switch was moved to the open position but failed to close when the switch was placed in the closed position. In the Point Beach facility design, the redundant pneumatic operated, air to open containment purge supply valves are manually controlled by a single switch. For testing purposes during facility operation, instrument air is secured to one valve that remains closed to maintain containment integrity while the other valve is being tested.

Subsequent investigation by the licensee revealed that a small screw which secures the contact closing cam to the manual portion of the switch had loosened. This permitted the cam to stay in the "Contacts Closed" position and prevented further manual operation of the switch from opening the contacts and closing the valve. A follow-up review of electrical drawings also revealed that in the event of a similar switch failure open redundant purge valves would not close on receipt of a containment isolation signal.

The corrective action for this apparent design deficiency consisted of modifying the control circuit such that each individual valve is operated by a separate switch. Thereby, a malfunction of a single switch can result in one valve failing to close with containment integrity maintained by the redundant valve.

B. Action Requested of the Licensee

It is requested that you review the design of the control circuit for the containment ventilation system isolation valves installed at your facility to determine whether the failure of a single control switch could result in the simultaneous failure of the redundant supply valves or redundant exhaust valves and provide this office with your findings. If the results of your review indicate that the simultaneous failure of the redundant containment purge valves could exist under the conditions described above, please include in your response a description of the corrective action taken or planned and the date of scheduled completion of your corrective actions. This information should be provided to this office, in writing, within 45 days of your receipt of this letter.