

POOR ORIGINAL

I. Description of Deficiency

As part of the evaluation of IE Bulletin 79-01A, it was necessary to contact our suppliers of air actuated valves to see if the solenoid valves in question were used on our valves. In response to our inquiry, the Henry Pratt Company sent a letter stating they had reported a potential defect with the solenoids under 10 CFR, part 21, section 206.

The problem with the solenoids is that they have a maximum rating of 4×10^5 rad integrated dosage and 200° F temperature. Our specifications require a rating of 1.6×10^7 rads integrated dosage and 330° F temperature.

These solenoid valves on the actuators are a critical part of the system as the pneumatic actuator system is designed to open the valve and hold it open when the ASCO solenoid valve is energized. When deenergized, it is designed to vent air from the cylinder to allow a heavy coil spring to close the valve and hold it closed. For example, if the ASCO solenoid valve is energized but is inoperable, with the valve in the open position, deenergizing the ASCO solenoid valve will not cause the valve to close. Conversely, if the ASCO solenoid valve is deenergized but is inoperable in the closed position, energizing it will not cause the valve to open. After reviewing the function of valves using the ASCO solenoid valves in question, it has been determined that some valves are located in safety-related systems and their operation during an accident is required.

1101-274

7910170 382

II. Safety Implications

Had this deficiency remained uncorrected, it could have adversely affected the safety operations of the plant. In addition, it constituted a significant deficiency in the design of the valve in that the design did not conform to the design criteria included in the purchase specification.

III. Corrective Action Taken

All corrective action, including action taken to prevent recurrence will be submitted to you in a final report by December 21, 1979.

POOR ORIGINAL

1161 275