

November 14, 2006

Mr. Thomas J. Palmisano
Site Vice President
Prairie Island Nuclear Generating Plant
Nuclear Management Company, LLC
1717 Wakonade Drive East
Welch, MN 55089

SUBJECT: PRAIRIE ISLAND NUCLEAR GENERATING PLANT, UNITS 1 AND 2 -
ISSUANCE OF AMENDMENTS RE: TECHNICAL SPECIFICATION
REQUIREMENTS FOR SURVEILLANCE REQUIREMENTS FOR INSTALLED
SPARE COMPONENTS AND MISCELLANEOUS CORRECTIONS
(TAC NOS. MC8874 AND MC8875)

Dear Mr. Palmisano:

The Commission has issued the enclosed Amendment No. 175 to Facility Operating License No. DPR-42 and Amendment No. 165 to Facility Operating License No. DPR-60 for the Prairie Island Nuclear Generating Plant, Units 1 and 2, respectively. The amendments consist of changes to the Technical Specifications (TSs) in response to your application dated November 9, 2005, supplemented by letter dated May 15, 2006.

The amendments modify the Technical Specifications (TS) for Prairie Island Nuclear Generating Plant (PINGP) Units 1 and 2, to clarify which TS Surveillance Requirements (SRs) shall be met for the TS systems which include more components (installed spare components) than are required to satisfy the TS Limiting Conditions for Operation. These amendments revise TS 3.7.8, "Cooling Water (CL) System," TS 3.8.1, "AC Sources-Operating," and TS 3.9.3, "Nuclear Instrumentation." The amendments also make minor corrections for some of these TSs.

A copy of our related safety evaluation is also enclosed. The Notice of Issuance will be included in the Commission's biweekly *Federal Register* notice.

Sincerely,

/RA/

Mahesh L. Chawla, Project Manager
Plant Licensing Branch III-1
Division of Operating Reactor Licensing
Office of Nuclear Reactor Regulation

Docket Nos. 50-282 and 50-306

Enclosures:

1. Amendment No. 175 to DPR-42
2. Amendment No. 165 to DPR-60
3. Safety Evaluation

cc w/encls: See next page

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The amendments modify the Technical Specifications (TS) for Prairie Island Nuclear Generating Plant (PINGP) Units 1 and 2, to clarify which TS Surveillance Requirements (SRs) shall be met for the TS systems which include more components (installed spare components) than are required to satisfy the TS Limiting Conditions for Operation. These amendments revise TS 3.7.8, "Cooling Water (CL) System," TS 3.8.1, "AC Sources-Operating," and TS 3.9.3, "Nuclear Instrumentation." The amendments also make minor corrections for some of these TSs.

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3. Safety Evaluation

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NUCLEAR MANAGEMENT COMPANY, LLC

DOCKET NO. 50-282

PRAIRIE ISLAND NUCLEAR GENERATING PLANT, UNIT 1

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 175
License No. DPR-42

1. The Nuclear Regulatory Commission (the Commission) has found that:
 - A. The application for amendment by Nuclear Management Company, LLC (the licensee), dated November 9, 2005, supplemented by letter dated May 15, 2006, complies with the standards and requirements of the Atomic Energy Act of 1954, as amended (the Act), and the Commission's rules and regulations set forth in 10 CFR Chapter I;
 - B. The facility will operate in conformity with the application, the provisions of the Act, and the rules and regulations of the Commission;
 - C. There is reasonable assurance (i) that the activities authorized by this amendment can be conducted without endangering the health and safety of the public, and (ii) that such activities will be conducted in compliance with the Commission's regulations;
 - D. The issuance of this amendment will not be inimical to the common defense and security or to the health and safety of the public; and
 - E. The issuance of this amendment is in accordance with 10 CFR Part 51 of the Commission's regulations and all applicable requirements have been satisfied.
2. Accordingly, the license is amended by changes to the Technical Specifications as indicated in the attachment to this license amendment, and paragraph 2.C.(2) of Facility Operating License No. DPR-42 is hereby amended to read as follows:

Technical Specifications

The Technical Specifications contained in Appendix A, as revised through Amendment No. 175, are hereby incorporated in the license. The licensee shall operate the facility in accordance with the Technical Specifications.

3. This license amendment is effective as of the date of its issuance and shall be implemented within 90 days.

FOR THE NUCLEAR REGULATORY COMMISSION

/RA/

L. Raghavan, Chief
Plant Licensing Branch III-1
Division of Operating Reactor Licensing
Office of Nuclear Reactor Regulation

Attachment: Changes to the Facility Operating License
and Technical Specifications

Date of Issuance: November 14, 2006

NUCLEAR MANAGEMENT COMPANY, LLC

DOCKET NO. 50-306

PRAIRIE ISLAND NUCLEAR GENERATING PLANT, UNIT 2

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 165
License No. DPR-60

1. The Nuclear Regulatory Commission (the Commission) has found that:
 - A. The application for amendment by Nuclear Management Company, LLC (the licensee), dated November 9, 2005, supplemented by letter dated May 15, 2006, complies with the standards and requirements of the Atomic Energy Act of 1954, as amended (the Act), and the Commission's rules and regulations set forth in 10 CFR Chapter I;
 - B. The facility will operate in conformity with the application, the provisions of the Act, and the rules and regulations of the Commission;
 - C. There is reasonable assurance (i) that the activities authorized by this amendment can be conducted without endangering the health and safety of the public, and (ii) that such activities will be conducted in compliance with the Commission's regulations;
 - D. The issuance of this amendment will not be inimical to the common defense and security or to the health and safety of the public; and
 - E. The issuance of this amendment is in accordance with 10 CFR Part 51 of the Commission's regulations and all applicable requirements have been satisfied.
2. Accordingly, the license is amended by changes to the Technical Specifications as indicated in the attachment to this license amendment, and paragraph 2.C.(2) of Facility Operating License No. DPR-60 is hereby amended to read as follows:

Technical Specifications

The Technical Specifications contained in Appendix A, as revised through Amendment No. 165 , are hereby incorporated in the license. The licensee shall operate the facility in accordance with the Technical Specifications.

3. This license amendment is effective as of the date of its issuance and shall be implemented within 90 days.

FOR THE NUCLEAR REGULATORY COMMISSION

/RA/

L. Raghavan, Chief
Plant Licensing Branch III-1
Division of Operating Reactor Licensing
Office of Nuclear Reactor Regulation

Attachment: Changes to the Facility Operating License
and Technical Specifications

Date of Issuance: November 14, 2006

ATTACHMENT TO LICENSE AMENDMENT NOS. 175 AND 165

FACILITY OPERATING LICENSE NOS. DPR-42 AND DPR-60

DOCKET NOS. 50-282 AND 50-306

Replace the following pages of the Facility Operating License No. DPR-42 and DPR-60 with the attached revised pages. The changed areas are identified by a marginal line.

REMOVE

INSERT

DPR-42, License Page 3
DPR-60, License Page 3

DPR-42, License Page 3
DPR-60, License Page 3

Replace the following pages of the Appendix A Technical Specifications with the attached revised pages. The revised pages are identified by amendment number and contain marginal lines indicating the areas of change.

REMOVE

INSERT

3.7.8-4
3.7.8-5
3.8.1-1
3.8.1-6
3.8.1-7
3.9.3-3

3.7.8-4
3.7.8-5
3.8.1-1
3.8.1-6
3.8.1-7
3.9.3-3

- (4) Pursuant to the Act and 10 CFR Parts 30, 40, and 70, NMC to receive, possess and use in amounts as required any byproduct, source or special nuclear material without restriction to chemical or physical form, for sample analysis or instrument and equipment calibration or associated with radioactive apparatus or components;
- (5) Pursuant to the Act and 10 CFR Parts 30 and 70, NMC to possess but not separate, such byproduct and special nuclear materials as may be produced by the operation of the facility;
- (6) Pursuant to the Act and 10 CFR Parts 30 and 70, NMC to transfer byproduct materials from other job sites owned by Northern States Power Company for the purpose of volume reduction and decontamination.

C. This amended license shall be deemed to contain and is subject to the conditions specified in the following Commission regulations in 10 CFR Chapter I: Part 20, Section 30.34 of Part 30, Sections 50.54 and 50.59 of Part 50, and Section 70.32 of Part 70; is subject to all applicable provisions of the Act and to the rules, regulations, and orders of the Commission now or hereafter in effect; and is subject to the additional conditions specified or incorporated below:

(1) Maximum Power Level

NMC is authorized to operate the facility at steady state reactor core power levels not in excess of 1650 megawatts thermal.

(2) Technical Specifications

The Technical Specifications contained in Appendix A, as revised through Amendment No. 175, are hereby incorporated in the license. NMC shall operate the facility in accordance with the Technical Specifications.

(3) Physical Protection

NMC shall fully implement and maintain in effect all provisions of the Commission-approved physical security, guard training and qualification, and safeguards contingency plans including amendments made pursuant to provisions of the Miscellaneous Amendments and Search Requirements revisions to 10 CFR 73.55 (51 FR 27817 and 27822) and to the authority of 10 CFR 50.90 and 10 CFR 50.54(p). The combined set of plans, which contains Safeguards Information protected under 10 CFR 73.21, is entitled: "Prairie Island Nuclear Generating Plant Security Plan, Training and Qualification Plan, Safeguards Contingency Plan, and Independent Spent Fuel Storage Installation Security Program," Revision 0, submitted by letter dated October 18, 2004.

Unit 1

Amendment No. 175

- (5) Pursuant to the Act and 10 CFR Parts 30 and 70, NMC to possess but not separate, such byproduct and special nuclear materials as may be produced by the operation of the facility;
- (6) Pursuant to the Act and 10 CFR Parts 30 and 70, NMC to transfer byproduct materials from other job sites owned by Northern States Power Company for the purposes of volume reduction and decontamination.

C. This amended license shall be deemed to contain and is subject to the conditions specified in the following Commission regulations in 10 CFR Chapter I: Part 20, Section 30.34 of Part 30, Sections 50.54 and 50.59 of Part 50, and Section 70.32 of Part 70; is subject to all applicable provisions of the Act and to the rules, regulations, and orders of the Commission now or hereafter in effect; and is subject to the additional conditions specified or incorporated below:

(1) Maximum Power Level

NMC is authorized to operate the facility at steady state reactor core power levels not in excess of 1650 megawatts thermal.

(2) Technical Specifications

The Technical Specifications contained in Appendix A, as revised through Amendment No. 165, are hereby incorporated in the license. NMC shall operate the facility in accordance with the Technical Specifications.

(3) Physical Protection

NMC shall fully implement and maintain in effect all provisions of the Commission-approved physical security, guard training and qualification, and safeguards contingency plans including amendments made pursuant to provisions of the Miscellaneous Amendments and Search Requirements revisions to 10 CFR 73.55 (51 FR 27817 and 27822) and to the authority of 10 CFR 50.90 and 10 CFR 50.54(p). The combined set of plans, which contains Safeguards Information protected under 10 CFR 73.21, is entitled: "Prairie Island Nuclear Generating Plant Security Plan, Training and Qualification Plan, Safeguards Contingency Plan, and Independent Spent Fuel Storage Installation Security Program," Revision 0, submitted by letter dated October 18, 2004.

Unit 2

Amendment No. 165

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION
RELATED TO AMENDMENT NO. 175 TO FACILITY OPERATING LICENSE NO. DPR-42
AND AMENDMENT NO. 165 TO FACILITY OPERATION LICENSE NO. DPR-60
NUCLEAR MANAGEMENT COMPANY, LLC
PRAIRIE ISLAND NUCLEAR GENERATING PLANT, UNITS 1 AND 2
DOCKET NOS. 50-282 AND 50-306

1.0 INTRODUCTION

By application dated November 9, 2005, as supplemented by letter dated May 15, 2006, Nuclear Management Company, LLC (NMC)(the licensee) requested changes to the Technical Specifications (TSs) for the Prairie Island Nuclear Generating Plant (PINGP) Units 1 and 2. The supplement provided additional information that reduced the scope of the application as originally noticed, and did not change the staff's original no significant hazard consideration determination as published in the *Federal Register* on February 14, 2006 (71 FR 7809).

The proposed changes would clarify the TSs by specifying the required features that must be operable for TS systems that include more installed components than are required to meet the Limiting Condition for Operation (LCO). Thus, the lowest functional capability established for the revised TS will not require installed spare components to be operable for the LCO to be met.

These amendments revise TS 3.7.8, "Cooling Water (CL) System," TS 3.8.1, "AC Sources-Operating," and TS 3.9.3, "Nuclear Instrumentation." The amendments also make minor corrections for some of these TSs.

2.0 REGULATORY EVALUATION

Section 182a of the Atomic Energy Act (the "Act") requires applicants for nuclear power plant operating licenses to include TSs as part of the license. The TSs ensure the operational capability of structures, systems and components that are required to protect the health and safety of the public. The Commission's regulatory requirements related to the content of the TSs are contained in 10 CFR 50.36. This regulation requires that the TSs include items in the following specific categories: (1) safety limits, limiting safety systems settings, and limiting control settings (50.36(c)(1)); (2) Limiting Conditions for Operation (50.36(c)(2)); (3) Surveillance Requirements (50.36(c)(3)); (4) design features (50.34(c)(4)); and (5) administrative controls (50.36(c)(5)).

Criterion 39 in the PINGP updated safety analysis report (USAR), "Emergency Power for Engineered Safety Features," requires that alternate power systems shall be provided and

designed with adequate independence, redundancy, capacity, and testability to permit the functioning required of the engineered safety feature. At a minimum, the on-site power system and the offsite power system shall each independently provide this capacity, assuming a failure of a single active component in each power system. Criterion 39 is comparable to general design criteria (GDC) 17. GDC 17, "Electric Power Systems," of 10 CFR Part 50, Appendix A requires that nuclear power plants have onsite and offsite electric power systems to permit the functioning of structures, systems, and components that are important to safety. The onsite system is required to have sufficient independence, redundancy, and testability to perform its safety function, assuming a single failure. The offsite power system must be supplied by two physically independent circuits that are designed and located so as to minimize, to the extent practical, the likelihood of their simultaneous failure under operating and postulated accident and environmental conditions. In addition, this criterion requires provisions to minimize the probability of losing electric power from the remaining electric power supplies as a result of loss of power from the unit, the offsite transmission network, or the onsite power supplies.

In general, there are two classes of changes to TSs: (1) changes needed to reflect modifications to the design basis (TSs are derived from the design basis), and (2) voluntary changes to take advantage of the evolution in policy and guidance as to the required content and preferred format of TSs over time. This amendment deals with the second class of changes. In determining the acceptability of revising TS 3.7.8, CL System, surveillance requirement (SR) 3.7.8.2, SR 3.7.8.4 and SR 3.7.8.6; TS 3.8.1, alternating current (AC) Sources Operating, Condition A, and SR 3.8.1.1; and TS 3.9.3, Nuclear Instrumentation, SR 3.9.3.1 and SR 3.9.3.2 the staff used the approved guidance in NUREG-1431, "Standard Technical Specifications, Revision 3 Westinghouse Plants," dated June, 2004.

NUREG-1431, "Standard Technical Specifications, Westinghouse Plants" contains the improved Standard Technical Specifications (STS) for Westinghouse plants. The improved STS were developed based on the criteria in the Final Commission Policy Statement on Technical Specifications Improvements for Nuclear Power Reactors, dated July 22, 1993 (58 FR 39132), which was subsequently codified in 10 CFR 50.38 (50 FR 36953). The use of improved STS achieves a high degree of standardization and consistency.

Licenses may revise the TSs to adopt current improved STS format and content provided that plant-specific review supports a finding of continued adequate safety. Such a finding may be made when: (1) the change is editorial, administrative or provides clarification (i.e., no requirements are materially altered), (2) the change is more restrictive than the licensee's current requirement, or (3) the change is less restrictive than the licensee's current requirement, but still provides adequate assurance of safety when judged against current regulatory standards. The detailed application of this general framework, and additional specialized guidance, are discussed in Section 3.0 in the context of specific proposed changes.

3.0 TECHNICAL EVALUATION

The Nuclear Regulatory Commission (NRC) staff has reviewed the justification for the requested PINGP TSs in NMCs application dated November 9, 2005, as supplemented by letter dated May 15, 2006. The detailed evaluation below will support the conclusion 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.

3.1 TS 3.7.8, CL System

LCO 3.7.8 requires two operable cooling water system trains. The changes proposed to TS 3.7.8 will modify SR 3.7.8.2, SR 3.7.8.4 and SR 3.7.8.6, which establish requirements to assure the CL system safety grade pumps are operable. SR 3.7.8.2 requires that the licensee verify that each diesel driven CL pump starts and assumes its required load within 1 minute. The test frequency is once per 31 days. SR 3.7.8.4 requires that the licensee verify that the vertical motor driven CL pump is operable once per 92 days. SR 3.7.8.6 requires that the licensee verify that the diesel driven and vertical motor-driven CL pumps start automatically on an actual or simulated actuation signal once per 24 months.

The CL System is a shared system common to both units; it provides a heat sink for the removal of process and operating heat from safety related components during a design-basis accident (DBA) or transient. During normal operation and a normal shutdown, the CL System also provides this function for various safety related and non-safety related components. The safety related function is covered by LCO 3.7.8. The CL System consists of a common CL pump discharge header for the five CL pumps (two non-safeguards pumps, two safeguards pumps, and one pump that can be designated as safeguards or non-safeguards) which direct flow into two separate, 100 percent capacity, CL headers. Each header then supplies loops in the turbine, auxiliary, and containment buildings for the two units. Two CL trains are required to be operable to provide the redundancy necessary to ensure that the system removes post accident heat loads, assuming that the worst-case single active failure occurs coincident with the loss of offsite power. Each safeguards CL train consists of one 100 percent capacity vertical safeguards pump (12 or 121 for Train A; 22 or 121 for Train B). The vertical motor-driven pump (121) may be directed to supply either CL header when aligned in its safeguards mode of operation. In this case, the vertical motor-driven pump (121) may replace a vertical diesel driven pump.

The licensee stated that any two of the three safeguards CL pumps are capable of satisfying the LCO 3.7.8 requirement for two operable trains, each with an operable safeguards CL pump. The licensee expressed concern that as currently written, SR 3.7.8.2, SR 3.7.8.4 and SR 3.7.8.6 could be interpreted to require all three CL pumps to meet their respective SRs for the CL system LCO to be met.

The licensee proposes to add the adjective "required" as a modifier to "CL pump" in SR 3.7.8.2, SR 3.7.8.4 and SR 3.7.8.6. The licensee noted that the addition of "required" is consistent with the TS Bases for LCO 3.7.8, in which a train is operable when, "the safeguards CL pump aligned to the train, is OPERABLE." Since the system design includes three safeguards CL pumps, one safeguards CL pump may be inoperable, and the LCO would still be met. The licensee stated that the addition of "required" to these SRs clarifies that the safeguards CL pump not required for the LCO to be met is not required to meet the applicable SRs. Only pumps required to meet the LCO are required to meet the SRs for the CL trains to be operable.

The NRC staff concludes that only two of the three installed safeguards pumps are needed to establish operability of the CL system. The conclusion acknowledges that the vertical

motor-driven pump (121) may replace only the vertical diesel driven pump in the header it is aligned to. Therefore, adding the word "required" to SR 3.7.8.2, SR 3.7.8.4 and SR 3.7.8.6 is acceptable since the change defines the CL system lowest functional capability required for safe operation of the facility per 50.36(c)(2), and consistent with the plant licensing basis as provided in Section 10.4 of the USAR for Prairie Island Units 1 and 2.

3.2 TS 3.8.1, AC Sources Operating

LCO 3.8.1.a requires two operable paths between the offsite transmission grid and the onsite 4 kV Safeguards Distribution System. The changes proposed to TS 3.8.1 will modify SR 3.8.1.1 and ACTIONS Condition A, which establishes requirements to assure that the paths to offsite power are operable, and that remedial actions are appropriate when the LCO is not met. SR 3.8.1.1 requires that the licensee verify correct breaker alignment and indicated power availability for each path once every 7 days. Condition A applies to the plant condition of "One Path Inoperable."

The 4 kV safeguards distribution system AC sources for a unit consist of the offsite power sources and the onsite standby power sources (Train A and Train B diesel generators (DGs)). The onsite safeguards AC distribution system is divided into redundant trains so that the loss of any one train does not prevent the minimum safety functions from being performed. Each train has two connections to the offsite power sources and one to an onsite DG. Offsite power is supplied to the unit switchyard(s) from the transmission network by five transmission lines. From the switchyard(s) electrically and physically separated paths provide AC power through step down station auxiliary transformers to the 4 kV safeguards buses. A path consists of all breakers, transformers, switches, cabling, and controls required to transmit power from the offsite transmission network to the safeguards bus(es). Each path must be capable of maintaining rated frequency and voltage and accepting required loads during an accident, while connected to the safeguards buses. Two paths between the offsite transmission grid and the onsite 4 kV safeguards distribution system and separate and independent DGs for each train ensure availability of the required power to shut down the reactor and maintain it in a safe shutdown condition after an anticipated operational occurrence or a postulated DBA. The paths are described in the USAR and are part of the licensing basis for the unit.

There are four separate external power sources which provide multiple offsite network connections: (a) a reserve transformer (1R) from the 161 kV portion of the plant substation; (b) a second reserve transformer (2RS/2RY) from the 345 kV portion of the plant substation; (c) a cooling tower transformer (CTI/CT11) supplied from the 345 kV portion of the plant substation; and (d) a cooling tower transformer (CT12) supplied from a tertiary winding on the substation auto transformer.

The licensee stated that there are four paths from the offsite AC sources to the plant safeguards 4 kV busses of which any two are capable of satisfying the LCO 3.8.1 requirement for two operable paths. The licensee expressed concern that as currently written, SR 3.8.1.1 could be interpreted to require all four paths to meet this SR for the offsite function of the AC electrical sources LCO to be met.

LCO 3.8.1 for the AC sources specifies two paths shall be operable between the offsite transmission grid and the onsite 4 kV Safeguards Distribution System. TS Bases 3.8.1 describe four paths which satisfy the LCO, two for each 4 kV safeguards train. Therefore, the

LCO may be met while two paths are inoperable. The licensee proposes to add the adjective "required" as a modifier to "path" in SR 3.8.1.1 and in ACTIONS Condition A. The licensee stated that the addition of "required" to this SR clarifies that the paths not required for the LCO to be met are not required to meet the applicable SR. Only paths required to meet the LCO are required to meet the SR for the AC Sources to be operable. The addition of "required" to Condition A clarifies that the paths not required for the LCO to be met are not required to meet the applicable Required Actions for Condition A.

The NRC staff concludes that only two of the four installed paths are needed to establish operability of the AC offsite sources. Therefore, adding the word "required" to SR 3.8.1.1 and to Condition A is acceptable since the change defines the AC Sources offsite power LCO lowest functional capability required for safe operation of the facility per 50.36(c)(2).

The licensee also proposed to correct the spelling of "recommendations" and add spacing to the table header on page 3.8.1-7. The NRC staff finds these editorial changes acceptable.

The 4 kV safeguards distribution system AC sources for each unit consist of the offsite power sources and the onsite standby power sources (Train A and Train B DGs). The onsite safeguards AC distribution system is divided into redundant trains so that the loss of any one train does not prevent the minimum safety functions from being performed. Each train has two connections to the offsite power sources, and one to an onsite DG. Offsite power is supplied to the unit switchyard from the transmission network by five transmission lines. From the switchyard, electrically and physically separated paths provide AC power through step down station auxiliary transformers to the 4 kV safeguards buses. Two paths between the offsite transmission grid and the onsite 4 kV safeguards distribution system and separate and independent DGs for each train, ensure availability of the required power to shut down the reactor and maintain it in a safe shutdown condition after an anticipated operational occurrence or a postulated design-basis accident.

The licensee states that a path consists of all breakers, transformers, switches, cabling, and controls required to transmit power from the offsite transmission network to the safeguards bus. Each path must be capable of maintaining rated frequency and voltage, and accepting required loads during an accident, while connected to the safeguards bus. The paths for PINGP are described in the USAR, and are part of the licensing basis for the unit. The licensee states there are four separate external power sources which provide multiple offsite network connections: a) a reserve transformer (1R) from the 161 kV portion of the plant substation; b) a second reserve transformer (2RS/2RY) from the 345 kV portion of the plant substation; c) a cooling tower transformer (CT1/CT11) supplied from the 345 kV portion of the plant substation; and d) a cooling tower transformer (CT12) supplied from a tertiary winding on the substation auto transformer.

The system and associated TS discussed above have components included in the TS, which are not required to be operable for the LCO to be met (installed spare TS components). The SRs for these components do not clearly specify that only components which are required for the LCO to be met are required to meet the SRs. There are four paths from the offsite AC sources to the 4 KV busses of which, any two are capable of satisfying the requirement of LCO 3.8.1 requirement for two operable paths.

In NUREG-1431, Technical Specification 3.8.1, "AC Sources - Operating," Surveillance Requirement 3.8.1.1 "required" is bracketed, which means that it should be included when there are more offsite circuits than are necessary to satisfy the LCO. The staff understands that PINGP has four different external power sources to provide offsite power available. Only two qualified circuits between the offsite transmission network and the onsite Class 1E AC electrical power distribution system are needed for operability at PINGP. The staff finds that adding the term "required" to the SR would clarify that the two extra offsite sources not being used to meet the LCO would not need to meet the SR in order for offsite power to remain operable. The SR would still be conducted on the two other required circuits to insure operability and meet the LCO.

The NRC staff has evaluated the licensee's circumstances and the justifications provided. The NRC staff finds that the proposed amendment does not change or alter the design of the AC electrical sources for operability. The intent of SR is not being changed and will be conducted in compliance with NRC regulations. Even with the addition of "required" to the SR, the requirements of 10 CFR 50.36(c)(3) are still being met. SR 3.8.1.1 will continue to assure the necessary quality of systems and components set forth in the requirements as well as those specified in the GDC.

The licensee should identify which two sources will now be credited to fulfill the requirement of GDC-17. However, if the licensee decides not to perform the SR on the remaining two offsite sources, it will not be permitted to credit the remaining two sources until they are brought back into compliance with TS 3.8.1.

Based on the information provided by the licensee, the staff concludes that the proposed changes to TS SR 3.8.1.1, to add the adjective "required" as a modifier of "path," is acceptable. The proposed change to TS 3.8.1, "AC Sources," clarifies the SR so that it is clear that the paths not required for the LCO to be met are not required to meet the applicable SR. The proposed changes do not alter the electrical power system AC sources design or its physical configuration, nor should they affect its ability to operate.

3.3 TS 3.9.3, Nuclear Instrumentation

LCO 3.9.3 requires two core subcritical neutron flux monitors and one core subcritical neutron flux monitor audible count rate circuit to be operable. The changes proposed to TS 3.9.3 will modify SR 3.9.3.1 and SR 3.9.3.2, which establish requirements to assure the subcritical neutron flux monitor is operable. SR 3.9.3.1 requires the licensee to perform channel check once per 12 hours. SR 3.9.3.2 requires that the licensee perform channel calibration once per 24 months (neutron detectors are excluded from channel calibration).

The licensee stated that there are four core subcritical neutron flux monitors of which any two are capable of satisfying the LCO 3.9.3 requirement for two operable core subcritical neutron flux monitors. The licensee also stated that two of the four core subcritical monitors function as audible core neutron flux count rate monitors, either of which is capable of satisfying the LCO 3.9.3 requirement for one operable audible core subcritical neutron flux count rate monitor. The licensee expressed a concern that, as currently written, SR 3.9.3.1 and SR 3.9.3.2 could be interpreted to require all core subcritical neutron flux monitors and both audible core subcritical neutron flux count rate monitors to meet the SRs for the core subcritical neutron flux monitoring and the core subcritical neutron flux monitor audible count rate functions to be met.

Core subcritical neutron flux monitors are used during refueling operations to monitor the core reactivity condition. The LCO requires that two core subcritical neutron flux monitors, capable of monitoring subcritical neutron flux, be operable to ensure that redundant monitoring capability is available to detect changes in core reactivity. Neutron detectors N-31, N-32, N-51 and N-52 may be used to satisfy this LCO requirement. This LCO also requires that one audible count rate circuit, N-31 or N-32, be operable to ensure that audible indication is available to alert the operator in containment in the event of a dilution accident or improperly loaded fuel assembly.

The licensee proposes to add the clause "of required channels" to SR 3.9.3.1 and SR 3.9.3.2. LCO 3.9.3 requires two core subcritical neutron flux monitors to be operable and one core subcritical neutron flux monitor with an audible count rate to be operable. As discussed in the TS Bases, there are four channels of core subcritical neutron flux monitors, two of which are capable of providing an audible count rate. Therefore, the LCO may be met while some monitors are inoperable. The licensee stated that the addition of the proposed clause to these SRs clarifies that the monitors not required for the LCO to be met are not required to meet the SRs. Only monitors required to meet the LCO are required to meet the SRs for the core subcriticality monitoring function to be operable.

The NRC staff concludes that at a minimum two of the four installed subcritical neutron flux monitors are needed, of which one must function as an audible count rate monitor to establish operability of the LCO for TS 3.9.3 to provide both the monitoring function and alarm function for audible indication in the control room. Therefore, adding the clause "of required channels" to SR 3.9.3.1 and to SR 3.9.3.2 is acceptable since the change defines the subcritical neutron flux monitoring lowest functional capability required for safe operation of the facility per 10 CFR 50.36(c)(2).

4.0 STATE CONSULTATION

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

5.0 ENVIRONMENTAL CONSIDERATION

This amendment changes the requirements with respect to installation or use of a facility component located within the restricted area as defined in 10 CFR Part 20 and changes the surveillance requirements. The 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 (71 FR 7809). 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.

6.0 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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