



JUL 16 2007

SERIAL BSEP 07-0063

U. S. Nuclear Regulatory Commission
ATTN: Document Control Desk
Washington, DC 20555-0001

Subject: Brunswick Steam Electric Plant, Unit No. 2
Docket No. 50-324/License No. DPR-62
Inservice Inspection Program for the Third 10-Year Interval - Refueling
Outage 17 Owner's Activity Report

Ladies and Gentlemen:

Carolina Power & Light Company, now doing business as Progress Energy Carolinas, Inc., submits the enclosed American Society of Mechanical Engineers (ASME) Boiler and Pressure Vessel Code, Section XI, Form OAR-1 Owner's Activity Report for the Brunswick Steam Electric Plant (BSEP), Unit No. 2. The enclosed Form OAR-1 Owner's Activity Report covers inspection activities being credited for the third inspection period of the third 10-year inservice inspection interval. The third period began May 11, 2005, and ends May 10, 2008.

On October 31, 2005, a revision to 10 CFR 50.55a went into effect which incorporates, by reference, NRC Regulatory Guide 1.147, Revision 14, "Inservice Inspection Code Case Acceptability, ASME Section XI, Division 1." This revision of Regulatory Guide 1.147 indicates that ASME Code Case N-532-1, "Alternative Requirements to Repair and Replacement Documentation Requirements and Inservice Summary Report Preparation and Submission as Required by IWA-4000 and IWA-6000, Section XI, Division 1," can be used provided the OAR-1 forms are prepared and certified following completion of each refueling outage and submitted to the NRC within 90 days of the completion of the refueling outage.

As specified by the ASME Code Case and Regulatory Guide 1.147, the Form OAR-1 Owner's Activity Report for BSEP, Unit 2 Refueling Outage 17 (i.e., B218R1) is enclosed. Refueling Outage 17 for Unit 2 ended on April 18, 2007.

Progress Energy Carolinas, Inc.
Brunswick Nuclear Plant
PO Box 10429
Southport, NC 28461

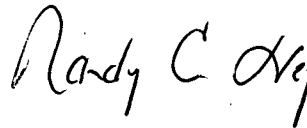
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No regulatory commitments are contained in this letter. Please refer any questions regarding this submittal to Ms. Annette H. Pope, Supervisor - Licensing/Regulatory Programs, at (910) 457-2184.

Sincerely,

A handwritten signature in black ink, appearing to read "Randy C. Ivey". The signature is fluid and cursive, with the first name "Randy" being the most prominent part.

Randy C. Ivey
Manager - Support Services
Brunswick Steam Electric Plant

WRM/wrm

Enclosure: Owner's Activity Report OAR-1 Report for B218R1 Refueling Outage,
Revision 0

cc (with enclosure):

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U. S. Nuclear Regulatory Commission
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Mr. Jack Given, Bureau Chief
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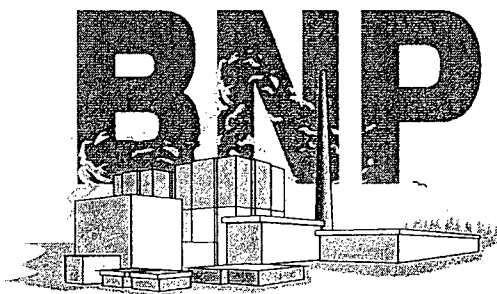
BSEP 07-0063
Enclosure

Owner's Activity Report OAR-1 Report
for B218R1 Refueling Outage, Revision 0



BRUNSWICK STEAM ELECTRIC PLANT

UNIT 2



OWNER'S ACTIVITY REPORT

OAR-1 REPORT FOR B218R1 REFUELING OUTAGE

REVISION 0

Prepared By: L D Dheal Date 6/21/07
NDE / Snubber & Support Program Manager

Reviewed By: James W. Ciel Date 6/26/07
Repair/Replacement Program Manager

Reviewed By: Scott Larson Date 6-21-07
Independent Review

Reviewed By: Raymond N. Atomb Date 6/27/07
Authorized Nuclear Inservice Inspector

Revision Summary

- Initial issue

INTRODUCTION

This report represents a summary of the Inservice Inspection (ISI) activities performed at the Carolina Power and Light Company's Brunswick Steam Electric Plant (BSEP) Unit 2 during the Spring 2007 refueling outage.

The examinations and testing performed during this timeframe were for credit during the third inspection period of the Third Inspection Interval.

Examinations and testing were performed to satisfy the requirements of the American Society of Mechanical Engineers (ASME) Boiler and Pressure Vessel Code, Section XI, Inspection Program B, 1989 Edition with no addenda.

In accordance with requirements of Code Case N-532-1, which has been approved for use at the Brunswick Station, enclosed is the Owners Activity Report (OAR-1 Report).

TABLE 1**ABSTRACT OF EXAMINATIONS AND TESTS**

Examination Category (see note 1)	Total Examinations Required for the Interval	Total Examinations Credited for This Period	Total Examinations Credited (%) for the Period	Total Examinations Credited (%) to Date for the Interval	Remarks
B-A	28	19	68	100	See note 2
B-D	70	25	36	91	See note 2
B-E	46	46	100	100	See note 2
B-G-1	336	336	100	100	See note 2
B-G-2	NA	1	NA	NA	See note 4, 5
B-K	14	4	29	86	See note 7
B-L-2	NA	NA	NA	NA	See note 4
B-M-2	NA	1	NA	NA	See note 4
B-N-1	3	0	0	66	
B-N-2	32	0	0	0	See note 2
B-O	8	8	100	100	See note 2
C-A	3	1	34	100	
C-B	2	0	0	100	See note 6
C-C	11	2	18	100	See note 7
C-F-2	31	8	29	94	
D-A	6	0	0	67	See note 7
F-A	74	5	7	68	
R-A	56	21	38	91	See note 3

TABLE 1 NOTES

The following notes correspond to the numbers referenced in Table 1 of the OAR-1 Report:

1. Examination categories B-B, B-H, B-K-1, B-N-3, B-L-1, B-M-1, C-F-1, C-G, D-B, D-C do not apply to the Brunswick Station. Examination categories B-K, C-C and D-A reflect Code Case N-409.
2. Some or all examinations in this category may be deferred until the end of the inspection interval.
3. Examination category B-F and B-J have been subsumed by Category R-A to reflect approval of a Class 1 Risk Informed ISI Program. This was implemented with the commencement of the Second Inspection Period and the total number of examinations for the remaining periods and interval reflect Relief Request RR-27 and NRC Safety Evaluation dated 2/17/2000.
4. The examinations under this examination category are event related. They are only required if a subject pump or valve is disassembled during a maintenance activity.
5. Item number B7.80 of this category includes a requirement to examine CRD bolting if a CRD is disassembled. In accordance with Relief Request RR-04 which implemented Code Case N-547, there is no longer a requirement to examine this bolting.
6. This category has only 2 items and is covered by Relief Request RR-21.
7. This category reflects adoption of Code Case N-409 during Second Inspection Period.

TABLE 2

ITEMS WITH FLAWS OR RELEVANT CONDITIONS THAT

REQUIRED EVALUATION FOR CONTINUED SERVICE

Examination Category	Item Number	Item Description	Flaw Characterization (IWA-3300)	Flaw or Relevant Condition Found During Scheduled Section XI Examination or Test (Yes or No)
D-A	D1.10	Pressure retaining component (Piping)	See note below	No

During a sample expansion for a throughwall leak in Unit 1, an area of wall thinning was identified in Unit 2. This area was evaluated under Engineering Change (EC) 62469 and corrected under item 3 of Table 3 of this report.

TABLE 3**ABSTRACT OF REPAIRS, REPLACEMENTS, OR CORRECTIVE
MEASURES REQUIRED FOR CONTINUED SERVICE**

Code Class	Repair, Replacement, or Corrective Measure	Item Description	Description of Work	Flaw or Relevant Condition Found During Scheduled Section XI Examination or Test (Yes or No)	Date Completed	Repair/Replacement Plan Number
3	Replacement	Pipe Flange	Replaced flange due to wall thinning	No	3/23/2007	1027770-01
3	Repair	Piping	Repaired piping because of a thru-wall defect	No	4/13/2007	1029972-01
3	Replacement (AR 233917)	Piping	Replaced piping due to wall thinning	No	3/27/2006	748708-01
MC	Repair (AR 235133)	Penetration Sleeve	Repaired sleeve due to localized corrosion pitting	Yes	4/18/2007	1033376-01

IWE-3122.1 Discussion for Code Class MC item listed above:

During the B218R1 refueling outage, the technique for performing ultrasonic thickness readings was changed from taking static readings to dynamic readings within a defined grid area. Because of this technique change, localized pitting was identified in areas that were previously examined during the B217R1. The localized areas containing the pitting were evaluated, and the remaining wall thickness met the required design specification's thickness. An adverse condition report was initiated to document that the examinations performed during the B217R1 outage did not detect the full extent of the pitting corrosion. Although required design thickness was met, several areas were repaired by welding as a good engineering practice.