



Northern States Power Company

Prairie Island Nuclear Generating Plant

1717 Wakonade Dr. East
Welch, Minnesota 55089

October 23, 1998

10 CFR 50.90

U S Nuclear Regulatory Commission
Attn: Document Control Desk
Washington, DC 20555

PRAIRIE ISLAND NUCLEAR GENERATING PLANT

Docket Nos. 50-282 License Nos. DPR-42
50-306 DPR-60

**License Amendment Request Dated October 23, 1998
Inoperable Rod Position Indicator Channels**

Attached is a request for a change to the Technical Specifications, Appendix A of the Operating Licenses, for the Prairie Island Nuclear Generating Plant. Northern States Power Company submits this request in accordance with the provisions of 10CFR50.90. This amendment request proposes to clarify the conditions that constitute operable Individual Rod Position Indication (IRPI) system channels, provide for an allowed out of service time for inoperable IRPI indicator channels and provide compensatory measures to be taken when any channel is determined to be inoperable.

On October 14, 1998 Northern States Power was informed that the NRC Staff had completed a review of the definition of IRPI operability utilized at Prairie Island and had concluded that the definition was not adequate. The NRC Staff clarified during a call with the Prairie Island Staff on October 15, 1998 that they consider the IRPI channels inoperable anytime the IRPI indicated position differs from the group demand position by greater than the rod misalignment limitations in Technical Specifications.

As discussed in Exhibit A, changes in rod position, as required during power changes, normally result in some amount of additional bias in the IRPI indicated rod positions. This will result in an increase in the difference between the IRPI indicated position and

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the group demand position. It is typical during significant power changes to see several IRPI channels affected by this phenomenon, some of which may exceed the Technical Specification limitations for the difference between IRPI indicated position and group demand position.

If operability of the IRPI channels is based on not exceeding the Technical Specification specified difference between IRPI indicated position and demand position, then any significant power change can result in multiple IRPI channels being declared inoperable. Per the requirements of current Prairie Island Technical Specification 3.10.F.2, should more than one IRPI channel per group or more than two IRPI channels per bank be found to be inoperable, the plant must be brought to the Hot Shutdown condition.

This presents problems for any plant evolution requiring a significant power change such as turbine valve testing or condenser cleaning, where power is reduced, but the unit is not taken to the Hot Shutdown condition. Based on past performance of the IRPI channels and the revised definition of IRPI operability, the current Prairie Island Technical Specifications do not provide adequate flexibility to perform such required plant maintenance and testing at power. The reduction in power required to perform the testing could result in a plant shutdown.

In addition, because the IRPI drift phenomenon is also experienced during power increases, the application of the requirements of Technical Specification 3.10.F.2 may prevent the plant from returning to power following shutdowns or outages.

This License Amendment Request proposes changes to the Prairie Island Technical Specifications which would resolve the problems presented by the revised IRPI operability definition.

A power reduction of Prairie Island Unit 1 for turbine valve testing and condenser tube cleaning was scheduled to be performed the weekend of October 17, 1998. This power reduction was scheduled prior to receiving the call from the NRC Staff on October 14, 1998. Implementation of the revised definition of IRPI operability, combined with the restrictions in the current Prairie Island Technical Specifications made it impossible to perform the power reduction and testing scheduled for October 17, 1998. Initiation of the power reduction would have likely resulted in Unit 1 being taken to the Hot Shutdown condition and may have prevented the unit from restarting. As a result of the revised definition of IRPI operability, the power reduction has been postponed until October 31, 1998.

The turbine valve testing originally scheduled to be performed on October 17, 1998 is required by Technical Specification 4.1. It must be completed by December 3, 1998. It has been scheduled to be performed the weekend of October 31, 1998 so that it

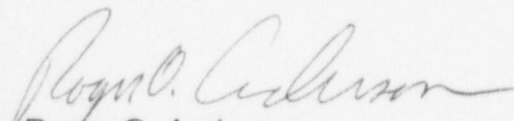
doesn't have to be performed during the Unit 2 refueling outage scheduled to begin on November 7, 1998.

Northern States Power does not consider it prudent to perform a planned Unit 1 power reduction and turbine valve test during the Unit 2 refueling outage. Our concerns focus on a potential for increased distractions to operating personnel that could occur by performing a Unit 1 power reduction and valve test during a refueling outage on the other unit. Such distractions can be a contributor to errors which could lead to undesirable plant transients or events. We believe plant safety is enhanced by performing the Unit 1 valve testing prior to the Unit 2 refueling outage.

Because we believe it is prudent to complete the Unit 1 power reduction and turbine valve testing prior to the Unit 2 refueling outage, Northern States Power asserts that exigent circumstances exist as defined 10CFR50.91(a)(5) that could not have been avoided. We respectfully request that the NRC process this License Amendment Request as an exigent change and that it be issued no later than October 30, 1998.

Exhibit A contains a description of the proposed change, the reasons for requesting the change, the supporting safety evaluation, and the significant hazards determination. Exhibit B contains current Prairie Island Technical Specification pages marked up to show the proposed change. Exhibit C contains the revised Prairie Island Technical Specification pages incorporating the proposed change.

If you have any questions related to this license amendment request, please contact John Stanton at 651-388-1121 x4083.



Roger O. Anderson
Director
Nuclear Energy Engineering

Attachments:

Affidavit

Exhibit A, Evaluation of Proposed Changes to the Technical Specification Appendix A of Operation License DPR-42 and DPR-60.

Exhibit B, Marked Up Technical Specification Pages

Exhibit C, Revised Technical Specification Pages

c: Regional Administrator -- III, NRC
NRR Project Manager, NRC
Senior Resident Inspector, NRC
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