UNITED STATES NUCLEAR REGULATORY COMMISSION
OFFICE OF INSPECTION AND ENFORCEMENT

REGION III

Report of Operations Inspection

IE Inspection Report No. 050-263/77-01

Licensee: Northern States Power Company
414 Nicollet Mall
Minneapolis, Minnesota 55401

Monticello Nuclear Generating Plant
Monticello, Minnesota

License No. DPR-22
Category: C

Type of Licensee: BWR GE 1670 MWt

Type of Inspection: Routine, Unannounced

Dates of Inspection: January 24-28, 1977

Principal Inspector: N. C. Choules — 2/8/77 (Date)

Accompanying Inspectors: None

Other Accompanying Personnel: None

Reviewed By: G. Fiorelli, Chief
Reactor Operations and
Nuclear Support Branch — 2/8/77 (Date)

SUMMARY OF FINDINGS

Inspection Summary

Inspection on January 24-28, 1977, (77-01): Review of design changes, maintenance, procurement, and reportable occurrences. One item of noncompliance related to installation of a temporary design change was identified.

Enforcement Item

Deficiency

Contrary to 10 CFR Part 50, Appendix B, Criterion V, a plant administrative procedure was not adhered to as follows. A temporary design change was installed and removed from the residual heat removal system without completing a Work Request Authorization (WRA) as required by 4 ACD 3.6, paragraphs 6.1 and 6.2.3. (Paragraph 4, Report Details)

Licensee Action on Previously Identified Enforcement Items

Not applicable.

Other Significant Items

A. Systems and Components

The licensee is currently performing modifications on the torus to strengthen the welds between the torus shell and the support columns.

B. Facility Items (Plans and Procedures)

None.

C. Managerial Items

None.

D. Deviations

None.

E. Status of Previously Reported Unresolved Items

Not applicable.

Management Interview

A management interview was conducted with Messrs. Clarity, Antony and Schinost at the conclusion of the inspection on January 28, 1977. The following was discussed:

A. Procurement

The inspector stated he had reviewed procurement records, receipt inspection records, and toured the licensee's warehouse, and no discrepancies were noted. (Paragraph 2, Report Details)

B. Maintenance

The inspector stated he had reviewed several maintenance jobs and no noncompliance items were identified. The inspector stated that there has been improvement in the instructions provided on WRA's but further improvement could still be made. The licensee acknowledged the inspector's comment. (Paragraph 3, Report Details)

C. Design Changes

The inspector stated that he had reviewed several design changes and one item of noncompliance was identified. The inspector stated that Temporary Design Change 76-M-064 was not installed and removed using the Work Request Authorization process of Administrative Directive 4 ACD 3.6. The inspector stated that even though the change was installed on an emergency basis, a WRA is required to be prepared after installation to document the installation per 4 ACD 3.6. The licensee acknowledged the inspector's statements and stated that they would review the requirements of completing WRAs for emergency work with personnel involved in preparing WRAs. The inspector stated that this would be adequate corrective action and a written response would not be required.

The inspector also stated that his review of design changes showed that revisions to drawings and procedures are not always accomplished in a timely manner. The licensee stated they would take steps to correct these discrepancies. (Paragraph 4, Report Details)

D. Reportable Occurrences

1. RO 76-17

The inspector stated that he understood that the licensee's initial corrective action for this occurrence was temporary

and that a permanent corrective action modification was planned to engage the stem clamp to the stem for valve MO-2008. The licensee confirmed this statement. The inspector inquired as to whether or not they planned the same modification for any other valves. The licensee stated that they had not had any other stem clamp failures, and did not plan modifications to other valves at least until they had proved the modification to MO-2008. (Paragraph 5.a, Report Details)

2. RO 76-22

The inspector stated he had reviewed the licensee's corrective action for this occurrence and it appeared to be adequate. (Paragraph 5.b, Report Details)

E. Significant Operating Event M-SOE-77-01

The subject SOE was discussed with the licensee. (Paragraph 6, Report Details)

REPORT DETAILS

1. Persons Contacted

L. R. Eliason, Plant Manager
M. H. Clarity, Superintendent, Plant Engineering and Radiation Protection
W. E. Anderson, Superintendent, Plant Operations and Maintenance
D. D. Antony, Plant Engineer, Operations
W. H. Shamla, Plant Engineer, Technical
W. H. Sparrow, Operations Supervisor
W. J. Hill, Engineer, Instruments
B. D. Day, Engineer
D. E. Pedersen, Engineer
D. E. Nevinski, Engineer, Nuclear
R. A. Goranson, Engineer
O. N. Iverson, Engineer
H. M. Kendall, Plant Office Supervisor
P. A. Pochop, Quality Assurance Engineer
R. L. Scheinost, Quality Assurance Engineer
J. D. Weyhrauch, Plant Administrative Specialist
R. E. Grabinski, Plant Administrative Specialist
M. J. Markiel, Plant Administrative Specialist

2. Procurement

The inspector reviewed the plant material procurement program. The review included a tour of the material storage warehouse, review of purchase order packages, quality assurance requirements, and receipt inspection as follows:

a. Six 1976 procurement packages were reviewed, including purchase orders (POs), quality assurance records, and receipt inspection records. The packages reviewed were M94780, CRDM Accumulators; M16086, Target Rock Relief Valve Parts; M15536, Turbine Stop Valve Parts; M87891, Hydraulic Snubber Parts; M94120, Steel Plate for the Torus; and M22517, Level Control Relay. No discrepancies were noted.

b. Procurement records for the following items stored onsite were verified to exist:

(1) Stainless Steel Tubing, PO M16886

(2) Borax 10, PO M16218

(3) Liquid Penetrant Cleaner, PO M94700

No discrepancies were noted in the review of these records.

The inspector also reviewed the licensee's system of tracking installed materials and components. Safety related items (except electronic parts) are stored in the warehouse. When they are withdrawn, the WRA number for which the item is used is recorded on a history card. The licensee is working on a system to track electronic items at this time.

3. Maintenance

The inspector reviewed records for maintenance activities controlled by the following safety related Work Request Authorizations which were accomplished during the past year.

WRAs numbered 76-319, 76-345, 76-383, 76-344, 76-463, 77-102, 77-103, 76-542, 76-660, 76-790, 76-799, 76-821, 76-831, 76-850, 76-1158, 76-1151, 76-1152, 76-1716 and 1774.

The inspector verified that the above maintenance activities were accomplished in accordance with the licensee's Administrative Procedures and Quality Assurance Program. No significant discrepancies were identified.

4. Design Changes

The inspector reviewed the following design change packages which were completed or partially completed during the past year.

76-M-002, Drywell Torus Delta P System
76-M-026, RCIC Control Modification
76-M-029, Drain Line Vent Modification to Six Inch Moisture Separator Drain Line
76-M-033, Reactor Building Crane Interlock for Fuel Cask
76-M-066, Removal of Open Torque Switch Bypass on Containment Cooling Isolation Valves
76-M-064, Temporary Residual Heat Removal System (RHR) Test Instrumentation
M-75-23, Turbine Building Roof Ventilation Modification

One item of noncompliance was noted in the review of these design changes. Design Change 76-M-064 was a temporary design change which installed and removed instrumentation on the RHR system to determine the cause of water hammer on the shutdown cooling system. The instrumentation was apparently installed on an emergency basis on October 15, 1976, and removed some time later. Apparently no record of installation or removal was made. Licensee Administrative Control Directive 4 ACD 3.6, paragraph 6.1.1, requires

a WRA shall be used, with some exceptions, and design changes are not included in the exceptions. 4 ACD 3.6, paragraph 6.2.3, allows emergency work to be started without completion of a WRA with the Shift Supervisor's approval, but the WRA must be completed after the work is started. This apparently was not completed for the above.

Some minor discrepancies were noted for Design Changes 76-M-29 and 75-M-53. In both design changes, procedures and drawings were identified as needing revision, but these revisions had not been submitted or completed at the time of the inspection. 76-M-29 was completed May 22, 1976, and 75-M-53 was completed November 25, 1976. The licensee stated that these revisions would be completed.

5. Reportable Occurrences

The following reportable occurrences were reviewed by examination of logs, records, observations of equipment, and through discussions with plant personnel. Occurrences were reviewed for completion of reporting requirements, investigation and determination of cause, proposed corrective measures, and completion of corrective action.

a. RO 76-17, Failure of RHR Torus Cooling Injection Valve - MO-2008[1/]

This valve failed to open because the stem clamps loosened due to shearing of the set screws. Temporary corrective action was to weld the stem clamp to the valve stem. The licensee plans to make a permanent modification using a key and keyway arrangement to engage the stem and stem clamp.

b. RO 76-22, Failure of No. 2 Start System on No. 11 Diesel Generator[2/]

The No. 2 start system failed because rust particles apparently clogged the bleed off orifice to the air relay which actuates the starting system. The inspector inquired if cleaning the system was part of their preventive maintenance (PM) program. The licensee's representative stated that the PM program requires cleaning every 6 months and the occurrence occurred 2 weeks prior to the scheduled cleaning. The licensee's representative indicated they do not plan to increase the frequency of the PM as they feel this was an isolated occurrence and there is a redundant start system.

1/ RO 50-263/76-17, NSP to Region III, dtd 10/1/76.
2/ RO 50-263/76-22, NSP to Region III, dtd 11/1/76.

c. The following reportable occurrences were reviewed in the office and are considered closed:

(1) RO 76-23, Omission of Functional Test of MSL Radiation Monitor[3/4/]

(2) RO 76-24, Turbine Bypass Header Drain Leak[5/]

6. Significant Operating Event M-SOE-77-01

During an audit of surveillance testing by the licensee's Surveillance Coordinator, it was discovered that evaluation of data for Surveillance Test 0083, Reactivity Anomaly Check, should have been completed before December 22, 1976, to comply with Technical Specification 4.3.E, which requires an actual rod inventory comparison to predicted at least every full power month. Data was obtained for the test on December 13, 1976, and evaluated on January 3, 1977. Review of completed Surveillance Tests 0083 for 1976 indicates the evaluations were not completed as required on three other occasions in April, August and September. The licensee had also identified these same failures to evaluate on time. In all cases, data was obtained prior to exceeding one full power month and no limiting conditions for operations were exceeded. The licensee's investigation indicated that failure to evaluate the data on time was caused by a misunderstanding between personnel required to complete the evaluation. The licensee has instructed the personnel involved on the proper timing of obtaining and evaluating data for Surveillance Test 0083.

3/ RO 50-263/76-23, NSP to Region III, dtd 11/24/76.
4/ IE Inspection Rpt No. 050-263/76-18.
5/ RO 50-263/76-24, NSP to Region III, dtd 12/27/76.