

UNITED STATES NUCLEAR REGULATORY COMMISSION WASHINGTON, D.C. 20555-0001

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION

RELATED TO AMENDMENT NO. 135 TO FACILITY OPERATING LICENSE NO. NPF-21

WASHINGTON PUBLIC POWER SUPPLY SYSTEM

NUCLEAR PROJECT NO. 2

DOCKET NO. 50-397

1.0 INTRODUCTION

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By letter dated October 31, 1994, Washington Public Power Supply System submitted a request for changes to the Technical Specifications (TS) for Nuclear Project No. 2. The proposed changes would relocate requirements regarding safety/relief valve (SRV) position indication instrumentation from the TS to other licensee-controlled documents. The requirements for this instrumentation are currently contained in TS 3/4.3.7.5, "Accident Monitoring Instrumentation," and TS 3/4.4.2, "Safety/Relief Valves." The proposed changes are consistent with guidance contained in NUREG-1433, "Standard Technical Specifications, General Electric Plants, BWR/4," and NUREG-1434, "Standard Technical Specifications, General Electric Plants, BWR/6."

Section 182a of the Atomic Energy Act (the Act) requires applicants for nuclear power plant operating licenses to state TS to be included as part of the license. The Commission's regulatory requirements related to the content of TS are set forth in 10 CFR 50.36. That regulation requires that the TS include items in five specific categories, including (1) safety limits, limiting safety system settings and limiting control settings; (2) limiting conditions for operation; (3) surveillance requirements; (4) design features; and (5) administrative controls. However, the regulation does not specify the particular requirements to be included in a plant's TS.

The Commission has provided guidance for the contents of TS in its "Final Policy Statement on Technical Specifications Improvements for Nuclear Power Reactors" ("Final Policy Statement"), 58 FR 39132 (July 22, 1993), in which the Commission indicated that compliance with the Final Policy Statement satisfies Section 182a of the Act. In particular, the Commission indicated that certain items could be relocated from the TS to licensee-controlled documents, consistent with the standard enunciated in *Portland General Electric Co.* (Trojan Nuclear Plant), ALAB-531, 9 NRC 263, 273 (1979). In that case, the Atomic Safety and Licensing Appeal Board stated that "technical specifications are to be reserved for those matters as to which the imposition of rigid conditions or limitations upon reactor operation is deemed necessary to obviate the possibility of an abnormal situation or event giving rise to an immediate threat to the public health and safety."

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Consistent with this approach, the Final Policy Statement identified four criteria to be used in determining whether a particular matter is required to be included in the TS, as follows: (1) installed instrumentation that is used . to detect, and indicate in the control room, a significant abnormal degradation of the reactor coolant pressure boundary; (2) a process variable, design feature, or operating restriction that is an initial condition of a design-basis accident or transient analysis that either assumes the failure of or presents a challenge to the integrity of a fission product barrier; (3) a structure, system, or component that is part of the primary success path and which functions or actuates to mitigate a Design Basis Accident or Transient that either assumes the failure of or presents a challenge to the integrity of a fission product barrier; (4) a structure, system, or component which operating experience or probabilistic safety assessment has shown to be significant to public health and safety.¹ As a result, existing TS requirements which fall within or satisfy any of the criteria in the Final Policy Statement must be retained in the TS, whereas TS requirements which do not fall within or satisfy these criteria may be relocated to other licenseecontrolled documents.

2.0 EVALUATION

The licensee proposed to relocate limiting conditions of operation, action statements, surveillance requirements, and notes regarding SRV position indication instrumentation from TS 3/4.3.7.5, "Accident Monitoring Instrumentation," to other licensee-controlled documents. The primary purpose of the accident monitoring instrumentation is to display plant variables that provide information required by the control room operators during accident situations. This information provides the necessary support for the operator to take the manual actions for which no automatic control is provided and that are required for safety systems to accomplish their safety functions for design-basis events. The instruments that monitor these variables are identified by the licensee in accordance with guidance contained in Regulatory Guide 1.97. Regulatory Guide 1.97 defines five types of variables (Types A, B, C, D, and E) to be monitored by the control room operator during the course of an accident and during the long term stable shutdown phase following an accident. The Regulatory Guide also provided design and qualification criteria for this instrumentation, separated into three categories which provide a graded approach to requirements depending on the importance to safety of the measurement of a specific variable.

In general, accident monitoring instrumentation is required to provide sufficient information to the operator in the control room to assess plant response in the event of an accident, i.e., to indicate that automatic safety

¹The Commission recently promulgated a proposed change to § 50.36, pursuant to which the rule would be amended to codify and incorporate these criteria. This proposed rule clarified the contents of the Bases in the improved standard technical specifications and specified that only limiting conditions for Reactor Core Isolation Cooling, Isolation Condenser, Residual Heat Removal, Standby Liquid Control, and Recirculation Pump Trip meet the guidance for inclusion in the TS under Criterion 4. In the proposed change to § 50.36, the Commission specifically requested public comments regarding application of Criterion 4. Until additional guidance has been developed, Criterion 4 will not be applied to add TS restrictions other than those indicated above. See Proposed Rule, "Technical Specifications," 59 FR 48180 (September 20, 1994).

systems are performing properly and deviations from the expected accident course are minimal. The staff has stated in NUREG-1433 and NUREG-1434 that accident monitoring instrumentation which satisfies the definition of Type A in Regulatory Guide 1.97 meets Criterion 3 of the Policy Statement. The staff has also determined that Category I, non-Type A monitoring instruments satisfy the Final Policy Statement for inclusion in the TS based on their important contribution to the reduction to risk following an accident. Thus, the staff clarified in NUREG-1433 and NUREG-1434 that accident monitoring instrument functions necessary to avert an immediate threat to the public health and safety are limited to Regulatory Guide 1.97 Type A and Category I, non-Type A instruments, and these instruments should remain in TS. The remaining Regulatory Guide 1.97 instrument functions need not be retained in TS.

The WNP-2 Regulatory Guide 1.97 analysis identified SRV position indication as a Category 2, Type D, variable. This classification was reviewed and approved by the staff, as documented in a safety evaluation report dated March 23, 1988. Based on this classification and the discussion above, the staff concludes that the SRV position indication instrumentation is not necessary to avert an immediate threat to public health and safety. Therefore, the requirements associated with this instrumentation may be relocated from TS 3/4.3.7.5 to other licensee-controlled documents.

The licensee also proposed to relocate action statements and surveillance requirements regarding SRV position indication instrumentation from TS 3/4.4.2. The licensee stated that the position indication instrumentation is a non-intrusive design that does not affect the operability of the SRVs. Failure of the instrumentation would not increase the severity of a stuck open SRV event, nor would it reduce the capability of the SRV to perform its safety function. The instrumentation provides valve position indication and alarms only, and does not perform any control or accident mitigating functions. Therefore, the staff finds that operability of the SRV position indication instrumentation is not necessary to avert an immediate threat to public health and safety, and the requirements associated with this instrumentation may be relocated from TS 3/4.4.2 to other licensee-controlled documents.

The licensee also applied the Final Policy Statement criteria to the associated technical specifications to determine the acceptability of relocating the SRV position indication instrumentation requirements. The analysis determined that the requirements do not meet any of the Policy Statement criteria for inclusion in the TS. The licensee's analysis is summarized as follows:

 Although the SRV position indication instrumentation can indicate a breech of the reactor coolant pressure boundary (RCPB) via a stuck-open SRV, this event does not involve a significant degradation of the RCPB. The event causes only a slight decrease in thermal margins and does not result in fuel damage. Furthermore, operators can rely on other instruments (such as suppression pool temperature and reactor pressure) to indicate the existence of a breech of the RCPB.

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- (2) Operability of the SRV position indication instrumentation is not an initial condition for the stuck-open SRV transient analysis or any other analyzed accident or transient. Operator response to a stuck-open SRV is based on a suppression pool high-temperature alarm.
- (3) No credit is taken for operation of the SRV position indication instrumentation in the stuck-open SRV transient analysis. Operator response for this event is assumed to be initiated based on a suppression pool high-temperature alarm.
- (4) The stuck-open SRV event does not lead to an uncontrolled activity release to the environment; therefore, the SRV position indication instrumentation is not significant to public health and safety.

Based on the licensee's analysis, the staff finds that the SRV position indication instrumentation does not meet any of the Policy Statement criteria for inclusion in TS, and may be relocated to other licensee-controlled documents. The SRV position indication instrumentation will continue to be identified in the FSAR, and the relocated requirements will be maintained in licensee-controlled procedures. Any changes to this instrumentation or the relocated requirements will be controlled in accordance with 10 CFR 50.59.

The staff concludes that these requirements are not required to be in the TS under 10 CFR 50.36 or Section 182a of the Atomic Energy Act, and are not required to obviate the possibility of an abnormal situation or event giving rise to an immediate threat to the public health and safety. Further, they do not fall within any of the four criteria set forth in the Commission's Final Policy Statement, discussed above. In addition, the Staff finds that sufficient regulatory controls exist under 10 CFR 50.59 to adequately control future modifications to these requirements. Accordingly, the staff has concluded that these requirements may be relocated from the TS to their respective licensee-controlled documents.

3.0 STATE CONSULTATION

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

4.0 <u>ENVIRONMENTAL_CONSIDERATION</u>

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 65831). Accordingly, the amendment meets the eligibility criteria for categorical exclusion set forth in 10 CFR 51.22(c)(9). Pursuant to 10 CFR

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51.22(b) no environmental impact statement or environmental assessment need be prepared in connection with the issuance of the amendment.

5.0 <u>CONCLUSION</u>

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: March 27, 1995