### North Anna 2 2Q/2004 Plant Inspection Findings

# **Initiating Events**



Item Type: NCV NonCited Violation

Reactor Trip due to Improper Cell Switch Installation

The licensee failed to properly install cell switches for bypass reactor trip breakers in accordance with plant drawings causing a reactor trip during the performance of reactor protection logic testing.

A self-revealing non-cited violation of Technical Specification 5.4.1.a was identified. The finding is greater than minor since it was associated with the design control attribute of the initiating events cornerstone, and affected the cornerstone objective to limit the likelihood of those events that upset plant stability and challenge critical safety functions during power operations. The incorrect cell switch configuration would not have prevented a reactor trip if required by the Reactor Protection System. The finding was determined to have very low safety significance because it only affects the initiating events cornerstone and does not contribute to the likelihood that mitigation equipment or functions will not be available. The issue involved human performance cross-cutting aspects associated with a lack of attention to detail by licensee personnel. (Section 1R14)

Inspection Report# : <u>2004003(pdf</u>)

# **Mitigating Systems**



Significance: Jun 26, 2004

Identified By: NRC

Item Type: FIN Finding

### Incomplete Closeout Inspections of Unit 2 Containment

One finding was identified involving an inadequate Unit 2 containment closeout inspection to ensure all loose debris was removed and that recirculation sumps were operable prior to Mode 4 entry.

No violation of regulatory requirements was identified. The finding is greater than minor due the potential to have a degraded or inoperable containment sump recirculation system. The finding was determined to be of very low safety significance because an actual loss of safety function was not identified. (Section 1R22.2)

Inspection Report# : <u>2004003(pdf)</u>



Significance: Jun 26, 2004 Identified By: NRC Item Type: NCV NonCited Violation

### Failure to Properly Torque Studs for TDAFW Pump Discharge Restricting Orifice

The licensee failed to properly torque studs associated with the Unit 2 Turbine Driven Auxiliary Feedwater pump discharge restricting orifice.

An inspector identified non-cited violation of Technical Specification 5.4.1.a was identified. The finding is greater than minor because if left uncorrected, it could result in a more significant safety concern. Under torqued studs could lead to the development of a gasket leak at the non-isolable restricting orifice and challenge the ability of the pump to meet its design basis flow requirements. The finding was determined to be of very low safety significance because pump operability was not challenged and two motor driven trains of Auxiliary Feedwater were available to supply water to the steam generators. (Section 1R12.2)

Inspection Report# : 2004003(pdf)





Identified By: NRC

Item Type: NCV NonCited Violation

# Failure to Assess and Manage the Increase in Risk of Opening a Jet Impingement/Missile Protection Steel Door During Planned Component Maintenance.

The licensee failed to assess and manage the increase in risk for planned component maintenance activities involving opening of the chiller room rolling jet impingement/missile protection steel door inside the turbine building to support change-out of the control room supply air bottles for trains III and IV.

An inspector-identified non-cited violation of 10 CFR 50.65(a)(4) was identified. The finding is more than minor because the failure to properly manage

#### 2Q/2004 Inspection Findings - North Anna 2

the increase in risk affected the Mitigating Systems cornerstone objective of ensuring the availability, reliability, and capability of systems that respond to initiating events. The finding was determined to be of very low safety significance because there was no loss of mitigating system function in that the common control room air supply from trains I and II were available to mitigate a loss of main control room ventilation. (Section 1R13.2)

Inspection Report# : 2004003(pdf)



Significance: Jun 26, 2004 Identified By: NRC Item Type: NCV NonCited Violation

#### Failure to Properly Inspect the EDG Tornado Exhaust Missile Barriers

The licensee failed to adequately implement the preventative maintenance program to properly inspect the Emergency Diesel Generator concrete tornado missile barriers.

An inspector-identified non-cited violation of Technical Specification 5.4.1.a was identified. The finding is more than minor because if the condition was left uncorrected it would become a more significant safety concern. Continued degradation of the concrete would lead to spalling and concrete debris in the exhaust piping. Accumulation of debris would restrict exhaust flow and derate the engine Kilowatt output. The finding was determined to be of very low safety significance because the tornado concrete structure remained in tact and capable to perform the design basis function to protect the exhaust piping.

Inspection Report# : <u>2004003(pdf</u>)



Significance: Jun 2 Identified By: NRC

Item Type: NCV NonCited Violation

#### Alternate Shutdown Panel Ventilation System Not Independent From Impacts of a Main Control Room Fire

The licensee failed to provide adequate separation, isolation, or barriers for the shared ventilation system between the main control room (MCR) and the Units 1 and 2 emergency switchgear rooms (ESGRs).

A non-cited violation for failure to comply with 10 CFR 50, Appendix R, Sections III.G and III.L was identified by the inspectors. In some fire scenarios involving a severe fire in the MCR, smoke and toxic gases could be transported to the ESRGs where the alternate shutdown panels (ASPs) are located. The licensee entered this finding into their corrective action program as Plant Issue N-2003-1585. This finding is greater than minor because it affected the Mitigating Systems cornerstone objective of ensuring the availability, reliability, and capability of systems that respond to initiating events. Because the alternative shutdown capability is not physically independent of the affected fire area, it could present a habitability concern for the operators attempting to achieve shutdown at the respective unit's ASP. This finding is of very low safety significance because both the likelihood of starting a MCR fire and likelihood of generating sufficient smoke to spread to the ESGRs are very low. Additionally, timely fire brigade response activities would provide a pathway to ventilate the smoke away from the MCR. (Section 40A5)

Inspection Report# : <u>2004003(pdf</u>)

### **Barrier Integrity**

### **Emergency Preparedness**



Identified By: NRC

Item Type: NCV NonCited Violation

Failure to classify and declare an Notification of Unusual Event as required by 10 CFR 50.54(q), 50.47(b)(4), and Section IV.B of Appendix E of 10 CFR 50

The inspectors identified a non-cited violation of 10 CFR 50.54(q), 50.47(b)(4), and Section IV.B of Appendix E of 10 CFR 50. On June 27, 2003, the licensee failed to classify and declare an Notification of Unusual Event in accordance with emergency plan implementing procedures following the unplanned release of a toxic gas which could affect safety of station personnel.

The finding is greater than minor because it affected the Emergency Preparedness Cornerstone objective of ensuring the emergency response organization's performance to implement adequate measures to protect public health and safety during an emergency. The finding is associated with a risk significant planning standard and determined to be of very low safety significance using Manual Chapter 0609, Appendix B "Emergency Preparedness Significance Determination Process," Sheet 2 which specifies that failure to declare an Notification of Unusual Event is Green. Inspection Report# : 2003004(pdf)

## **Occupational Radiation Safety**

## Public Radiation Safety

### **Physical Protection**

Physical Protection information not publicly available.

### Miscellaneous

Last modified : September 08, 2004