

UNITED STATES NUCLEAR REGULATORY COMMISSION

NORTHERN STATES POWER COMPANY
MONTICELLO NUCLEAR GENERATING PLANT

Docket No. 50-263

REQUEST FOR AMENDMENT TO
OPERATING LICENSE NO. DPR- 22)

(License Amendment Request Dated March 20, 1978)

Northern States Power Company, a Minnesota corporation, requests authorization for changes to the Technical Specifications as shown on the attachments labeled Exhibit A and Exhibit B. Exhibit A describes the proposed changes along with reasons for the change. Exhibit B is a set of Technical Specification pages incorporating the proposed changes.

This request contains no restricted or other defense information.

NORTHERN STATES POWER COMPANY

By *L. J. Wachter*
L J Wachter
Vice President, Power Production &
System Operation

On this 20th day of March, 1978, before me a notary public in and for said County, personally appeared L J Wachter, Vice President, Power Production & System Operation, and first being duly sworn acknowledged that he is authorized to execute this document in behalf of Northern States Power Company, that he knows the contents thereof and that to the best of his knowledge, information and belief, the statements made in it are true and that it is not interposed for delay.

Denise E. Halvorson

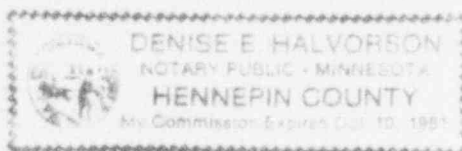


EXHIBIT A

MONTICELLO NUCLEAR GENERATING PLANT
Docket No. 50-263 License No. DPR-22

LICENSE AMENDMENT REQUEST
DATED MARCH 20, 1978

PROPOSED CHANGES TO TECHNICAL SPECIFICATIONS

Pursuant to 10CFR50.59, the holders of Provisional Operating License DPR-22 hereby propose the following changes to the Interim Radioactive Effluent Technical Specifications, Appendix B of DPR-22:

BACKGROUND

Interim radioactive effluent Technical Specifications were issued for the Monticello Nuclear Generating Plant on May 20, 1976. These limiting conditions for operation and surveillance requirements were to remain in effect until Technical Specifications are issued in accordance with Appendix I to 10 CFR 50. The limitations on radioactive effluents contained in the interim Technical Specifications generally satisfy Appendix I guidelines. New models and methodology under development by the NRC Staff will be incorporated in the final version of the radioactive effluent Technical Specifications when that work is completed.

A number of requirements contained in the May 20, 1976 interim radioactive effluent Technical Specifications must be reworded for clarification. In addition, minor errors have been found in a few instances. The purpose of this License Amendment Request is to propose changes which will provide the required clarification and correction. No changes are proposed which would revise any of the radioactive effluent limitations or substantially change any of the existing surveillance requirements.

PROPOSED CHANGES AND REASONS FOR CHANGE

We ask that the following changes be made to the TS B.2.4 Interim Technical Specifications relating to radioactive effluents. Refer to Exhibit B for the necessary page changes:

- a. On page TS B.2.4-4, change specification 2.4.2.f to read:
 - f. The continuous effluent monitors listed in Table 2.4.3 shall be calibrated at least quarterly by means of a liquid or solid radioactive source which has been calibrated to a National Bureau of Standards source. Each monitor shall also have a functional test monthly and an instrument check prior to making a release.

This change is necessary to make clear that the calibration

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requirements apply only to the effluent monitors in Table 2.4-3. This table lists other monitors which are not located at effluent points (e.g. service water discharge pipe). Calibration requirements for these monitors are located in the Appendix A Technical Specifications if required.

This change is also needed to permit monitor calibration using a liquid source. This is the preferred method of calibrating liquid effluent monitors. The current wording of 2.4.2.f allows only solid sources to be used for calibration.

- b. On page TS B.2.4-8, change the definition of the 1.1 factor to read:

1.1 = average ratio of tissue to air energy
absorption coefficients

The existing wording of this definition is not correct.

- c. On page TS B.2.4-13, change specification 2.4.4.c to read,
"An isotopic analysis shall be made of a representative sample of gaseous activity at the discharge of the steam jet air ejectors and at the plant stack..."

The current wording requires sampling at the discharge of the steam jet air ejector and at a point prior to dilution and discharge of stack releases. Since this wording was placed into effect, we have learned that the characterization of plant stack releases is best done by taking gas samples at the stack using the installed sampling probe. Samples taken upstream, prior to addition of dilution air, will not include the major contributor to stack releases which is the gland seal exhaust.

- d. On page TS B.2.4-13, change specification 2.4.4.d to read:

- d. The continuous effluent monitors listed in Table 2.4.4 shall be calibrated at least quarterly by means of a known gaseous or solid radioactive source which has been calibrated to a National Bureau of Standards source. Each monitor shall have a functional test at least monthly and an instrument check at least daily.

This change is needed to make clear that the calibration requirements apply only to the effluent monitors in Table 2.4-4. This table lists other monitors which are not located at effluent points (e. g. steam jet air ejector monitors). Calibration

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requirements for monitors which are not located at effluent points are contained in the Appendix A Technical Specifications.

This change is also needed to permit monitor calibration using a gaseous source. This is the preferred method of calibrating gaseous effluent monitors. The current wording of 2.4.4.d allows only solid sources to be used for calibration.

- e. On page TS B.2.4-17, revise the second paragraph to read:

Specification 2.4.3.g requires that the drywell atmosphere receive treatment for the removal of gaseous iodine and particulates during purging. When primary containment integrity is not required, ventilation air is not treated but is released through the monitored reactor building vents.

This change will clarify the requirement for processing of containment ventilation air prior to release. During refueling, when the containment is open for maintenance, the ventilation air flow exceeds the capacity of the standby gas treatment system. There are no significant sources of radioactivity in the exhaust air during these times. In the event radiation is detected in the exhaust air, radiation monitors automatically terminate the ventilation exhaust flow.

- f. Change the last sentence in the fifth paragraph on page TS B.2.4-17 to read, "Staff analysis of an elevated release under accident meteorology for a minimum release period of 8 hours indicated a release of 22,000 curies of Xe-133 or the dose equivalent would result in a whole body dose of 20 mrem from noble gases at the site boundary."

The current wording is incorrect. The original NRC Staff analysis was performed in conjunction with Amendment No. 11 to DPR-22 dated September 17, 1975. The analysis, using conservative methodology, resulted in a 22,000 curie tank limit based on the then existing 20-mrem offsite dose limit.

- g. Revise Table TS B.2.4-2 to:

- 1) Clarify the type of activity analysis for containment purges. Because purges are processed by the standby gas treatment system and monitored by the continuous stack monitoring system, only principal noble gas gamma emitters must be analyzed.

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- 2) Clarify the requirement to analyze for principal noble gas gamma emitters in gas samples and principal particulate gamma emitters in particulate samples.
- 3) Revise note (f) to permit stack isotopic analyses to be performed at the point of release. Characterization of plant stack releases is best done by taking gas samples at the stack using the installed sampling probe. Samples taken upstream, prior to addition of dilution air, will not include the major contributors to stack releases. Due to extremely long holdup times in the main condenser offgas system (approximately 600 hours at Monticello), activity in the main condenser offgas stream no longer constitutes the majority of the activity released from the stack.
- 4) Add note (g) to the table to expand on the requirements for analyses prior to containment purges.

Refer to Exhibit B, Table TS B.2.4-2, for the proposed wording of each of the above changes. All changes are intended to clarify the sampling and analysis requirements and to eliminate meaningless sampling.

- h. On Table TS B.2.4-3, add a note (a) to the bottom of the page as follows:

^a Not an effluent release point.

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Add a reference to note (a) to the table entries for the primary coolant system and the closed cooling water system.

This revision is required to clarify which monitors and sample points are associated with effluent points and which are not.

- i. On Table TS B.2.4-4, add a note (b) to the bottom of the page as follows:

^b Not an effluent release point. Monitor surveillance requirements are specified in the Appendix A Technical Specifications.

Add a reference to note (b) to the table entries for condenser/air ejector and offgas treatment system.

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This revision is required to clarify which monitors and sample points are associated with effluent points and which are not.

- j. Replace Figure TS B.2.4-1 with the figure provided in Exhibit B, attached. The figure has been redrawn to improve readability. No changes have been made to the limits shown on the figure.

SAFETY EVALUATION

All of the proposed changes described above are intended to clarify the interim radioactive effluent Technical Specifications. No limits are changed and no changes to the intent of the surveillance requirements are proposed. Therefore, these revisions would not reduce the degree of protection provided to the health and safety of the public.