January 27, 2003

Mr. T. Coutu
Site Vice President
Kewaunee Nuclear Power Plant
N490 Hwy 42
Kewaunee, WI 54216

SUBJECT: KEWAUNEE NUCLEAR POWER PLANT
NRC INTEGRATED INSPECTION REPORT 50-305/02-08

Dear Mr. Coutu:

On December 28, 2002, the U.S. Nuclear Regulatory Commission (NRC) completed an integrated inspection at your Kewaunee Nuclear Power Plant. The enclosed report documents the inspection findings which were discussed on January 7, 2003, with you and members of your staff.

The inspection examined activities conducted under your license as they relate to safety and compliance with the Commission's rules and regulations and with the conditions of your license. The inspectors reviewed selected procedures and records, observed activities, and interviewed personnel.

On the basis of the results of this inspection, no findings of significance were identified.

Since the terrorist attacks on September 11, 2001, the NRC has issued two Orders (dated February 25, 2002, and January 7, 2003) and several threat advisories to licensees of commercial power reactors to strengthen licensee capabilities, improve security force readiness, and enhance access authorization. The NRC also issued Temporary Instruction 2515/148 on August 28, 2002, that provided guidance to inspectors to audit and inspect licensee implementation of the interim compensatory measures (ICMs) required by the February 25th Order. Phase 1 of TI 2515/148 was completed at all commercial nuclear power plants during 2002, and the remaining inspections are scheduled for completion in 2003. Additionally, table-top security drills were conducted at several licensees to evaluate the impact of expanded adversary characteristics and the ICMs on licensee protection and mitigative strategies. Information gained and discrepancies identified during the audits and drills were reviewed and dispositioned by the Office of Nuclear Security and Incident Response. For 2003, the NRC will continue to monitor overall safeguards and security controls, conduct inspections, and resume force-on-force exercises at selected power plants. Should threat conditions change, the NRC may issue additional Orders, advisories, and temporary instructions to ensure adequate safety is being maintained at all commercial power reactors.

In accordance with 10 CFR 2.790 of the NRC's "Rules of Practice," a copy of this letter and its enclosure will be made available electronically for public inspection in the NRC Public Document Room or from the Publicly Available Records (PARS) component of NRC's document system (ADAMS). ADAMS is accessible from the NRC Web site at http://www.nrc.gov/reading-rm/adams.html (the Public Electronic Reading Room).

Sincerely,

/RA/

Kenneth Riemer, Chief
Branch 5
Division of Reactor Projects

Docket No. 50-305
License No. DPR-43

Enclosure: Inspection Report 50-305/02-08

cc w/encl: D. Graham, Director, Bureau of Field Operations
Chairman, Wisconsin Public Service Commission
State Liaison Officer

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U.S. NUCLEAR REGULATORY COMMISSION

REGION III

Docket No:	50-305
License No:	DPR-43
Report No:	50-305/02-08
Licensee:	Nuclear Management Company, LLC
Facility:	Kewaunee Nuclear Power Plant
Location:	N 490 Highway 42 Kewaunee, WI 54216
Dates:	October 1 through December 28, 2002
Inspectors:	J. Lara, Senior Resident Inspector Z. Dunham, Resident Inspector M. Farber, Reactor Engineer R. Gibbs, Inspector, Office of Nuclear Reactor Regulation T. Madeda, Physical Security Inspector H. Peterson, Senior Operations Engineer T. Ploski, Senior Emergency Preparedness Inspector M. Castanedo, Reactor Engineer
Approved By:	Kenneth Riemer, Chief Branch 5 Division of Reactor Projects

SUMMARY OF FINDINGS

IR 05000305-02-08; Nuclear Management Company, LLC; on 10/01-12/28/02; Kewaunee Nuclear Power Plant; Integrated Inspection Report.

This report covers a 3-month period of baseline resident inspection and announced baseline inspections in emergency preparedness, physical security, maintenance rule program, and licensed operator requalification. The inspections were conducted by the resident inspectors, inspectors from the Region III office, and an inspector from the Office of Nuclear Reactor Regulation. There were no findings identified during this inspection. The NRC's program for overseeing the safe operation of commercial nuclear power reactors is described in NUREG-1649, "Reactor Oversight Process," Revision 3, dated July 2000.

A. Inspection Findings

No findings of significance were identified.

B. Licensee-Identified Findings

No findings of significance were identified.

REPORT DETAILS

Summary of Plant Status

The plant was operated at approximately 100 percent power for most of the period except for a brief reduction in power to facilitate quarterly scheduled surveillance testing.

1. REACTOR SAFETY

Cornerstones: Initiating Events, Mitigating Systems, Barrier Integrity, and Emergency Preparedness

1R01 Adverse Weather Protection (71111.01)

.1 Circulating Water Intake and Forebay Freeze Protection

a. Inspection Scope

On October 28, 2002, the inspectors reviewed the facility design and the licensee's procedures to prevent and cope with freezing of the circulating water intake and forebay to ensure that the facility's ultimate heat sink (Lake Michigan) would remain available during periods of extreme cold weather. In preparation for the walkdown, the inspectors reviewed Procedure E-CW-04, "Loss of Circulating Water," Revision T, which prescribed operator actions to take in the event of icing of the forebay traveling water screens, to verify that all operator actions were capable of being performed as written. Additionally, the inspectors evaluated the forebay design to ensure that during a forebay icing event the fire pumps would remain available for use. The inspectors considered fire pump availability important during an icing event because one prescribed operator action was to wash down the traveling water screens using fire hoses to remove slush ice. On December 2, the inspectors verified the circulating water recirculation pump lineup which the licensee had recently started. The circulating water recirculation pump, which the licensee operated when circulating water temperature was below 35 degrees Fahrenheit (°F), provided flow from the circulating water discharge to the intake crib to prevent local icing at the crib.

b. Findings

No findings of significance were identified.

.2 Facility Air Handling Systems

a. Inspection Scope

On October 29, 2002, the inspectors evaluated various air ventilation systems, including the auxiliary building and control room ventilation systems, to ensure that the systems were capable of meeting Updated Safety Analysis Report (USAR) design requirements for maintaining internal building temperatures above 60 °F with an outside air temperature of -20 °F. The inspectors reviewed various operations, normal and

abnormal procedures, system drawings, and the USAR in addition to walking down the ventilation system lineups. The inspectors also reviewed the licensee's corrective action database to determine whether there were any historical problems associated with cold weather on the facility's ventilation systems.

b. Findings

No findings of significance were identified.

.3 Diesel Fuel Oil Storage Tanks

a. Inspection Scope

On November 15, 2002, the inspectors reviewed the design of the station's in-ground diesel fuel oil storage tanks, which provided fuel oil storage for the safety-related diesel generators, to verify that the tanks were adequately protected from freezing weather. In addition to reviewing the design of the tanks, the inspectors reviewed the maintenance history of the fuel oil transfer pumps and their susceptibility to freezing weather to ensure that the pumps would operate as required under extreme weather conditions.

b. Findings

No findings of significance were identified.

1R04 Equipment Alignment (71111.04)

a. Inspection Scope

The inspectors conducted partial walkdowns of the system trains listed below while the opposite train of equipment was out-of-service to verify that the systems were correctly aligned to perform their design safety function. In preparation for the walkdowns, the inspectors reviewed the system lineup checklists, normal operating procedures, abnormal and emergency operating procedures, and system drawings to verify the correct system lineup. During the walkdowns, the inspectors also examined valve positions and electrical power availability to verify that valve and electrical breaker positions were consistent with, and in accordance with, the licensee's procedures and design documentation. The material condition of the equipment was also inspected.

- Service Water (SW) - Train 'A' - October 4, 2002
- Diesel Generator - Train 'A' - November 7

b. Findings

No findings of significance were identified.

1R05 Fire Protection (71111.05)

a. Inspection Scope

The inspectors walked down ten plant areas to assess the overall readiness of fire protection equipment and barriers:

- Auxiliary Building Basement (Waste Handling Area) - October 10, 2002
- Auxiliary Building Basement (Bus 1 and Bus 2) - October 18
- Carbon Dioxide Storage Tank Room - October 24
- Auxiliary Feedwater Pump Train 'A' Room - December 3
- Safeguard Alley Train 'B' - December 3
- Turbine Oil Storage Tank Room - December 6
- Cable Spreading Room - December 12
- Auxiliary Building Fan Floor - December 13
- Screenhouse - December 19
- Technical Support Center and Non-Safeguard Battery Rooms - December 24

Emphasis was placed on the control of transient combustibles and ignition sources, the material condition of fire protection equipment, and the material condition and operational status of fire barriers used to mitigate fire damage or propagation. Additionally, fire hoses, sprinklers, and portable fire extinguishers were inspected to verify that they were in satisfactory physical condition and were unobstructed. Passive features such as fire doors, fire dampers, and fire zone penetration seals were also inspected to verify that they were in satisfactory condition and capable of providing an adequate fire barrier.

b. Findings

No findings of significance were identified.

1R06 Flood Protection Measures (71111.06)

a. Inspection Scope

On October 22, 2002, the inspectors reviewed Design Change Request 2873, "Re-design of Process Piping for Radiation Monitors R-16 and R-20," which was installed in 1998, to determine whether the licensee had adequately addressed potential internal flooding concerns which the design change had introduced. In summary, the design change included routing two 1-inch SW lines which continuously routed water from the SW system returns to an open trench located near electrical bus 1 and bus 2. The inspectors considered the potential plugging of the trench and subsequent overflow of water into the area to be potentially significant because bus 1 and bus 2, although nonsafety-related, provided 4160-volts alternating current to the main feedwater pumps and reactor coolant pumps, therefore creating an initiating event should the buses become inadvertently grounded.

b. Findings

No findings of significance were identified.

1R07 Heat Sink Performance (71111.07)

a. Inspection Scope

On October 31, 2002, the licensee conducted heat exchanger performance monitoring on the 'A' train diesel generator jacket water coolers. The inspectors observed portions of the performance monitoring test, reviewed the test procedure, and reviewed the test data to verify that the test was performed as written, that the acceptance criteria were adequate to demonstrate acceptable heat transfer capability of the heat exchanger, and that the test data met the acceptance criteria. Additionally, the inspectors also verified that the test accounted for instrument inaccuracies and that the test frequency was sufficient to provide early detection of heat exchanger degradation prior to any loss of heat removal capabilities below design values.

b. Findings

No findings of significance were identified.

1R11 Licensed Operator Requalification Program (71111.11)

.1 Biennial Written Examination and Annual Operating Test Results

a. Inspection Scope

The inspectors reviewed the overall pass/fail results of individual written tests, Job Performance Measure (JPM) operating tests, and simulator operating tests (required to be given per 10 CFR 55.59(a)(2)) administered by the licensee during 2002. The overall results were compared with the significance determination process in accordance with NRC Manual Chapter 0609, Appendix I, "Operator Requalification Human Performance Significance Determination Process (SDP)."

b. Findings

No findings of significance were identified.

.2 Simulator Dynamic Requalification Exam

a. Inspection Scope

On December 9, 2002, the inspectors observed a simulator dynamic requalification exam to evaluate crew performance, formality of communications, and annunciator response. The inspectors reviewed the following licensee procedures and documents to establish the inspection criteria:

- General Nuclear Procedure (GNP) - 03.17.01, “Alarm Response Standard,” Revision A
- GNP-03.17.02, “Briefings Standards,” Revision A
- GNP-03.17.04, “Communications Standard,” Revision A
- Emergency Plan Implementing Procedure AD-02, “Emergency Class Determination,” Revision AD

In addition, the inspectors evaluated the crew’s implementation of the facility’s abnormal procedures and emergency operating procedures, oversight and direction provided by the shift manager and control room supervisor, and the adequacy of identification and reporting of the event classification in accordance with the facility’s emergency plan. The inspectors also compared the simulator board configuration with the actual control room board configuration for consistency between the two to verify that the simulator environment matched the actual control room environment as closely as possible. The inspectors observed the post-scenario critique to determine whether performance issues were accurately identified and addressed.

b. Findings

No findings of significance were identified.

1R12 Maintenance Effectiveness

.1 Routine Review of Maintenance Effectiveness (71111.12)

a. Inspection Scope

The inspectors reviewed the licensee's implementation of the Maintenance Rule, 10 CFR 50.65, for the systems and/or equipment problems listed below. The inspectors observed portions of the licensee’s troubleshooting and repair efforts to determine the adequacy of the licensee’s repairs to the affected equipment. The inspectors also reviewed the licensee’s maintenance practices associated with the failed equipment where applicable to verify that equipment on opposite trains or other systems at the station were not susceptible to maintenance-induced common cause failures. Additionally, the inspectors reviewed the licensee’s maintenance rule history and evaluation of each system to verify that they were properly scoped in accordance with 10 CFR 50.65, and that reliability and availability performance criteria were appropriate.

- N-35 Intermediate Range Power Supply Failure - October 9, 2002
- ‘B’ Train Diesel Generator Speed Response Abnormal During Surveillance Test - October 11
- Auxiliary Building Ventilation - November 19

b. Findings

No findings of significance were identified.

.2 Biennial Review (71111.12B)

Periodic Evaluation

a. Inspection Scope

- Verify that the periodic evaluation was completed within the time restraints defined in 10 CFR 50.65 (once per refueling cycle, not to exceed 2 years). Ensure that the licensee reviewed its goals, monitored performance of structures, systems, and components (SSCs), reviewed industry operating experience, and made appropriate adjustments to the maintenance rule program as a result of the above activities;

- Verify that the licensee balanced reliability and unavailability during the previous refueling cycle, including a review of safety significant SSCs;

- Verify that (a)(1) goals were met, that corrective action was appropriate to correct the defective condition, including the use of industry operating experience, and that (a)(1) activities and related goals were adjusted as needed; and

- Verify that the licensee has established (a)(2) performance criteria, examined any SSCs that failed to meet their performance criteria, and reviewed any SSCs that have suffered repeated maintenance preventable functional failures including a verification that failed SSCs were considered for (a)(1).

The inspectors examined the Maintenance Rule Periodic Assessments completed for January 1 to December 31, 2001, and February 1, 1999 to January 1, 2001. To evaluate the effectiveness of (a)(1) and (a)(2) activities, the inspector examined a number of Kewaunee Action Requests (ARs) (listed at the end of this report). In addition, ARs were reviewed to verify that the threshold for identification of problems was at an appropriate level and the associated corrective actions were appropriate. Also, the maintenance rule program documents, audits and self-assessments of the program were reviewed.

b. Findings

No findings of significance were identified.

1R13 Maintenance Risk Assessment and Emergent Work Control (71111.13)

a. Inspection Scope

The inspectors reviewed the licensee's evaluation and assessment of plant risk, scheduling, and configuration control during the planned and emergent work activities listed below. In particular, the licensee's planning and management of maintenance was evaluated to verify that on-line risk was acceptable and in accordance with the requirements of 10 CFR 50.65(a)(4). Additionally, the inspectors compared the assessed risk configuration against the actual plant conditions and any in-progress

evolutions or external events to verify that the assessment was accurate, complete, and appropriate. Licensee actions to address increased on-line risk during these periods were also inspected to verify that actions were in accordance with approved administrative procedures.

- Risk Profile associated with work performed during week ending October 4, 2002
- Risk Profile associated with work performed during week ending October 25
- Risk Profile associated with work performed during week ending November 15
- Risk Profile associated with work performed during week ending November 22
- Risk Profile associated with work performed during week ending December 13

b. Findings

No findings of significance were identified.

1R14 Non-Routine Evolutions (71111.14)

a. Inspection Scope

On December 7, 2002, the unit was reduced to 70 percent power to facilitate quarterly auxiliary feedwater full flow in-service testing and main turbine stop and control valve testing. The inspectors observed selected control room activities and evolutions to evaluate control room staff adherence to plant operating procedures, equipment operation, and communications.

b. Findings

No findings of significance were identified.

1R15 Operability Evaluations (71111.15)

a. Inspection Scope

The inspectors reviewed design basis information and technical specification requirements to verify the technical adequacy of the operability evaluations listed below, to verify that system operability was properly justified, and that the system remained available, such that no unrecognized increase in risk occurred. Where applicable, the inspectors also reviewed calculations and input assumptions to determine the validity of the results.

The inspectors reviewed the following operability evaluations:

- Corrective Action Program (CAP) 13253; 'B' Diesel Generator Speed Response Abnormal When Performing SP 42-312B - October 11, 2002
- CAP 13380; Suspected Water Hammer Following Turbine-Driven Auxiliary Feedwater Pump Start - October 21
- CAP 13507; Non-conservative Assumptions in Determining Motor-Operated Valve Settings - November 1

b. Findings

No findings of significance were identified.

1R16 Operator Workarounds (OWAs) (71111.16)

.1 Control Room Deficiency Tags

a. Inspection Scope

On October 15, 2002, the inspectors reviewed the licensee's control room deficiency log, out-of-service control room indicators and equipment, and reviewed posted danger cards located in the control room to determine whether known degraded or out-of-service equipment in the control room would impact operator response to plant transients or emergencies and therefore be considered potential OWAs.

b. Findings

No findings of significance were identified.

.2 Semi-Annual Cumulative Review of OWAs

a. Inspection Scope

On December 4, 2002, the inspectors reviewed all active OWAs to determine whether there were any cumulative effects of the OWAs on the reliability and availability of system equipment, and whether there was any increased impact on operators to respond in a correct and timely manner to plant transients and accidents.

b. Findings

No findings of significance were identified.

1R19 Post-Maintenance Testing (71111.19)

a. Inspection Scope

The inspectors observed the post-maintenance testing activities associated with the maintenance and emergent work activities listed below to verify that the test was adequate for the scope of the work which had been performed and that the testing acceptance criteria were clear and demonstrated operational readiness consistent with design and licensing basis documents. The inspectors attended pre-job briefings to verify that the impact of the testing had been properly characterized; observed or reviewed the test to verify that the test was performed as written and all testing prerequisites were satisfied; and reviewed the test acceptance criteria. Following the completion of the test, the inspectors conducted walkdowns of the affected equipment, when applicable, to verify that the test equipment was removed and that the equipment was returned to a condition in which it could perform its safety function.

- Motor-Operated Valve RHR-400A Preventative Maintenance - October 18, 2002
- Replacement of Turbine-Driven Auxiliary Feedwater Starting Circuit Relay - October 21
- Technical Support Center Diesel Generator Preventative Maintenance - November 27
- Valve RHR-101 Volume Booster Replacement - December 9
- Service Water Pump B2 Replacement - December 10
- Installation of Surge Suppressor on Valve SW-1306A - December 17
- Motor-Operated Valve SW-903B Preventative Maintenance - December 19

b. Findings

No findings of significance were identified.

1R22 Surveillance Testing (71111.22)

a. Inspection Scope

The inspectors observed surveillance testing on risk-significant equipment to verify that the equipment was capable of performing its intended safety function and that the surveillance tests satisfied the requirements contained in technical specifications and the licensee's procedures, and that the equipment was capable of meeting its design function. During the surveillance tests, the inspectors reviewed the test to verify that it was adequate to demonstrate operational readiness consistent with the design and licensing basis documents, and that the testing acceptance criteria were clear. Portions of the test were observed to verify that the test was performed as written, that all testing prerequisites were satisfied, and that the test data was complete, appropriately verified, and met the requirements of the testing procedure. Following the completion of the test, where applicable, the inspectors conducted walkdowns of the affected equipment to verify that the test equipment was removed and that the equipment was returned to a condition in which it could perform its safety function.

The inspectors observed and reviewed the performance of the following surveillance testing on risk-significant equipment:

- Diesel Generator 'A' Monthly Availability Test - October 4, 2002
- Service Water Train 'B' Pump and Valve Quarterly In-Service Test (IST) - October 23
- Component Cooling Water Train 'A' Pump and Valve Quarterly IST - November 8
- Component Cooling Water Train 'B' Pump and Valve Quarterly IST - November 21
- Containment Spray Train 'B' Pump and Valve Quarterly IST - December 11

b. Findings

No findings of significance were identified.

1R23 Temporary Plant Modifications (71111.23)

a. Inspection Scope

On November 19, 2002, the inspectors reviewed Temporary Change Request 02-017, "Spool Piece Installed in Place of 1A Spent Fuel Pool Exhaust Fan." Temporary Change Request 02-017 installed a temporary spool piece in the spent fuel pool exhaust ventilation system to maintain a high-energy line break barrier during periods when the exhaust ventilation system boundary would be open for maintenance. The inspectors reviewed the licensee's high-energy line break analysis and (USAR) Updated Safety Analysis Report to evaluate the adequacy of the temporary change request. Additionally, the inspectors evaluated the adequacy of the tagout associated with the installation of the spool piece and observed portions of the maintenance on the associated exhaust fan.

b. Findings

No findings of significance were identified.

1EP4 Emergency Action Level and Emergency Plan Changes (71114.04)

a. Inspection Scope

The inspector reviewed Revision 26 to the Kewaunee Nuclear Power Plant's Emergency Plan to determine whether changes identified reduced the effectiveness of the licensee's emergency planning, pending onsite inspection of the implementation of these changes.

b. Findings

No findings of significance were identified.

1EP6 Drill Evaluation (71114.06)

a. Inspection Scope

On December 17, 2002, the licensee performed an emergency planning drill. The drill was designed to exercise the licensee's onsite and offsite emergency response organization and emergency plan. The inspectors observed portions of the drill from the control room simulator and the technical support center to evaluate the licensee's evaluation, classification, and notification of the simulated event, including development and communication of protective action recommendations. The inspectors also attended the general drill debrief to determine whether the licensee was properly identifying drill weaknesses.

b. Findings

No findings of significance were identified.

3. SAFEGUARDS

Cornerstone: Physical Protection

3PP4 Security Plan Changes (71130.04)

a. Inspection Scope

The inspectors reviewed Revision 17 to the Kewaunee Nuclear Power Plant Security Manual Plan to verify that the changes did not decrease the effectiveness of the submitted document. The referenced revision was submitted in accordance with 10 CFR 50.54(p)(2) requirements by licensee letters dated October 18, 2002.

b. Findings

No findings of significance were identified.

4. OTHER ACTIVITIES

4OA1 Performance Indicator Verification (71151)

a. Inspection Scope

The inspectors reviewed the licensee's performance indicator collection process and historical data from the fourth quarter of 2001 through the third quarter of 2002 to verify the accuracy of collected and submitted data for the performance indicators listed below. Additionally, the inspectors reviewed corrective action records, monthly operating reports, control room logs, and licensee event reports to independently verify the data that the licensee had collected.

- Safety System Unavailability - Safety Injection System, October 8, 2002
- Safety System Unavailability - Residual Heat Removal System, October 8

b. Findings

No findings of significance were identified.

4OA2 Identification and Resolution of Problems (71152)

.1 Routine Review of Identification and Resolution Problems

a. Inspection Scope

As discussed in previous sections of this report, the inspectors routinely reviewed issues during baseline inspection activities and plant status reviews to verify that they were being entered into the licensee's corrective action system at an appropriate threshold, that adequate attention was being given to timely corrective actions, and adverse trends

were identified and addressed. Minor issues entered into the licensee's corrective action system as a result of inspectors' observations are generally denoted in the report.

b. Issues

No issues were identified.

.2 Review of Licensee's Re-evaluation of NRC Bulletin 88-04 Response

Introduction and Description

As part of the Selected Issue Follow-up Inspection of Inspection Procedure 71152, the inspectors selected CAP 192 (dated January 11, 2002) and an associated corrective action, CA 3209, for review to ensure that the corrective action had been implemented appropriately. Corrective Action Process 192 was written by the licensee to document the dead-heading of a component cooling water (CCW) pump under low flow conditions which occurred on January 10, 2002 (See Inspection Report 50-305/01-17 for additional details). Corrective action 3209, associated with CAP 192, required that the licensee review a previous response to the NRC regarding NRC Bulletin 88-04, "Potential Safety-Related Pump Loss," dated May 5, 1988. Bulletin 88-04 documented industry concerns regarding pump miniflow designs. Specifically, one concern involved the potential for the dead-heading of one or more pumps in safety-related systems that have a miniflow line common to two or more pumps or other piping configurations that do not preclude pump-to-pump interaction during miniflow operation. A second concern was whether or not installed miniflow capacity was adequate for single pump operation. The licensee's summarized response to NRC Bulletin 88-04, as it applied to the CCW system, was that "the component cooling water system was not vulnerable to this particular type of system failure." Contrary to the bulletin response, the CCW pumps were found to be susceptible to dead-heading during specific flow conditions on January 11, 2002. The inspectors evaluated the licensee's review of the bulletin response to ensure that in addition to revisiting potential dead-heading of the CCW pumps that the licensee also re-evaluated their analysis of other safety-related pumps including residual heat removal pumps, auxiliary feedwater pumps, SW pumps, safety injection pumps, and containment spray pumps. The risk significance of this issue was previously evaluated and is documented in Inspection Report 50-305/02-03.

a. Completion and Resolution of Corrective Actions

(1) Inspection Scope

The inspectors reviewed CAP 192; CA 3209; Root Cause Evaluation (RCE) 02-002, "Component Cooling Pump Deadheading"; NRC Bulletin 88-04; Licensee Event Report 50-305/2002-001-00, "Unanalyzed Condition: Strong Pump - Weak Pump Interaction Between Component Cooling Water Pumps"; and Wisconsin Public Service Letter NRC-88-91, "Initial Response to NRC Bulletin No. 88-04: Potential Safety-Related Pump Loss," dated July 8, 1988. The inspectors also interviewed licensee personnel (1) to assess the adequacy of the licensee's re-evaluation of their response to Bulletin 88-04 to ensure that the CCW system was properly evaluated for potential

miniflow design considerations and (2) to ensure that the initial evaluations associated with other safety-related systems were also re-evaluated by the licensee.

(2) Issues

No issues were identified.

.3 RCE 01-058, "Failed Feedwater Regulation Valve Booster Causes Plant Trip"

Introduction and Description

As part of the Selected Issue Follow-up Inspection of Inspection Procedure 71152, the inspectors selected Root Cause Evaluation (RCE) 01-058, "Failed Feedwater Regulation Valve Booster Causes Plant Trip," for review to verify whether identified corrective actions had been appropriately dispositioned. Root Cause Evaluation 01-058 evaluated a plant trip due to a lowering water level on the 'B' steam generator which occurred on June 20, 2001. The licensee identified that the cause of the lowering steam generator level was due to a failed volume booster associated with the main feedwater regulating valve. The licensee subsequently determined that the root cause for the failure was that there was no regular replacement schedule for volume boosters at the plant and that historically the boosters had only been replaced when they had become problematic or had failed.

a. Completion and Resolution of Corrective Actions

(1) Inspection Scope

The inspectors reviewed RCE 01-058, "Failed Feedwater Regulation Valve Booster Causes Plant Trip," dated August 8, 2001, reviewed the licensee's corrective action program database, reviewed the licensee's preventative maintenance program regarding volume boosters at the facility, and interviewed maintenance and work control planning personnel to determine the adequacy and dispostion of the corrective actions associated with RCE 01-058.

(2) Issues

No issues were identified.

40A5 Other Activities

.1 Completion of Appendix A to Temporary Inspection 2515/148, Revision 1, Inspection of Nuclear Reactor Safeguards Interim Compensatory Measures

The inspectors completed the pre-inspection audit for interim compensatory measures at nuclear power plants, dated September 13, 2002.

.2 Safeguard Document Request

The inspectors provided to the licensee the NRC's request regarding safeguards information.

.3 Institute of Nuclear Power Operations Training Accreditation Report Review

On December 4, 2002, the inspectors reviewed the most recent Institute of Nuclear Power Operations Training Accreditation Report for the licensee's training program. The report placed the licensee's training program on probation.

4OA6 Meetings

Interim Exit Meetings

Interim exits were conducted for:

- Safeguards Inspection with Mr. M. Fencl on October 29, 2002;
- Biennial Maintenance Rule Inspection (71111.12B) with Mr. T. Coutu, Site Vice President on December 6; and
- Licensed Operator Requalification (71111.11B) with Mr. Wyatt Godes, Operations Training Supervisor on December 19, via telephone.

Exit Meeting

The resident inspectors presented the inspection results to Mr. T. Coutu and other members of licensee management on January 7, 2003. The inspectors asked the licensee whether any materials examined during the inspection should be considered proprietary. No proprietary information was identified.

KEY POINTS OF CONTACT

Nuclear Management Company, LLC

L. Armstrong, Engineering Director
S. Baker, Manager, Radiation Protection
A. Bolyen, Licensing
T. Coutu, Site Vice President, Kewaunee Site
R. Farrell, Manager, Planning and Scheduling
M. Fencl, Security Manager, Kewaunee/Point Beach
D. Gauthier, Nuclear Oversight
W. Godes, Operations Training Supervisor
G. Harrington, Licensing Leader
K. Hull, Supervisor, Engineering and Mechanical Design
J. Ladewig, Engineering
K. McCann, Engineering
J. McCarthy, Assistant Plant Manager, Operations
P. Miller, Engineering
R. Nicolai, Corrective Actions
K. Peveler, Nuclear Oversight
S. Putman, Assistant Plant Manager, Maintenance
R. Repshas, Manager, Site Services
K. Schommer, Engineering
J. Stafford, Superintendent, Operations
C. Steinhardt, Engineering
T. Webb, Regulatory Affairs

LIST OF ACRONYMS USED

AR	Action Request
CA	Corrective Action
CAP	Corrective Action Process
CCW	Component Cooling Water
CFR	Code of Federal Regulations
DRP	Division of Reactor Projects
DRS	Division of Reactor Safety
GNP	General Nuclear Procedure
JPM	Job Performance Measure
IST	In-Service Test
NOA	Nuclear Oversight Assessment
NRC	Nuclear Regulatory Commission
OWA	Operator Workaround
RCE	Root Cause Evaluation
SDP	Significance Determination Process
SSCs	Structures, Systems, and Components
SW	Service Water
USAR	Updated Safety Analysis Report

LIST OF DOCUMENTS REVIEWED

1R01 Adverse Weather Protection

Relief Request IST-RR-23; IST Plan - Diesel Generator Fuel Oil Transfer Pumps; Revision O

PMP 04-03; CW Recirculating Pump and Circulating Water Chlorine Monitoring Water Pump Maintenance (QA-2); Revision H

Operations Department Instruction - Cold Weather Operation; December 13, 2001

NRC Information Notice 98-02; Nuclear Power Plant Cold Weather Problems and Protective Measures

XK-185-1; Peerless Pump; June 12, 1969

N-ACA-17; Auxiliary Building Ventilation System; Revision Q

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