

**Virginia Electric and Power Company
North Anna Power Station
P. O. Box 402
Mineral, Virginia 23117**

August 6, 2002

U. S. Nuclear Regulatory Commission
Attention: Document Control Desk
Washington, D. C. 20555-0001

Serial No.: 02-456
NAPS: JHL
Docket No.: 50-338, 339
License No.: NPF-4, 7

Dear Sirs:

Pursuant to 10CFR50.73, Virginia Electric and Power Company hereby submits the following Licensee Event Report applicable to North Anna Power Station Units 1 and 2.

Report No. 50-338, 339/2002-001-00

This report has been reviewed by the Station Nuclear Safety and Operating Committee and will be forwarded to the Management Safety Review Committee for its review.

Very truly yours,



D. A. Heacock, Site Vice President
North Anna Power Station

Enclosure

Commitments contained in this letter: None

cc: United States Nuclear Regulatory Commission
Region II
Sam Nunn Atlanta Federal Center
61 Forsyth Street, SW, Suite 23 T85
Atlanta, Georgia 30303-8931

Mr. M. J. Morgan
NRC Senior Resident Inspector
North Anna Power Station

IED2

LICENSEE EVENT REPORT (LER)

(See reverse for required number of digits/characters for each block)

Estimated burden per response to comply with this mandatory information collection request, 50 hours. Reported lessons learned are incorporated into the licensing process and fed back to industry. Send comments regarding burden estimate to the Records Management Branch (T-6 E6), U.S. Nuclear Regulatory Commission, Washington, DC 20555-0001, or by internet e-mail to bjs1@nrc.gov, and to the Desk Officer, Office of Information and Regulatory Affairs, NEOB-10202 (3150-0104), Office of Management and Budget, Washington, DC 20503. If a means used to impose information collection does not display a currently valid OMB control number, the NRC may not conduct or sponsor, and a person is not required to respond to, the information collection.

FACILITY NAME (1) NORTH ANNA POWER STATION , UNIT 1	DOCKET NUMBER (2) 05000 - 338	PAGE (3) 1 OF 4
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TITLE (4)
Incorrect Waste Gas Decay Tank Oxygen Analyzer Setpoint Due To Inadequate Procedure

EVENT DATE (5)			LER NUMBER (6)			REPORT DATE (7)			OTHER FACILITIES INVOLVED (8)	
MONTH	DAY	YEAR	YEAR	SEQUENTIAL NUMBER	REVISION NUMBER	MONTH	DAY	YEAR	FACILITY NAME	DOCUMENT NUMBER
06	25	2002	2002	-- 001 --	00	08	06	2002	North Anna Power Station, Unit 2	05000-339
									FACILITY NAME	DOCUMENT NUMBER
										05000-

OPERATING MODE (9) 1	POWER LEVEL (10) 100 %	THIS REPORT IS SUBMITTED PURSUANT TO THE REQUIREMENTS OF 10 CFR §: (Check all that apply) (11)							
		20.2201(b)	20.2203(a)(3)(ii)	50.73(a)(2)(ii)(B)	50.73(a)(2)(ix)(A)				
		20.2201(d)	20.2203(a)(4)	50.73(a)(2)(iii)	50.73(a)(2)(x)				
		20.2203(a)(1)	50.36(c)(1)(i)(A)	50.73(a)(2)(iv)(A)	73.71(a)(4)				
		20.2203(a)(2)(i)	50.36(c)(1)(ii)(A)	50.73(a)(2)(v)(A)	73.71(a)(5)				
		20.2203(a)(2)(ii)	50.36(c)(2)	50.73(a)(2)(v)(B)	OTHER				
		20.2203(a)(2)(iii)	50.46(a)(3)(ii)	50.73(a)(2)(v)(C)	Specify in Abstract below or in NRC Form 366A				
		20.2203(a)(2)(iv)	50.73(a)(2)(i)(A)	50.73(a)(2)(v)(D)					
		20.2203(a)(2)(v)	X 50.73(a)(2)(i)(B)	50.73(a)(2)(vii)					
		20.2203(a)(2)(vi)	50.73(a)(2)(i)(C)	50.73(a)(2)(viii)(A)					
		20.2203(a)(3)(i)	50.73(a)(2)(ii)(A)	50.73(a)(2)(viii)(B)					

LICENSEE CONTACT FOR THIS LER (12)

NAME D. A. Heacock, Site Vice President	TELEPHONE NUMBER (Include Area Code) (540) 894-2101
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COMPLETE ONE LINE FOR EACH COMPONENT FAILURE DESCRIBED IN THIS REPORT (13)

CAUSE	SYSTEM	COMPONENT	MANUFACTURER	REPORTABLE TO EPIX	CAUSE	SYSTEM	COMPONENT	MANUFACTURER	REPORTABLE TO EPIX

SUPPLEMENTAL REPORT EXPECTED (14)

YES (If yes, complete EXPECTED SUBMISSION DATE)	<input checked="" type="checkbox"/> NO	EXPECTED SUBMISSION DATE (15)	MONTH	DAY	YEAR

ABSTRACT (Limit to 1400 spaces, i.e., approximately 15 single-spaced typewritten lines) (16)

On June 25, 2002, at 1330 hours, with Units 1 and 2 in Mode 1 operating at 100% power, it was identified that the alarm setpoint for the Waste Gas Decay Tank (WGDT) Oxygen Analyzer may allow the tank oxygen to exceed the limit of Technical Specification (TS) 3.11.2.5. TS 3.3.3.11 requires the oxygen monitor to be operable with the alarm setpoint set to ensure the limits of TS 3.11.2.5 are not exceeded. TS 3.11.2.5 requires that the concentration of oxygen in the WGDTs be limited to less than or equal to 2% by volume whenever the hydrogen concentration could exceed 4% by volume. Calibration and functional test procedures specify a voltage with an acceptable range of +/- 0.5% for ensuring the oxygen analyzer is set to meet TS requirements. However, use of the upper end of the acceptable range may cause the TS limit of less than or equal to 2% oxygen to be exceeded. This event is being reported as a condition prohibited by TS in accordance with 10CFR50.73(a)(2)(i)(B). The cause of the event is attributed to personnel error that resulted in the establishment of inadequate procedures that did not satisfy TS requirements. The action statement of TS 3.3.3.11 was entered and the alarm setpoint was subsequently adjusted to within the TS limit. No significant safety consequences resulted from this event because the WGDT oxygen concentration remained below TS limits. The health and safety of the public were not affected at any time during this event.

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		YEAR 2002	SEQUENTIAL NUMBER --001 --	REVISION NUMBER 00	

NARRATIVE (If more space is required, use additional copies of NRC Form 366A) (17)

1.0 DESCRIPTION OF THE EVENT

On June 25, 2002, at 1330 hours, with Units 1 and 2 in Mode 1 operating at 100% power, it was discovered, during the review of Technical Requirement Manual changes that were being performed to support the conversion to the Improved Technical Specifications, that the alarm setpoint for the Waste Gas Decay Tank (WGDT) Oxygen Analyzer (EIS System WE, Component AA) may allow the tank oxygen to exceed the limit of Technical Specification (TS) 3.11.2.5. TS 3.3.3.11 requires the oxygen monitor to be operable with the alarm setpoint maintained to ensure the limits of TS 3.11.2.5 are not exceeded. TS 3.11.2.5 requires that the concentration of oxygen in the WGDTs be limited to less than or equal to 2% by volume whenever the hydrogen concentration could exceed 4% by volume.

Procedures ICP-GW-1-O2-102, Waste Gas Decay Tank Outlet Oxygen and 1-PT-45.9.3, Waste Gas Decay Tank Outlet Oxygen Functional (ITS Operational) Test (O2-GW-102), use an alarm setpoint of 2% (1.800 VDC on a 1 - 5 VDC scale, analogous to 0 - 10% oxygen). An acceptable range of plus or minus 0.5% was applied to this setting, giving an upper end value of 1.820 VDC. This upper end value translates to 2.05% oxygen, which is in excess of the TS limit of less than or equal to 2% oxygen by volume.

A review of completed performances of ICP-GW-1-O2-102 and 1-PT-45.9.3 was performed for the period of January 2001 through June 2002 in an effort to determine if there were other instances where the WGDT oxygen analyzer setpoint was set incorrectly. This review identified several instances where the WGDT oxygen analyzer alarm setpoint was set above the 2% oxygen limit specified by TS 3.11.2.5. However, it was also verified that the indicated oxygen level in the WGDTs was less than or equal to 2% during this timeframe. Therefore, this event is being reported as a condition prohibited by TS in accordance with 10CFR50.73(a)(2)(i)(B).

2.0 SIGNIFICANT SAFETY CONSEQUENCES AND IMPLICATIONS

The gaseous waste disposal system is designed to provide adequate storage for radioactive decay time of waste gases. The system contains two WGDTs that are provided with overpressure relief protection to preclude leakage of waste gas to the environment during normal operation. The hydrogen and oxygen concentrations in the WGDTs are monitored to prevent an explosive gas mixture. The monitoring of the WGDT oxygen concentration is performed by Operations every 12 hours to verify the WGDT oxygen levels are maintained less than or equal to 2% by volume with the hydrogen concentration typically maintained greater than 4% by volume. After sufficient decay time, the gases in the WGDTs are released through the process vent system to the atmosphere.

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NARRATIVE (If more space is required, use additional copies of NRC Form 366A) (17)

The WGDT rupture is an analyzed event. Although no specific cause for a rupture has been defined, the analysis assumes that a WGDT rupture takes place when the tank has the greatest inventory of waste gases at the maximum expected activity. The entire gaseous content of the WGDT is assumed to be releases in a ground-level release. The dose consequence from a rupture of a WGDT is well below the guidelines of 10CFR100.

Based on the design of the gaseous waste disposal system, the monitoring and verification that WGDT oxygen levels are maintained less than or equal to 2% by volume, and the consequences from a postulated WGDT rupture being well below 10CFR100 guidelines, this event posed no significant safety implications. Therefore, the health and safety of the public were not affected by this event.

3.0 CAUSE

The cause of the event is attributed to personnel error that resulted in the establishment of inadequate calibration and functional test procedures that did not satisfy TS requirements. An incorrect acceptable range with an upper end value that exceeded TS limits had been inadvertently incorporated into the calibration and functional test procedures.

4.0 IMMEDIATE CORRECTIVE ACTION(S)

The action statement requirement of TS 3.3.3.11 was entered, at 1330 hours on June 25, 2002, upon discovery of the discrepancy.

The oxygen analyzer alarm setpoint was adjusted from 1.808 VDC to 1.786 VDC to be within the TS limit. The action statement requirement of TS 3.3.3.11 was cleared at 0408 hours on June 26, 2002.

5.0 ADDITIONAL CORRECTIVE ACTIONS

Procedures ICP-GW-1-O2-102, Waste Gas Decay Tank Outlet Oxygen and 1-PT-45.9.3, Waste Gas Decay Tank Outlet Oxygen Functional (ITS Operational) Test (O2-GW-102), were revised to correct the upper end of the acceptable range value to ensure TS requirements are met.

6.0 ACTIONS TO PREVENT RECURRENCE

No further actions are required.

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7.0 SIMILAR EVENTS

LER 50-338/96-007-00 documents the monthly surveillance test required by TS 4.3.3.11 failed to include a functional test of the high oxygen alarm associated with the WGDT hydrogen/oxygen analyzer. The cause of the event was attributed to personnel error due to a failure to develop adequate procedures to cover TS requirements.

8.0 MANUFACTURER/MODEL NUMBER

Not Applicable

9.0 ADDITIONAL INFORMATION

None