December 21, 2000

Mr. Mark Reddemann Site Vice President Kewaunee and Point Beach Nuclear Plants Nuclear Management Company, LLC 6610 Nuclear Road Two Rivers, WI 54241

SUBJECT: KEWAUNEE - NRC INSPECTION REPORT 50-305/00-22(DRS)

Dear Mr. Reddemann:

On December 8, 2000, the NRC completed the baseline annual inspection of evaluations of changes, tests, or experiments (10 CFR Part 50.59) at your Kewaunee Nuclear Power Plant. The enclosed report documents the inspection results which were discussed on December 8, 2000, with you and other members of your staff.

This inspection examined activities conducted in accordance with the requirements of 10 CFR Part 50.59 under your license as they relate to changes to facility structures, systems, and components; normal and emergency procedures; and the updated final safety analysis report. The inspector reviewed selected procedures and records, observed activities, and interviewed personnel.

No findings of significance were identified.

In accordance with 10 CFR 2.790 of the NRC's "Rules of Practice," a copy of this letter and its enclosure will be 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 <u>http://www.nrc.gov/NRC/ADAMS/index.html</u> (the Public Electronic Reading Room).

Sincerely,

/RA John M. Jacobson Acting for/

Ronald N. Gardner, Chief Electrical Engineering Branch Division of Reactor Safety

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

Enclosure: Inspection Report 50-305/00-22(DRS)

See Attached Distribution

Mr. Reddemann

cc w/encl: K. Weinhauer, Assistant Site Vice President, Kewaunee Plant B. Burks, P.E., Director, Bureau of Field Operations Chairman, Wisconsin Public Service Commission State Liaison Officer Mr. Mark Reddemann Site Vice President Kewaunee and Point Beach Nuclear Plants Nuclear Management Company, LLC 6610 Nuclear Road Two Rivers, WI 54241

SUBJECT: KEWAUNEE - NRC INSPECTION REPORT 50-305/20-22(DRS)

Dear Mr. Reddemann:

On December 8, 2000, the NRC completed the baseline annual inspection of evaluations of changes, tests, or experiments (10 CFR Part 50.59) at your Kewaunee Nuclear Power Plant. The enclosed report documents the inspection results which were discussed on December 8, 2000, with Mr. Mark Reddemann and other members of your staff.

This inspection examined activities conducted under your license as they relate to changes to facility structures, systems, and components, normal and emergency procedures, and the updated final safety analysis report in accordance with the requirements of 10 CFR Part 50.59. The inspectors reviewed selected procedures and records, observed activities, and interviewed personnel.

There were no findings identified during this inspection.

In accordance with 10 CFR 2.790 of the NRC's "Rules of Practice," a copy of this letter and its enclosure will be 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 <u>http://www.nrc.gov/NRC/ADAMS/index.html</u> (the Public Electronic Reading Room).

Sincerely,

/RA John M. Jacobson Acting for/

Ronald N. Gardner, Chief Electrical Engineering Branch Division of Reactor Safety

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

Enclosure: Inspection Report 50-305/20-22(DRS) <u>See Attached Distribution</u> DOCUMENT NAME: C:\Kew00-22DRS.wpd <u>To receive a copy of this document, indicate in the box "C" = Copy without attachment/enclosure "E" = Copy with attachment/enclosure "N" = No copy</u>

| OFFICE | RIII | RIII | RIII | |
|--------|------------|------------|---------------------------|--|
| NAME | RWinter:jb | RLanksbury | JJacobson for RGardner | |
| DATE | 12/20/00 | 12/20/00 | 12/21/00 | |

OFFICIAL RECORD COPY

cc w/encl: K. Weinhauer, Assistant Site Vice President, Kewaunee Plant B. Burks, P.E., Director, Bureau of Field Operations Chairman, Wisconsin Public Service Commission State Liaison Officer

ADAMS Distribution DFT JGL1 (Project Mgr.) J. Caldwell, RIII G. Grant, RIII B. Clayton, RIII C. Ariano (hard copy) DRPIII DRSIII PLB1 JRK1 BAH3

U.S. NUCLEAR REGULATORY COMMISSION

REGION III

| Docket No: License No: | 50-305 DPR-43 |
|---------------------------|---|
| Report No: | 50-305/00-22(DRS) |
| Licensee: | Nuclear Management Company |
| Facility: | Kewaunee Nuclear Power Plant |
| Location: | N 490 Highway 42 Kewaunee, WI 54216 |
| Dates: | December 4 - 8, 2000 |
| Inspector: | Robert Winter, Reactor Engineer |
| Approved by: | Ronald N. Gardner, Chief Electrical Engineering Branch Division of Reactor Safety |

NRC's REVISED REACTOR OVERSIGHT PROCESS

The federal Nuclear Regulatory Commission (NRC) recently revamped its inspection, assessment, and enforcement programs for commercial nuclear power plants. The new process takes into account improvements in the performance of the nuclear industry over the past 25 years and improved approaches of inspecting and assessing safety performance at NRC licensed plants.

The new process monitors licensee performance in three broad areas (called strategic performance areas): reactor safety (avoiding accidents and reducing the consequences of accidents if they occur), radiation safety (protecting plant employees and the public during routine operations), and safeguards (protecting the plant against sabotage or other security threats). The process focuses on licensee performance within each of seven cornerstones of safety in the three areas:

Reactor Safety

Radiation Safety

Safeguards

- Initiating Events
- Mitigating Systems
- Barrier Integrity
- Emergency Preparedness
- Occupational
 Public
- Physical Protection
- To monitor these seven cornerstones of safety, the NRC uses two processes that generate information about the safety significance of plant operations: inspections and performance indicators. Inspection findings will be evaluated according to their potential significance for safety, using the Significance Determination Process, and assigned colors of GREEN, WHITE, YELLOW, or RED. GREEN findings are indicative of issues that, while they may not be desirable, represent very low safety significance. WHITE findings indicate issues that are of low to moderate safety significance. YELLOW findings are issues that are of substantial safety significance. RED findings represent issues that are of high safety significance with a significant reduction in safety margin.

Performance indicator data will be compared to established criteria for measuring licensee performance in terms of potential safety. Based on prescribed thresholds, the indicators will be classified by color representing varying levels of performance and incremental degradation in safety: GREEN, WHITE, YELLOW, and RED. GREEN indicators represent performance at a level requiring no additional NRC oversight beyond the baseline inspections. WHITE corresponds to performance that may result in increased NRC oversight. YELLOW represents performance that minimally reduces safety margin and requires even more NRC oversight. And RED indicates performance that represents a significant reduction in safety margin but still provides adequate protection to public health and safety.

The assessment process integrates performance indicators and inspection so the agency can reach objective conclusions regarding overall plant performance. The agency will use an Action Matrix to determine in a systematic, predictable manner which regulatory actions should be taken based on a licensee's performance. The NRC's actions in response to the significance (as represented by the color) of issues will be the same for performance indicators as for inspection findings. As a licensee's safety performance degrades, the NRC will take more and increasingly significant action, which can include shutting down a plant, as described in the Action Matrix.

More information can be found at: http://www.nrc.gov/NRR/OVERSIGHT/index.html.

SUMMARY OF FINDINGS

IR 50-305/00-22(DRS), on 12/04/2000 - 12/08/2000; Nuclear Management Company, LLC; Kewaunee Nuclear Power Plant. Evaluations of Changes, Tests, or Experiments.

This inspection was conducted by a regional reactor engineer. No findings of significance were identified during this inspection.

Report Details

1. **REACTOR SAFETY**

Cornerstones: Initiating Events, Mitigating Systems, and Barrier Integrity

- 1R02 Evaluations of Changes, Tests or Experiments (Inspection Procedure 71111.02)
- .1 <u>Review of 10 CFR Part 50.59 Evaluations and Screenings for Changes, Tests or</u> <u>Experiments</u>
- a. Inspection Scope

The inspector reviewed ten evaluations performed pursuant to 10 CFR Part 50.59. The evaluations related to permanent plant modifications, setpoint changes, procedure changes, conditions adverse to quality, and changes to the updated final safety analysis report. The inspector confirmed that the evaluations were thorough and that prior NRC approval was obtained as appropriate. The inspector also reviewed 13 screenings where the licensee had determined that a 10 CFR Part 50.59 evaluation was not necessary. In regard to the changes reviewed where no 10 CFR Part 50.59 evaluation was performed, the inspector verified that the changes did not meet the threshold to require a 10 CFR Part 50.59 evaluation. These evaluations and screenings were chosen based on risk significance of samples from the different cornerstones.

b. Findings

No findings of significance were identified.

4. OTHER ACTIVITIES

4OA2 Identification and Resolution of Problems

a. Inspection Scope

The inspector reviewed Kewaunee Assessment Process reports concerning 10 CFR Part 50.59 evaluations and screenings to verify that the licensee had an appropriate threshold for identifying issues. The inspector evaluated the effectiveness of the corrective actions for the identified issues.

b. Findings

No findings of significance were identified.

4OA6 Management Meetings

Exit Meeting Summary

The inspector presented the inspection results to Mr. Mark Reddemann, Site Vice President, and other members of licensee management at the exit meeting held on December 8, 2000. The licensee acknowledged the results of the inspection. No proprietary information was identified.

LIST OF PERSONS CONTACTED

Licensee

- M. Reddemann, Site Vice President
- K. Weinhauer, Assistant Site Vice President, Kewaunee Plant
- M. Aulik, Process Leader, Physical Change
- J. Schweitzer, Manager, Engineering and Technical Support
- S. Putman, Leader, Mechanical Engineering
- P. Rescheske, Licensing Engineer
- K. Hoops, Plant Manager, Kewaunee Plant
- T. Schneider, Manager, Quality Programs
- T. Webb, Nuclear Licensing Director
- G. Harrington, Plant Licensing Supervisor
- J. Riste, Licensing Leader
- J. Stoeger, Operations Superintenent
- R. Repshas, Site Services Manager

<u>NRC</u>

- J. Lara, Senior Resident Inspector
- Z. Dunham, Resident Inspector

LIST OF ITEMS OPENED, CLOSED AND DISCUSSED

<u>Opened</u>

None

<u>Closed</u>

None

Discussed

None

LIST OF DOCUMENTS REVIEWED

The following is a list of licensee documents reviewed during the inspection, including documents prepared by others for the licensee. Inclusion on this list does not imply that NRC inspectors reviewed the documents in their entirety, but rather that selected sections or portions of the documents were evaluated as part of the overall inspection effort.

Procedures

GNP 4.3.1, "Guide to Safety Review, Safety Evaluations, and Second Level Reviews," Revision A, April 30, 1996

 GNP 11.08.01, "Kewaunee Assessment Process (KAP), Revision C, October 27, 2000
 NEP 5.2, "Revision & Control of the Updated Safety Analysis Report," Revision A, November 21, 1996

N-FH-53AB, "Spent Fuel Pool Canel Drain Down," Revision original, October 4, 2000 SP-36-014B, "Reactor Coolant Flow Instrument Calibration," Revision C, March 20,2000 SOP-CC-31-12, "SW-1300A/MV-32009 MOV Dynamic Test," Revision B, June 5, 2000 N-SW-02-CL, "Service Water System Prestartup Checklist," Revision AN, May 4, 1999 N-CVC-35B, "Charging & Volume Control," Revision AA, July 7, 1999

10 CFR Part 50.59 Evaluations

- SE 00-05, "USAR Change Request on the basis of NPSH available for RHR pumps in Recirc Mode," February 24, 1999
- SE 00-11, "New Procedures GNP 1.1.1 and GNP 1.1.2 replace QAD 4.3 for Determination of QA and EQ typing," Revision 1, February 28, 2000
- SE 00-12, "Reload Safety Evaluation for Kewaunee Cycle 24," March 15, 2000
- SE 00-40, "Usar Stated That Ultrasonic Flow Meters Are Installed on the Feedwater Lines, but Actually They Are Not Being Used," September 8, 2000
- SE 00-42, "Ucr 16-041 Identified a Usar Paragraph That Stated Si-302a and B Can Be Reclosed However under Certain Conditions this May Not Be True," September 3, 2000
- DCR 2552, "Install SI Pump Suction Relief Valves," March 13, 2000
- DCR 3159, "Replace Protective Relays for Pt Beach 345 KV Line Q-303," May 5, 2000
- DCR 3163, "Modify Control for Valves SW1300A(B) and SW 1306A(B) on an SI Signal," June 3, 2000
- Temporary Change 00-19, "Remove AFWP Suction Strainers," August 21, 2000
- Temporary Change 00-12, "Install Jumper to defeat RHR Pump Discharge Pressure Interlock with RHR-299A and 299B," May 26, 2000

10 CFR 50.59 Screenings

DC 2930, "Rewire Appendix R Motor Operated Valves," October 6, 1998

- DC 3002, "Provisions for Degraded Grid Undervoltage Logic Relays 27cax/b5 and 27cax/b6 and Other Related Contacts and Relays," May 29, 1998
- DC 3026, "Spurious DC Ground Alarm Coincident with Pressurizer Heaters De-Energizing," October 7, 1998

DC 3037, "Change Limitorque Actuator Gearset in Valves AFW10A & B," November 30, 1999 DC 3040, "Raise Reactor Coolant Low Flow Trip Setpoints to 93%," November 16, 1999

DC 3139, Revision 1, "Diesel Generator Jacket Water Heat Exchanger Replacement," February 8, 2000

Temporary Change 00-05, "Temporary Air Signal Jumper to SW-1601/CV-31086," March 13, 2000

Temporary Change 00-15, "Increase R-15 Alert Setpoint from 5000 cpm to 25000 cpm," June 13, 2000

N-CVC-35B, "Charging & Volume Control," Revision AA, July 7, 1999

N-FH-53AB, "Spent Fuel Pool Canel Drain Down," Revision original, October 4, 2000 N-SW-02-CL, "Service Water System Prestartup Checklist," Revision AN, May 4, 1999 SOP-CC-31-12, "SW-1300A/MV-32009 MOV Dynamic Test," Revision B, June 5, 2000 SP-36-014B, "Reactor Coolant Flow Instrument Calibration," Revision C, March 20,2000

Kewaunee Assessment Process reports (KAPs)

KAP 98-2486, "Usar Two Power Relief Valves Limit System Pressure During Large Load Reduction Transients and Must Be Fully Open in Two Seconds or Less. Differs from 1st Test Results," December 16, 1998

KAP 99-2109, "Nad 3.8, " Overtime Policy" Deviates from Nrc GI 82-12 the Procedure Change Did Not Have a 10 CFR Part 50.59 Evaluation for the Change from the Commitment," October 1, 1998

KAP 99-3425, "Screening Adequacy for Backwash Flow to Sw Pump Rotating Strainers," September 7, 1999

KAP 99-3647, "Josrc Review of 10 CFR Part 50.59s Identified a Concern with Safety Evaluation 99-1," June 27, 1999

KAP 99-3648, "Josrc Questioned the 10 CFR Part 50.59 for Safety Evaluation 99-12 Concerning the Change in Opening Time for Rcs Porv," June 27, 1999

KAP 00-003823, "Correct Screening/evaluation for Se #00-25 Performed for Sop-ms-06-7a & -7b to to Meet Procedure and Expectations," November 2, 2000

KAP 00-002612, "Nad 4.3 & Gnp 4.3.1 Do Not Address How Knpp Includes or Uses Vendor/Contractor 10 CFR Part 50.59 Evaluations," July 27, 2000

KAP 00-002288, "Josrc Subcommittee Identified Several Areas for Improvement. Examples Without Safety Reviews or the Basis for the Answer. Examples Without the Answer to Question 7 Identifying Applicability or Non-applicability of Technical Specifications Bases Section," June 28, 2000

KAP 00-300056, "Screening Adequacy for Backwash Flow to Sw Pump Rotating Strainers," October 18, 2000

Miscellaneous Documents

Kewaunee Nuclear Power Plant Updated Safety Analysis Report (USAR), Revision 16, "Description of Changes and Summary of Safety Evaluations," December 1, 2000