

UNITED STATES NUCLEAR REGULATORY COMMISSION

WASHINGTON, D.C. 20555-0001

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION RELATED TO AMENDMENT NO. 127 TO FACILITY OPERATING LICENSE NO. NPF-21 WASHINGTON PUBLIC POWER SUPPLY SYSTEM

NUCLEAR PROJECT NO. 2

DOCKET NO. 50-397

1.0 INTRODUCTION

The Washington Public Power Supply System (the licensee) submitted a May 5, 1994, letter requesting changes to the Nuclear Project No. 2 Technical Specifications (TS). The request proposed changing the plant operating license to renumber three primary containment isolation check valves listed in the TS. The licensee is making an administrative-only change to renumber valve PI-EFC-X29d to make its identifying number consistent with other similar valves listed in the TS. They are also renumbering excess flow check valves PI-EFCX-72f and PI-EFCX-73e because they are replacing them with swing check valves that have a different numbering nomenclature.

2.0 EVALUATION

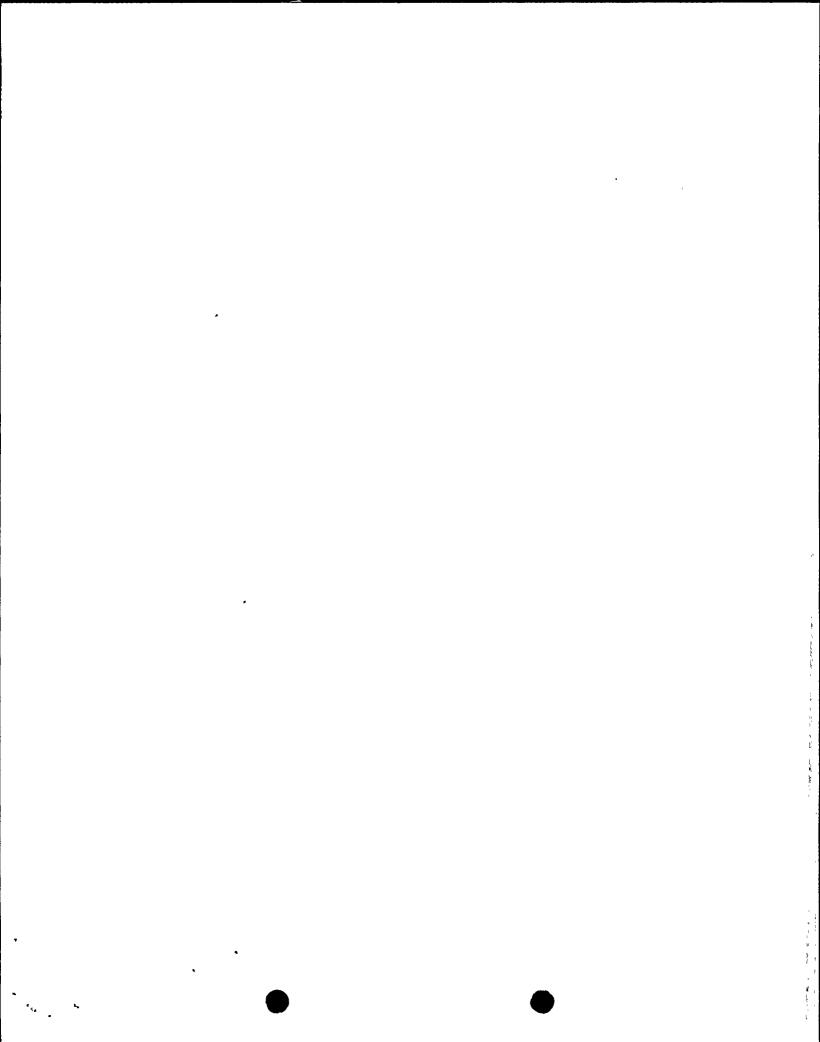
Drywell Pressure Sensing Line Excess Flow Check Valve PI-EFC-X29d

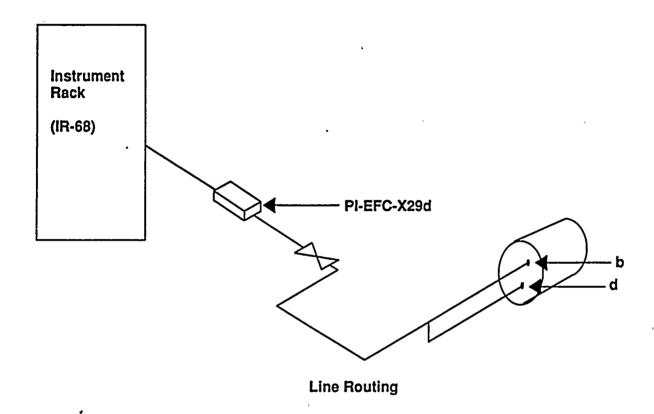
PI-EFC-X29d is an excess flow check valve on a drywell pressure sensing line to instrument rack IR-68. These type of instrument lines use a dual tube method to drain condensate from the lines. Figure 1 shows how bottom tube "d" acts as a trap and drains condensate from the instrument sensing line. This keeps condensate from building up and blocking the sensing line. TS Table 3.6.3-1 nomenclature uses instrument line penetration numbers to identify dual tube excess flow check valves. However, the TS table uses the drain line penetration number to identify valve PI-EFC-X29d. Renumbering valve PI-EFC-X29d to PI-EFC-X29b in TS Table 3.6.3-1 is an administrative-only change that will make TS valve numbering consistent. This valve renumbering will also make TS Table 3.6.3-1 consistent with existing plant design bases documents. These documents include the licensee's Master Equipment List, the process instrumentation drawing, and the TS surveillance procedure. We find this change to be acceptable.

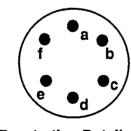
<u>Inboard Containment Isolation Excess Flow Check Valves PI-EFCX-72f and PI-EFCX-73e</u>

PI-EFCX-72f and PI-EFCX-73e are reverse-oriented excess flow check valves installed as part of the original plant design. They are located in the

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Penetration Detail

drywell and suppression chamber radiation monitor air sampling return lines inside containment.

Using excess flow check valves for primary containment integrity is a design error, and does not meet 10 CFR 50 Appendix A, General Design Criterion 56 Primary Containment Isolation requirements. The excess flow check valves are spring loaded in the open position. The valves need a minimum 15 psi differential pressure to seat. Post loss-of-coolant-accident containment pressure would seat these valves and isolate the containment. However, a containment pressure decrease would allow the valve springs to reopen the valves and degrade containment integrity. Operators can use solenoid-operated isolation valves in the return lines outside containment to mitigate this.

FSAR Section 6.2.4.3.2.2.3.3 describes the containment isolation system design bases. The FSAR indicates the drywell and suppression chamber air sampling return lines are equipped with reverse-oriented excess flow check valves used as simple check valves inside containment. The licensee determined the excess flow check valves do not function as simple check valves. They also indicated they can not modify the valves to do this. Replacing the spring loaded excess flow check valves with simple check valves without springs will make the plant conform to its design bases. Using a simple check valve in this application also meets 10 CFR 50 Appendix A, General Design Criterion 56 Primary Containment Isolation. The valve numbering changes will make the valve numbering conform to plant standard nomenclature for penetration isolation valves. We find these changes to be acceptable.

3.0 STATE CONSULTATION

In accordance with the Commission's regulations, we notified the Washington State official of the proposed issuance of the amendment. The State official had no comments.

4.0 ENVIRONMENTAL CONSIDERATION

The amendment changes a requirement with respect to the installation or use of a facility component located within the restricted area as defined in 10 CFR Part 20 and changes surveillance requirements. The NRC staff has determined that the amendment involves no significant increase in the amounts, and no significant change in the types, of any effluents that may be released offsite, and that there is no significant increase in individual or cumulative occupational radiation exposure. The Commission has previously issued a proposed finding that the amendment involves no significant hazards consideration, and there has been no public comment on such finding (59 FR 24762). Accordingly, the amendment meets the eligibility criteria for categorical exclusion set forth in 10 CFR 51.22(c)(9). Pursuant to 10 CFR 51.22(b) no environmental impact statement or environmental assessment need be prepared in connection with the issuance of the amendment.

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5.0 CONCLUSION

Renumbering valve PI-EFC-X29d to PI-EFC-X29b in TS Table 3.6.3-1 is an administrative-only change to make TS valve numbering consistent. This valve renumbering will also make TS Table 3.6.3-1 consistent with existing plant design bases documents. Replacing existing excess flow check valves PI-EFCX-72f and PI-EFCX-73e with swing check valves and changing their numbers will make the plant conform to its FSAR design basis. Renumbering these valves will make the valve numbering conform to plant standard nomenclature for penetration isolation valves. We find these changes to be acceptable.

The Commission has concluded, based on the considerations discussed above, that (1) there is reasonable assurance that the health and safety of the public will not be endangered by operation in the proposed manner, (2) such activities will be conducted in compliance with the Commission's regulations, and (3) the issuance of the amendment will not be inimical to the common defense and security or to the health and safety of the public.

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Date: June 28, 1994

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