Prairie Island

NIS PR Bypass Test Panel License Amendment Request

August 11, 2021

Agenda

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Purpose

Discuss a proposed license amendment request (LAR) to change Technical Specifications (TS) to allow testing the Power Range (PR) Nuclear Instrumentation System (NIS) channels with the channel in bypass following installation of permanent bypass capability

Background

- Reducing trip state vulnerability during PR NIS testing
- The current design places the PR NIS channel in trip during testing and reduces the trip logic from 2/4 to 1/3

Approach

- Reduce susceptibility to spurious trips during testing by installing permanent bypass test capability and changing TS to allow testing in bypass (trip logic while testing becomes 2/3)
  - Plant Modifications: Install and implement a PR NIS Bypass Test Panel of Westinghouse design
  - TS changes:
    - Revise the Note to TS 3.3.1, Condition D, based on a modification that allows the channel to be tested in bypass
    - Add Notes to SR 3.3.1.7 and SR 3.3.1.8 to exclude testing the RPS input relays during a COT

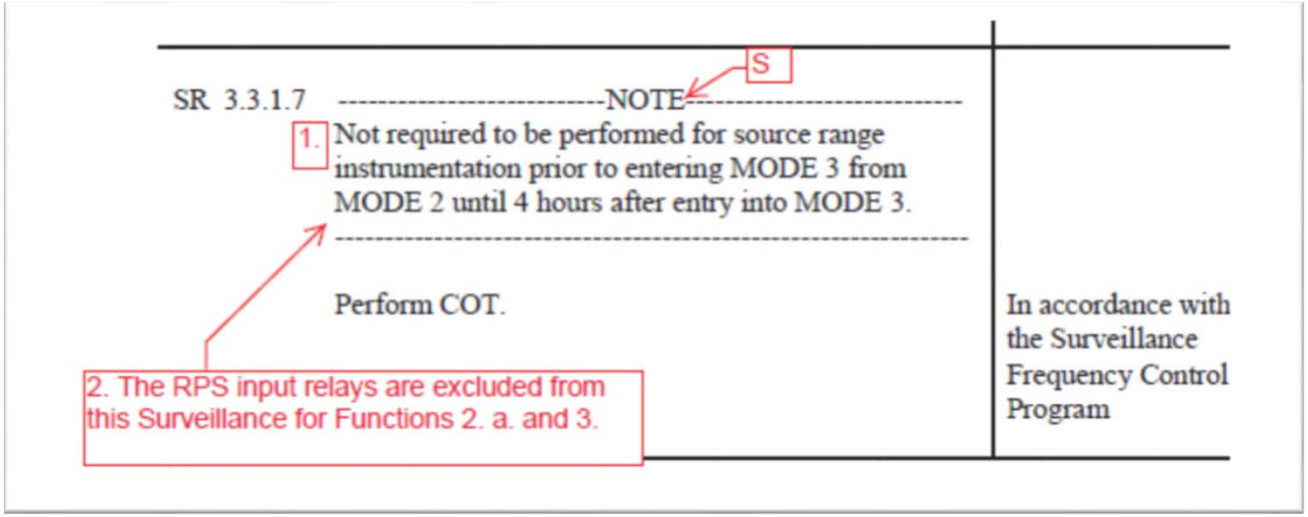
Approach (continued)

Proposed TS Markups

D. One Power Range Neutron Flux channel inoperable.	----------NOTE---------- ~~The inoperable~~ One channel may be bypassed for up to 4 hours for surveillance testing and setpoint adjustment ~~of other channels~~. ----------	
	D.1.1 Place channel in trip.	6 hours OR In accordance with the Risk Informed Completion Time Program

Approach (continued)

Proposed TS Markups (continued)



Approach (continued)

Proposed TS Markups (continued)

SURVEILLANCE REQUIREMENTS (continued)

SURVEILLANCE	FREQUENCY
SR 3.3.1.8 ----------NOTES---------- 1. This Surveillance shall include verification that interlocks P-6 and P-10 are in their required state for existing unit conditions. 2. Not required to be performed for intermediate and source range instrumentation prior to reactor startup following shutdown ≤ 48 hours. ---------- Perform COT.	--------NOTE------- Only required when not performed within the Frequency specified in the Surveillance Frequency Control Program ---------- Prior to reactor startup AND Twelve hours after reducing

3. The RPS input relays are excluded from this Surveillance for Function 2. b.

Precedents

- Ginna Amendment 132

Schedule

- Submit the LAR in September 2021
- Will request a review within 12 months of acceptance
- Implementation will be 30 days following approval and installation on Unit 1
  - Unit 2 hardware installed Fall 2021
  - Unit 1 hardware installed Fall 2022

Closing Remarks

Questions?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