

U. S. NUCLEAR REGULATORY COMMISSION

REGION III

Report No: 50-266/84-06; 50-301/84-04

Docket No: 50-266; 50-301

License No: DPR-24; DPR-27

Licensee: Wisconsin Electric Power Company  
231 West Michigan  
Milwaukee, WI 53203

Facility Name: Point Beach Nuclear Power Plant, Units 1 and 2

Inspection At: Point Beach Site

Inspection Conducted: April 1 through March 31, 1984

Inspectors: R. L. Hague

B. E. Fitzpatrick

Approved by: *I. N. Jackiw*  
I. N. Jackiw, Chief  
Projects Section No. 2B

6-15-84  
Date

Inspection Summary

Inspection on April 1 - <sup>may</sup> ~~March~~ 31, 1984 (Report No. 50-266/84-06;  
50-301/84-04 (DPRP))

Areas Inspected: Routine, unannounced inspection by resident inspectors of licensee action on previous inspection findings; operational safety; maintenance; surveillance; Licensee Event Reports; independent inspection; regional requests; startup testing - refueling. The inspection involved a total of 402 inspector hours onsite by two inspectors including 46 inspector hours on offshifts.

Results: Of the eight areas inspected, no items of noncompliance were identified in six areas. One item of noncompliance was identified in each of the remaining two areas (failure to follow procedures, paragraph 4 and failure to meet commitment to ANSI N45.2.1-1973, paragraph 7).

## DETAILS

### 1. Persons Contacted

\*J.J. Zach, Manager, PBNP  
T.J. Koehler, General Superintendent  
G.J. Maxfield, Superintendent - Operations  
J.C. Reisenbuechler, Superintendent - Technical Services  
W.J. Herrman, Superintendent - Maintenance & Construction  
\*R.E. Link, Superintendent - EQR  
R.S. Bredvad, Health Physicist  
R. Krukowski, Security Supervisor  
\*F.A. Flentje, Staff Services Supervisor

The inspectors also talked with and interviewed members of the Operations, Maintenance, Health and Physics, and Instrument and Control Sections.

\*Denotes personnel attending exit interviews.

### 2. Action on Previous Inspection Findings

#### a. Common to Both Units

(Closed) Noncompliance (266/83-15-01(DPRP) and 301/83-15-01(DPRP)): Improper log keeping. The licensee has counseled the operations staff.

(Closed) Unresolved item (266/83-26-03 and 301/83-24-01): NUREG 0737 required shielding not installed. Upgraded to a severity IV noncompliance (266/84-02-03(FRPS) and 301/84-12-03(FRPS))

#### B. Unit 1

(Closed) Open item (266/84-01-03): U.T. inspection of RCC guide tube split pins. SER written by NRR.

#### C. Unit 2

(Closed) Open item (301/82-01-05[DFRP]): Revise log and procedures to check diesel and AFW turbine governor oil levels. Logs and procedures revised.

(Closed) Noncompliance (301/83-13-01(DPRP)): Failure to follow fuel handling procedures. Operations personnel received training

(Closed) Noncompliance (301/83-13-01(DPRP)): Failure to maintain document control. Upgraded to a severity IV (301/83-20-01(DE))

(Closed) Open item (301/83-13-03(DPRP)): Loss of 2RE211 and 2RE212 during fuel movement. A control board alarm has been added.

(Closed) Open item (301/83-15-03(DPRP)): RTD bypass manifold valve failure. The licensee intends to replace the one remaining valve of this type during the next Unit 2 refueling outage.

(Open) Noncompliance (301/84-03-01(DPRP)): Failure to perform adequate 50.59 evaluation for snubber modification. On April 24, 1984 the resident inspectors pointed out that the licensee was operating in violation of Technical Specification 15.3.10.A.2 with control banks B and C rods at 225 steps instead of the required 228 steps. This is another example of the licensee's inadequate 50.59 review program. The licensee has committed to review and update their 50.59 program and modifications they have made since January 1982.

### 3. Operational Safety Verification

The inspector observed control room operations, reviewed applicable logs and conducted discussions with control room operators during the months of April and May. The inspector verified the operability of selected emergency systems, reviewed tagout records and verified proper return to service of affected components. Tours of the auxiliary building and both turbine buildings were conducted to observe plant equipment conditions, including potential fire hazards, fluid leaks, and excessive vibrations and to verify that maintenance requests had been initiated for equipment in need of maintenance. The inspector by observation and direct interview verified that the physical security plan was being implemented in accordance with the station security plan.

The inspector observed plant housekeeping/cleanliness conditions and verified implementation of radiation protection controls. During the month of April and May, the inspector walked down the accessible portions of the diesel generating, containment spray, and safety injection systems to verify operability. The inspector also witnessed portions of the radioactive waste system controls associated with radwaste shipments and barreling.

These reviews and observations were conducted to verify that facility operations were in conformance with the requirements established under technical specifications, 10 CFR, and administrative procedures.

At 9:20 a.m.(CDT) on May 7, 1984, Unit 1 experienced a rod drop runback from 100% power to 80% power. The runback was caused by a bistable failure in power range channel 43 which gave a momentary down spike in power which in turn initiated the runback. All systems functioned as expected. The exact cause of the runback was determined and corrected prior to returning to 100% power.

At 3:41 a.m. on May 19, 1984, while shutting down Unit 2 for a weekend maintenance outage, a low pressure safety injection was initiated. The cause was failure to block the low pressure safety injection while depressurizing the primary system using the spray valve. The block permissive setpoint is 1765 psig and the safety injection setpoint is 1735 psig. The licensee is investigating possible procedural, training, or instrumentation changes to prevent recurrence. All systems performed as expected, no water was injected into the primary system.

No items of noncompliance or deviations were identified.

#### 4. Monthly Maintenance Observation

Station maintenance activities of safety related systems and components listed below were observed/reviewed to ascertain that they were conducted in accordance with approved procedures, regulatory guides and industry codes or standards and in conformance with technical specifications.

The following items were considered during this review: the limiting conditions for operation were met while components or systems were removed from service; approvals were obtained prior to initiating the work; activities were accomplished using approved procedures and were inspected as applicable; functional testing and/or calibrations were performed prior to returning components or systems to service; quality control records were maintained; activities were accomplished by qualified personnel; parts and materials used were properly certified; radiological controls were implemented; and, fire prevention controls were implemented.

Work requests were reviewed to determine status of outstanding jobs and to assure that priority is assigned to safety related equipment maintenance which may affect system performance.

The following maintenance activities were observed/reviewed:

- 3D diesel generator annual maintenance
- Repairs to 2P2A charging relief valve
- Repairs to 2G07 motor generator
- Auxiliary feed discharge check valve
- Moisture separator reheater repair work

Following completion of maintenance on the 3D diesel generator and the 2P2A charging relief valve, the inspector verified that these systems had been returned to service properly.

During the annual maintenance of the 3D diesel generator, the inspectors noted several barrels of oil, solvents, and oily rags left unattended in the diesel generator room. Further inspection of the work packages being used disclosed two maintenance request forms which were checked "no" as to whether or not the work was being performed in a safe shutdown area. Follow-up on these apparent discrepancies disclosed that the individual who checked "no" for the safe shutdown area was not aware of the full scope of the work to be accomplished and discussions with the fire protection supervisor disclosed that he had been told by maintenance personnel that work on the diesel was to continue around the clock, therefore the room would be occupied at all times and transient combustible control procedures would not be required. Discussions with maintenance personnel disclosed that they believed that in as much as the diesel generator was out of service the diesel generator room was no longer considered a safe shutdown area. The inspectors also found that the decision was made to work on the diesel generator on only two shifts rather than around the clock after the fire protection supervisor had talked with maintenance personnel.

The above events indicate a lack of communications between maintenance and operators personnel and a misunderstanding of the proper use of procedure PBNP 3.4.8, Transient Combustible Control. The procedure requires that transient combustibles which remain in a safe shutdown area for more than a single workshift should be monitored through the transient combustibles control system and there are no criteria for redesignating safe shutdown areas.

This is a Severity Level V violation (Supplement 1) (266/84-06-02, 301/84-04-01(DPRP))

When the inspectors made their findings known to the licensee, immediate corrective action was taken to remove all transient combustibles from the diesel generator room. A nonconformance report, 84-004, has been written which delineates steps to be taken to prevent recurrence.

5. Monthly Surveillance Observation

The inspector observed technical specifications required surveillance testing on the IT-01, inservice testing of high head safety injection pumps, IT-1050, 40 month inservice pressure test of safety injection system and verified that testing was performed in accordance with adequate procedures, that test instrumentation was calibrated, that limiting conditions for operation were met, that removal and restoration of the affected components were accomplished, that test results conformed with technical specifications and procedure requirements and were reviewed by personnel other than the individual directing the test, and that any deficiencies identified during the testing were properly reviewed and resolved by appropriate management personnel.

The inspector also witnessed portions of the following test activities:

- Safety valve acoustic monitoring
- Subcooling margin computing system
- Containment purge valve position
- Unit 1 flux mapping
- Unit 2 protection system logic testing

No items of noncompliance or deviations were identified.

6. Licensee Event Reports Followup

Through direct observations, discussions with licensee personnel, and review of records, the following event reports were reviewed to determine that reportability requirements were fulfilled, immediate corrective action was accomplished, and corrective action to prevent recurrence had been accomplished in accordance with technical specifications.

a. Unit 1

(Closed) 266/84-01: Cracked and missing control rod guide tube split pins. NRR has performed a safety evaluation and found no significant safety considerations.

(Closed) 266/84-02: Reactor vessel outlet nozzle-to-shell weld indications. NRR approved the analysis methodology that showed no significant safety hazard.

b. Unit 2

(Closed) 301/84-002/03L-0: Control rods at 225 steps instead of the technical specification required 228 steps. The licensee promptly moved the control rods to 228 steps and is submitting a technical specification change.

No items of noncompliance or deviations were identified.

7. Independent Inspection

Due to the debris problem in Unit 1 (see inspection report 266/84-04), NRR required the licensee to perform check valve leak checks and isolation valve operability checks prior to start-up. These checks were completed satisfactorily. The licensee has committed verbally to the resident inspectors to duplicate these checks if the plant goes off line and the affected systems are put into operation. The licensee also committed to performing weekly vice biweekly rod exercises on Unit 1 for the first month of operation to verify rod operability. These exercises were completed satisfactorily.

Although the origin of the debris continues to be an unresolved item pending the results of Westinghouse's analysis, the presence of the debris in the reactor coolant system is in itself a violation of the licensee's cleanliness requirements contained in ANSI N45.2.1 - 1973.

This is a Severity Level IV violation (Supplement 1) (266/84-06-01(DPRP))

After identifying the debris problem the licensee took extensive measures to identify and remove as much of the debris as possible. The licensee has become acutely aware and sensitive to any maintenance or inspection procedures which could introduce foreign material into the reactor coolant system as well as the necessity of thorough close out inspections.

8. Regional Request

The inspectors were requested to verify the documentation of the close out of IE Bulletin 80-05, vacuum condition resulting in damage to chemical volume control system hold up tanks. The inspectors verified the installation of three pressure switches, one on each CVCS-HUT and that the pressure switches were installed in November 1980, operationally tested on July 11, 1981, and tested every 18 months since then.

9. Startup Testing - Refueling

The inspector observed the tests listed below and verified that the Unit 1 refueling outage startup testing was conducted in accordance with technically adequate procedures and that the facility was being operated within license limits.

1. WMTP 4.1; Initial criticality, all rods out flux map, endpoint and temperature coefficient measurements
2. WMTP 4.4; Physics testing during boration to all rods out
3. WMTP 9.1; Rod control mechanism timing, rod drop testing and rod position calibration
4. WMTP 9.2; Nuclear power range detector calibration quarterly axial offset test
5. WMTP 9.4; Initial criticality for a cycle

On April 7, 1984, during performance of WMTP 9.1, rod H-6 failed to drop with no flow conditions. The rod had previously been dropped successfully during full reactor coolant flow conditions. At the time that the rod failed to drop, coolant temperature had drifted down to 520°F. One pump was started to heat back up and the rod was successfully dropped at 527°F. After the heatup the rod was successfully dropped three more times under no flow conditions. The problem is believed to be a hang up of the rod stepping mechanism. No debris remained in the guide tube of this rod position after cleaning.

10. Exit Interview

The inspector met with licensee representatives (denoted in Paragraph 1) throughout the month and at the conclusion of the inspection period and summarized the scope and findings of the inspection activities. The licensee acknowledged these findings.