### VIRGINIA ELECTRIC AND POWER COMPANY RICHMOND, VIRGINIA 23261

January 25, 2011

U.S. Nuclear Regulatory Commission Attention: Document Control Desk

Washington, D.C. 20555

Serial No.:

11-026

NAPS/JHL:

R0

Docket No.:

50-338

License No.:

NPF-4

# VIRGINIA ELECTRIC AND POWER COMPANY (DOMINION) NORTH ANNA POWER STATION UNIT 1 OWNER'S ACTIVITY REPORT

In accordance with the requirements of American Society of Mechanical Engineers (ASME) Code Case N-532-4, enclosed is the Owner's Activity Report (Form OAR-1), for refueling outage N1R21. This report is for the first refueling outage of the first period of the fourth inspection interval.

Should you have any questions regarding this submittal, please contact Mr. Donald R. Taylor at (540) 894-2616.

Very truly yours,

F. Mladen

Director - Nuclear Station Safety and Licensing

Commitments made in this letter: None

Attachment

A047 NRC cc: U.S. Nuclear Regulatory Commission
Region II
Marquis One Tower
245 Peachtree Center Avenue, NE, Suite 1200
Atlanta, Georgia 30303-1257

NRC Senior Resident Inspector North Anna Power Station

Mr. J. E. Reasor, Jr.
Old Dominion Electric Cooperative
Innsbrook Corporate Center
4201 Dominion Blvd.
Suite 300
Glen Allen, Virginia 23060

Dr. V. Sreenivas NRC Project Manager U. S. Nuclear Regulatory Commission One White Flint North 11555 Rockville Pike Mail Stop O-8 G9A Rockville, MD 20852-2738

Ms. K. R. Cotton NRC Project Manager U. S. Nuclear Regulatory Commission One White Flint North 11555 Rockville Pike Mail Stop O-8 G9A Rockville, MD 20852-2738

Mr. M. M. Grace Authorized Nuclear Inspector North Anna Power Station

#### **Attachment**

Owner's Activity Reports for North Anna Unit 1
Refueling Outage N1R21 - First Period of the Fourth ISI Interval

North Anna Power Station
Virginia Electric and Power Company

# Dominion

#### Form OAR-1, Owner's Activity Report

ER-AA-ISI-100

ATTACHMENT 1

Page 1 of 3

Report Number: N1R21 (Unit 1, 4 <sup>th</sup> Interval, 1 <sup>st</sup> Period)
Plant: North Anna Power Station
Unit No. 1 Commercial service date: 6/6/1978 Refueling outage no. N1R21 (if applicable)
Current inspection interval: 4 <sup>th</sup> (May 1, 2009 – April 30, 2019)  (1 <sup>st</sup> , 2 <sup>nd</sup> , 3 <sup>rd</sup> , 4 <sup>th</sup> , other)
Current inspection period: 1 <sup>st</sup> (May 1, 2009 – April 30, 2012)  (1 <sup>st</sup> , 2 <sup>nd</sup> , 3 <sup>rd</sup> , 4 <sup>th</sup> )
Edition and Addenda of Section XI applicable to the inspection plans: 2004 Edition
Date and revision of inspection plans: February 2010, Revision 1
Edition and Addenda of Section XI applicable to repair/replacement activities, if different than the inspection Plans N/A
Code Cases used: N-432-1, N-460, N-504-3, N-526, N-532-4, N-552, N-566-2, N-586-1, N-597-2, N-613-1, N-624, N-638-1, N-641, N-651, N-658, N-661, N-663, N-683, N-696, N-706-1, N-722, and N-729-1. (if applicable)
CERTIFICATE OF CONFORMANCE
I certify that (a) the statements made in this report are correct; (b) the examinations and tests meet the Inspection Plan as required by the ASME Code, Section XI; and (c) the repair/replacement activities and evaluations supporting the completion of N1R21 conform to the requirements of Section XI.  (refueling outage number)  Signed Date 1/13/2011
I, the undersigned, holding a valid commission issued by the National Board of Boiler and Pressure Vessel Inspectors and the State or Province of Virginia and employed by HSB CT of Hartford, CT have inspected the items described in this Owner's Activity Report, and state that, to the best of my knowledge and belief, the Owner has performed all activities represented by this report in accordance with the requirements of Section XI.  By signing this certificate neither the Inspector nor his employer makes any warranty, expressed or implied, concerning the repair/replacement activities and evaluation described in this report. Furthermore, neither the Inspector nor his employer shall be liable in any manner for any personal injury or property damage or a loss of any kind arising from or connected with this inspection.  Commissions NB 9531-A-N-I-C / VA 424-R
Inspector's Signature National Board, State, Province and Endorsements  Date 740 13. 2011

#### Form OAR-1, Owner's Activity Report



ER-AA-ISI-100

**ATTACHMENT 1** 

Page 2 of 3

Table 1
Items with Flaws or Relevant Conditions That Required Evaluation for Continued Service

Examination Category and Item Number	Item Description	Evaluation Description
F-A / F1.10C	Spring Hanger 1 ½-RC- 105/SH-3 Summary # N1.F1.10.476	Spring hanger's cold load setting was beyond readable range. Engineering eval, CR396534, found pipe hung up until jarred loose after work on valve 1-RC-105. Support found acceptable.
F-A / F1.20C	Spring Hanger 6-CH-19/SH-29 Summary # N1.F1.20.211	Spring can rod found bowed. Eval per CR396117 identified SAT spring can loading and minimal misalignment. Support found acceptable.
F-A / F1.20A	Support 14-RH-2/R-16  Summary # N1.F1.20.359	2 anchor bolts appeared not seated tightly to base plate. Eng. Eval per CR395483 found support meeting design basis and bolting fully engaged.
B-P / B15.10	1-RH-MOV-1720A 1-PT-48	CR395392 Code case N-522- 2 evaluation on MOV bolting, acceptable for next operating cycle.
B-P / B15.10	1-RH-MOV-1701 1-PT-304RH	CR395326 Code case N-522- 2 evaluation on MOV bolting, acceptable for next operating cycle.
F-A / F1.30C	Spring Hanger 10-CC-B51 / SH-380 Summary # N1.F1.30.601	Found outside 10% cold load setting. CR395146 eval. Found within working range for all load cases. Support found acceptable
F-A / F1.30B	Pipe restraint 6-CC-397 / R-376  Summary # N1.F1.30.597	Clearances found out of tolerance. CR394552 evaluated support, found acceptable.
D-B / D2.10	1-CH-P-2B 1-PT-302CH	Excessive inactive boric acid at bolting, evaluated per CR392333, no degradation. Acceptable for continued service.



### Form OAR-1, Owner's Activity Report

ER-AA-ISI-100

**ATTACHMENT 1** 

Page 3 of 3

## Table 2 Abstract of Repair/Replacement Activities Required for Continued Service

Code Class	Item Description	Description of Work	Date Completed	Repair/Replacement Plan Number
1	1-RC-HSS-115B	Repair weld/base metal by metal removal	12/18/09	2009-137
2	1-BD-119	Clamp Valve and Piping Appendix IX	1/26/10	2009-141
1	1-RC-HSS-818	Replace Snubber	10/1/10	2010-210
2	1-QS-37	Valve Bonnet Weld Repair	10/20/10	2010-215
3	1-CC-PH-R- 329.76A	Replace nut and realign support clamp	9/30/10	2010-222
2	1-RS-HSS-208A	Replace Snubber	1/1/10	2010-225
3	1-SW-PP-20.00- WS-PIPE-E23- 151-Q3	Window joint repair on pipe	10/20/10	2010-130
3	1-QS-38	Replace Bonnet Bolting	10/2/10	2010-197
3	1-SW-PPA-1A1- ARRAY	Install new SW Spray Array and modify supports	5/6/10	2008-137
3	1-SW-PPA-1B2- ARRAY	Install new SW Spray Array and modify supports	6/1/10	2008-130