



Northern States Power Company

414 Nicollet Mall  
Minneapolis, Minnesota 55401  
Telephone (612) 330-5500

April 24, 1986

Director  
Office of Nuclear Reactor Regulation  
US Nuclear Regulatory Commission  
Washington, DC 20555

PRAIRIE ISLAND NUCLEAR GENERATING PLANT  
DOCKET NOS 50-282 LICENSE NOS. DPR-42  
50-306 DPR-60

Auxiliary Feedwater System Reliability Study

On November 6, 1986 representatives of Northern States Power Company met with the NRC Staff to discuss the reliability of the auxiliary feedwater system at the Prairie Island Nuclear Generating Plant. At this meeting we presented the NRC Staff with information related to the design of the auxiliary feedwater system at Prairie Island and discussed plans for a reliability study to be performed to determine if the Prairie Island design is deficient in any way. This analysis has now been completed. The purpose of this letter is to transmit the analysis for the information of the NRC Staff.

On the basis of an analysis presented in NUREG-0611, "Generic Evaluation of Feedwater Transients and Small Break Loss-of-Coolant Accidents in Westinghouse-Designed Operating Plants," January, 1980, Prairie Island appeared to have a lower than average auxiliary feedwater system reliability. This six-year old report has been used by members of the NRC Staff in public discussions of planned regulatory actions to improve auxiliary feedwater system reliability in the wake of the June, 1982 Davis-Besse event. The analysis presented in NUREG-0611 does not include improvements made in the Prairie Island auxiliary feedwater system in response to NUREG-0737.

As noted in the attached report, "Prairie Island Units 1 and 2 Auxiliary Feedwater System Reliability Study," NSPNAD-86906P, April, 1986, an analysis of the reliability of the Prairie Island auxiliary feedwater system which includes modifications made subsequent to NUREG-0611 shows a system reliability that compares very favorably with other facilities and lies well within the NRC's range of acceptability.


Acc  
1/40

Director of NRR  
April 24, 1986  
Page 2

As part of this analysis Northern States Power Company sought to determine if there were any changes in system design, maintenance, or operation which could significantly improve system reliability. A number of such changes were identified. These are described in Section 5.5 of the attached report. These recommendations are currently being reviewed by the plant technical staff for implementation. Completion of these modifications could significantly improve the already high reliability of the Prairie Island design. We will inform the NRC Prairie Island licensing project manager, Mr Dominic DiIanni, of our specific plans and schedule for implementing changes.

We request that the evaluation presented in NUREG-0611 not be used by the NRC Staff in future actions related to Prairie Island auxiliary feedwater system reliability and that the attached analysis be made available to the Staff for their consideration.

Please contact us if you have any questions related to our reliability study or if additional information is required to resolve this matter.



David Musolf  
Manager Nuclear Support Services

c: NRR Project Manager, NRC  
Resident Inspector, NRC  
Regional Administrator, Region III, NRC  
G Charnoff

Attachment