

U.S. Nuclear Regulatory Commission Public Meeting Summary

Title: Discussion of Dominion's Response to Select Staff RAIs on North Anna Subsequent License Renewal Application

Date of Meeting: May 27, 2021, 2:00 pm – 5:00 pm

Location: Webinar

Type of Meeting: This is an Observation Meeting. This is a meeting in which attendees will have an opportunity to observe the U.S. Nuclear Regulatory Commission (NRC) performing its regulatory function or discussing regulatory issues. Attendees will have an opportunity to ask questions of the NRC staff or make comments about the issues discussed following the business portion of the meeting; however, the NRC is not actively soliciting comments toward regulatory decisions at this meeting.

Purpose of the Meeting(s):

To discuss Virginia Electric and Power Company's (Dominion Energy's) responses to select NRC requests for additional information (RAIs) associated with the safety review of the North Anna Power Station, Units 1 and 2 (NAPS) Subsequent License Renewal Application (SLRA). To enable the staff to gain a better understanding of Dominion Energy's approach to aging management and to formulate a path forward.

General Details:

The NRC staff held a public, observational meeting with Dominion Energy to discuss responses to select NRC RAIs associated with the safety review of the NAPS SLRA. The meeting began at 2:00 pm and ended approximately at 5:00 pm. There were 13 NRC staff members, 8 applicant staff and contractor, and four members of the public. The meeting began with introductions of the NRC staff, Dominion Energy staff and contractor, and members of the public who wished to introduce themselves.

Summary of Meeting:

- B2.1.7-1, Pressurized-Water Reactor Vessel Internals

The staff explained that it had reviewed the slides and did not have further questions on this item. The staff finds the proposal acceptable, if provided on the docket.

- B2.1.15-1 Basis for 20-Year Replacement Frequency for Diesel Engine Heat Exchanger

The staff explained that it had reviewed the slides and did not have further questions on this item. The staff finds the proposal acceptable, if provided on the docket.

- B2.1.27-1 Cyclic Fatigue of Buried Gray Cast Iron Using Jockey Pump Monitoring

Dominion began by describing how the jockey pump monitoring is actually accomplished. Dominion stated that it believed that jockey pump monitoring can identify a leak. The current system is continuous monitoring of the main pumps in the control room. Dominion

should be able to make trends and identify anomalies, such as test runs. The jockey pump run time will be monitored monthly to detect and prevent unexpected pump starts. Installation of jockey pump run time totalizer to monitor has been requested to facilitate this monitoring.

The staff questioned the periodicity of the monitoring and whether leakage could be detected and addressed within the proposed monthly periodicity.

Dominion will continue to consider the staff's concerns and the staff will continue to consider Dominion's proposal to use jockey pump monitoring to identify leakage in the fire water piping.

- B2.1.21-1 Basis for Extent of Inspections for Selective Leaching

Dominion discussed that they would be using a graded approach to dealing with selective leaching similar to aging related cracking. For example, in category A, there is no indication of aging related cracking (or selective leaching). In category B, there is some indicating of aging related cracking (or selective leaching) but actions were taken to mitigate and considered successful because no additional failures were identified. In category C, there is active aging related degradation (or selective leaching) and no mitigation efforts.

Dominion is recommending using category B and would conduct a one-time inspection for selective leaching of grey cast iron with additional work as the opportunities arise.

Dominion further explained that it would complete three to four digs to get the 25 inspections per unit prior to the subsequent period of extended operation, including two destructive examination per unit.

- B2.1.21-2 Basis for Single 10-Foot Sample for Selective Leaching

Dominion summarized their position as follows:

Periodically excavating one 10-foot piping segment per unit will satisfy the visual inspections (8 samples) and the mandatory destructive examination (2 samples).

- Selection of piping excavation location consistent with leading sample criteria
- NUREG-2191 considers each 1-foot piping segment (or equivalent 1-foot segment) as one component: M33, M36, M38 (any combination of 1-foot lengths), M41 (inspections based on 10-foot lengths), and M42
- Opportunistic inspections based on enhanced jockey pump monitoring to target specific piping leakage issues will augment periodic sampling – informed opportunistic inspections as a result of enhanced jockey pump

Dominion stated that it already has a commitment to restore cathodic protection five years prior to entering the subsequent period of operation.

In order to understand what portions of the fire protection system are covered by existing cathodic protection, Dominion will post a map of the cathodic protection on the portal and a

drawing of the fire protection runs. Combining the two should show what fire protection pipes are covered by the existing cathodic protection.

- B2.1.35-1, RG 1.127, Inspection of Water-Control Structures Associated with Nuclear Power Plants

Dominion provided slides for discussion, but the topic was not discussed.

Public Participation Themes:

There were four members of the public on the phone. One member of the public spoke.

Erica Grey stated that all meetings should be recorded and transcribed. Further, Ms. Grey stated that North Anna should not be allowed to do any generic analysis. It is a unique based on seismic concerns (it actually experienced an earthquake) and analysis and test should be completed on piping etc.

Action Items/Next Steps:

The NRC staff will prepare and issue a meeting summary.

Attachments:

Meeting description and agenda – ADAMS Accession No. [ML21147A044](#)

NRC slide presentation – ADAMS Accession No. [ML21221A148](#)

Dominion slide presentation – ADAMS Accession No. [ML21221A154](#)