

Nuclear Regulatory Commission

Augmented Inspection Team
Exit Meeting
Catawba Nuclear Station



Questions



Augmented Inspection Team

- Review aspects of 2 operational events at Catawba in order to:
 - Understand the events, including equipment performance and operator response
 - Assess Catawba Station response and investigation of the events
 - Identify concerns generic to the station and the nuclear industry
 - Identify issues for follow-up inspection



Unresolved Items

- Inadequate setting of the Red and Yellow bus differential current relays
- Untimely notification to the NRC of the event
- Missing and degraded conduit seals



Inspection Results

- Conduct a generic issues assessment of both events and review the implications of water intrusion into the 1A emergency diesel generator room
 - Generic Assessment
 - Missing conduit seals/degraded conduit seals
- Document the inspection findings and conclusions in an inspection report
 - Unresolved items pending further inspection and risk analysis



Inspection Results

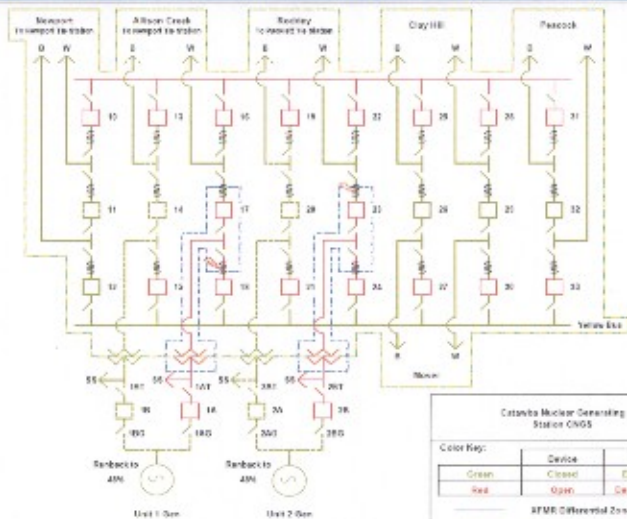
- Identify licensee investigation and follow-on analysis in response to this event
 - Two licensee teams for LOOP event:
 - ❖ Significant Event Investigation Team
 - ❖ Failure Investigation Process Team
 - Event Investigation Team – EDG 1A Water intrusion event
- Assess operation of Unit 1 and Unit 2 primary power operated relief valves
 - The valves operated as expected for this event



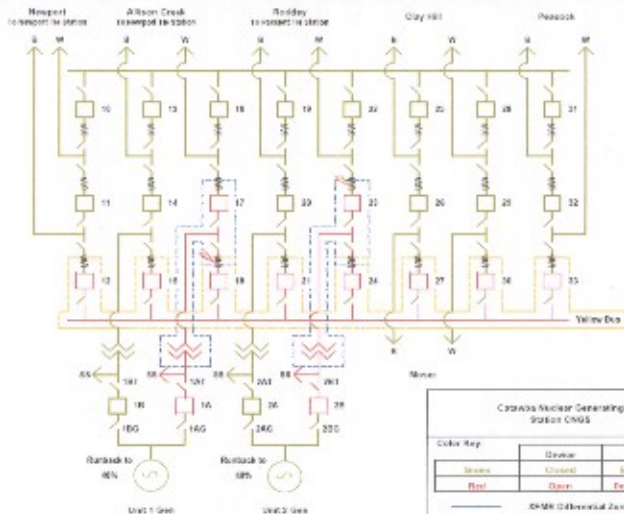
Inspection Results

- Assess the immediate actions taken by the licensee; including the accuracy and timeliness of the licensee's classification of the event.
 - Operator Response
 - Emergency Notification to State, Local authorities and NRC

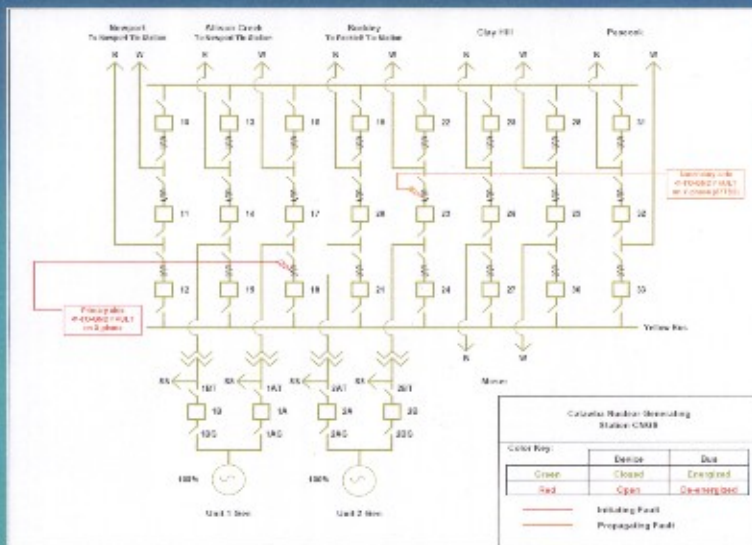
Switchyard – Actual response



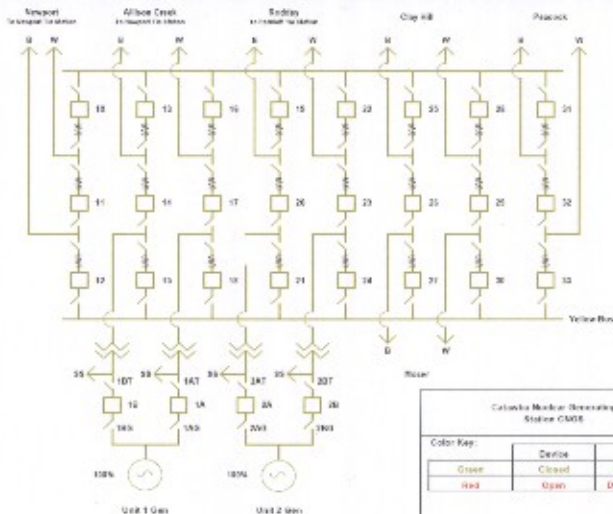
Catawba Switchyard – Design Response



Fault Locations



Catawba Switchyard



Catawba Nuclear Generating Station CMSS

Color Key:

Color	Device	State
Green	Closed	Energized
Red	Open	De-energized

Inspection Results

- Develop a sequence of events for:
 - Switchyard Electrical Event
 - Units 1 and 2 response
 - Activation of the Catawba Emergency Response Organization and offsite notifications



Inspection Charter (continued)

- Assess operation of Unit 1 and Unit 2 primary power operated relief valves
- Conduct a generic issues assessment and review the implications of water intrusion into the 1A emergency diesel generator room
- Document the inspection findings and conclusions in an inspection report
(05000413/2006009 & 05000414/2006009)



Inspection Charter

- Develop a sequence of events
- Assess the immediate actions taken by the licensee, including the accuracy and timeliness of the licensee's classification of the event
- Identify licensee investigation and follow-on analysis in response to this event



Catawba 1 & 2 events May 20 and 22, 2006

- May 20 - Switchyard fault resulted in loss of offsite power to both Catawba Units
- May 22 – Water intrusion into the 1A emergency diesel generator room resulting in 1A EDG being declared inoperable
 - Unrelated to the May 20 event

Summary

- Plant Equipment Performance
 - Good – Both Units shut down properly and were placed in a safe mode of operation
- Operator Performance
 - Good response to a challenging event
- Missing and degraded conduit seals
 - Unit 2 seals were corrected prior to restart
 - Unit 1 seals have been corrected
- NRC is finalizing inspection effort and performing the final risk characterization

