

UNITED STATES NUCLEAR REGULATORY COMMISSION

WASHINGTON, D.C. 20555-0001

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION

RELATED TO AMENDMENT NO. 194

TO FACILITY OPERATING LICENSE NO. DPR-65

NORTHEAST NUCLEAR ENERGY COMPANY

THE CONNECTICUT LIGHT AND POWER COMPANY

THE WESTERN MASSACHUSETTS ELECTRIC COMPANY

MILLSTONE NUCLEAR POWER STATION, UNIT NO. 2

DOCKET NO. 50-336

1.0 INTRODUCTION

By letter dated September 11, 1995, as supplemented November 15, 1995, the Northeast Nuclear Energy Company (the licensee) submitted a request for changes to the Millstone Nuclear Power Station, Unit No. 2 Technical Specifications (TS). The requested changes would affect TS Sections 3.4.8 and 3.9.9, Tables 2.2-1, 3.3-3, 3.3-5 and 3.3-8, and Bases Sections 3/4.2.1, 3/4.4.8 and 3/4.11.2.1. These proposed changes combine several different administrative changes which will correct typographical errors, provide clarifications, or make editorial changes. The November 15, 1995, letter provided clarifying information that did not change the initial proposed no significant hazards consideration determination.

2.0 DISCUSSION AND EVALUATION

Changes to specific TSs are discussed and evaluated separately below.

2.1 TS Section 3.4.8. "REACTOR COOLANT SYSTEM, SPECIFIC ACTIVITY"

By letter dated August 9, 1990, and supplemented by a letter dated January 10, 1991, the licensee proposed a revision to the TS based on Generic Letter 87-09, that would make changes to Section 3.4.8. The proposed change was intended to clarify the exception to Section 3.0.4. The proposed change, approved in Amendment 151, failed to explicitly state the exception. As a result, the licensee proposes to add the following to the action statement "a" of the Section 3.4.8 for Modes 1, 2, and 3: "Specification 3.0.4 is not applicable." Also, the statement, "Entry into an OPERATIONAL MODE or other specified condition is permitted pursuant to Specification 3.0.4 when subject to this ACTION statement" is proposed to be deleted since exception to Section 3.0.4 allows entry into applicable MODES(s) in accordance with the above ACTION statement.

Technical Specification Section 3.0.4 permits entry into an operational mode only when the action statements for an LCO permit continued operation for an unlimited period of time. However, Section 3.4.8 is in conflict with Section 3.0.4 because it invokes Section 3.0.4 while at the same time limiting operation under the action statement to 48 hours. This is resolved by taking exception to Section 3.0.4. Since this was the original intent of the earlier TS amendment, this proposed change is editorial and, therefore is acceptable. In this context, the staff finds that the proposed changes are consistent with Combustion Engineering Owners Group (CEOG) Standard Technical Specifications (STS) (see Specification 3.4.16 of NUREG-1432, Rev. 1).

2.2 TS Section 3.9.9. "REFUELING OPERATIONS, CONTAINMENT RADIATION MONITORING" and Table 3.3-3, "ENGINEERING SAFETY FEATURE ACTUATION SYSTEM INSTRUMENTATION"

At Millstone Unit No. 2, one gaseous and one particulate radiation monitor channel are currently specified to be available. In Table 3.3-3, each channel is stated to have two sensors which are both available to initiate isolation of the containment purge valve. Operability of the channel has been interpreted as requiring only one of the two sensors to be operable. Since each sensor is completely independent, however, it is more appropriate to call each sensor a channel. The proposed changes to Table 3.3-3 and Section 3.9.9 specifies that one channel each of gaseous and particulate monitors be operable.

Since there are no area monitors which automatically initiate containment purge valve isolation, the operability requirement in Section 3.9.9 is not necessary. The proposed changes to Table 3.3-3 do not decrease the minimum channel availability. The proposed changes are administrative changes that make the TS consistent with existing conditions and, therefore, are acceptable.

2.3 TS Table 2.2-1. "REACTOR PROTECTION INSTRUMENTATION TRIP SET POINT

The Millstone Unit No. 2 reactor trip signals on Reactor Coolant System (RCS) low flow and Thermal Margin Low Pressure (TM/LP) allow the trips to be bypassed at less than 5% power and require the trips to be in effect at greater than or equal to 5% power. Note (1) of Table 2.2-1, however, is written incorrectly as "± 5%" rather than "> 5%." The proposed change to Table 2.2-1 corrects a typographical error in Note (1) by replacing "±" with ">" in front of the "5%."

The proposed change to the Table 2.2-1, Notation (1) is to correct a typographical error by replacing a \pm symbol with a \geq symbol and, therefore, is acceptable.

2.4 TS Table 3.3-5. "ENGINEERING SAFETY FEATURES RESPONSE TIMES"

Currently, TS Table 3.3-5 "Engineered Safety Features Response Times" Item 8.a lists the response time for Auxiliary Feedwater (AFW) system starting as <240 seconds including diesel generator (DG) starting and sequencing time and without including diesel starting and sequencing time. Currently, the entry for Item 8.a of the TS Table 3.3-5 includes two notations (*) and (**) to represent the two response times for the two situations. i.e., without offsite power situation and with offsite power situation, respectively. Additionally, the entry for Item 8.a includes the Notation (2) which is explained as representing a 3-minute delay. In its September 11, 1995, submittal, the licensee has proposed to replace the current entry for response time in seconds for Item 8.a of the above table by the entry "<240" and to delete Notation (2), currently contained in the table.

The staff considers that the AFW system start time should be limited to 240 seconds irrespective of whether or not offsite power is available. Therefore, the staff finds the proposed editorial changes to TS Table 3.3-5, i.e., replacing current entry of two response times with notations by a single response time without any notation for Item 8.a of the table, acceptable.

2.5 TS Table 3.3-8. "METEOROLOGICAL MONITORING INSTRUMENTATION"

A typographical error of a number reversal was made in Amendment No. 45 to the Millstone Unit No. 2. Technical Specifications Table 3.3-8, "Meteorological Monitoring Instrumentation." The nominal elevation for entry 3.b of Table 3.3-8 should be 374 feet not 347 feet, and is corrected by this amendment.

The proposed change to Table 3.3-8 is to correct a typographical error by replacing "347 ft." with "374 ft." and, therefore, is acceptable.

2.6 BASES 3/4.2.1. "LINEAR HEAT RATE" (LHR)

Millstone Unit No. 2 is equipped with an Incore Detector Monitoring System and an Excore Detector Monitoring System. These systems monitor core power distribution and are capable of verifying that the Linear Heat Rate (LHR) does not exceed its limits. Only the Incore Detector Monitoring System provides alarm setpoints that include an allowance for a flux peaking augmentation factor. The current TS Bases Section 3/4.2.1, however, erroneously includes the following assumption for the Excore Detector Monitoring System: "2) the flux peaking augmentation factors are as shown in Figure 4.2-1." The proposed change eliminates this erroneous statement in regard to the Excore Detector Monitoring System. Additionally, references to figures and values that are no longer found in the Technical Specifications are proposed to be replaced with a reference to the Core Operating Limits Report. The reference to Technical Specification Section 3.1.3.2 is also proposed to be removed since Section 3.1.3.2 was removed for Cycle 2 by Amendment No. 38.

The proposed changes to the LHR Bases Section 3/4.2.1 are editorial. There are no changes to the LHR limits, measurement uncertainties, or monitoring methods. The proposed changes are determined to be acceptable.

2.7 BASES 3/4.4.8, "SPECIFIC ACTIVITY"

Limitations on the specific activity of the primary coolant following a Steam Generator Tube Rupture (SGTR) are established in TS Section 3.4.8 to ensure that the resulting 2 hour doses at the site boundary will not exceed the 10 CFR Part 100 limits. In the Bases Section 3/4.4.8 for Specific Activity, however, the SGTR accident is stated to be in conjunction with a 1 gallon per minute (gpm) leak and a concurrent loss of power (LOP). The analysis of the SGTR in the Final Safety Analysis Report (FSAR), however, does not include a LOP. In addition, only a 0.5 gpm leakage from the intact Steam Generator (SG) is accounted for in the SGTR accident analysis. The 0.5 gpm leak from the ruptured SG is insignificant as it is superseded by the postulated break flow. The proposed change to the Bases Section 3/4.4.8 removes the references to a 1 gpm leak and LOP.

The proposed change to the Bases Section 3/4.4.8 corrects an erroneous statement that the postulated accident occurs in conjunction with a 1 gpm leak and a concurrent LOP. The SGTR accident presented in the FSAR does not have a LOP and only a 0.5 gpm leakage from the intact SG is accounted for in the SGTR accident. The 0.5 gpm leak from the ruptured SG is superseded by the break flow. This change corrects an error in the bases and, therefore, is acceptable.

2.8 BASES 3/4.11.2.1. "GASEOUS EFFLUENTS, DOSE RATE"

The limiting condition for operation (LCO) related to offsite dose rate due to radiological materials released in gaseous effluents from the site is found in Technical Specification Section 3.11.2.1. Being a release rate as a gas, it includes a dose rate limit due to inhalation for iodines, particulates, and tritium to comply with 10 CFR Part 20 limits. However, the Millstone Unit No. 2 Technical Specification Bases Section 3/4.11.2.1 refers to the "milk pathway" as the method for calculating the release rate limit. The change to the Bases Section 3/4.11.2.1 replaces the reference to the "milk pathway" with "inhalation pathway" to make it consistent with Section 3.11.2.1.

The proposed change to the Bases Section 3/4.11.2.1 is administrative to make it consistent with the actual LCO requirement in TS Section 3.11.2.1, thus it does not affect safety and is acceptable.

2.9 BASES PAGE 8 3/4 4-2a

In a letter to the NRC dated April 25, 1994, a proposed TS change related to Generic Letter 90-06 resulted in the creation of page "B 3/4 4-2a." However, page "B 3/4 4-2a" already existed in the TS. Therefore, the preexisting page "B 3/4 4-2a" is now proposed to be changed to page "B 3/4 4-2b."

The proposed change involving page B 3/4 4-2a corrects an error in pagination and, therefore, is acceptable.

3.0 STATE CONSULTATION

In accordance with the Commission's regulations, the Connecticut State official was notified 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 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 (60 FR 52933). 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.

5.0 CONCLUSION

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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