

CF  
50-335

OEAB EVENT TRACKING SHEET

No Sort Specified

QUERY> "BENNER" \$ Assigned To & Assigned Date >= 06/09/94 & Assigned Date <= 06/09/94

Plant: SAINT LUCIE

Unit: 1,2

Engineer: BENNER E.

Event: 4/4/93

Morning Report:

Briefing:

50.72#: 0

LER#: 050000009400000

PN#:

Other Notification: UPRSE #94041811.6

System:

Component:

OPERATING MODE

- ① - Operation
- 2 - Startup
- 3 - Hot Standby
- 4 - Hot Shutdown
- 5 - Cold Shutdown
- 6 - Refueling
- 7 - Other \_\_\_\_\_

SIGNIFICANCE

- A - Reactor Protection System
- B - Safety-Related Cooling System
- C - Fuel Cladding
- D - Reactor Coolant Pressure Boundary
- E - Containment
- ⑥ - Plant Power
- G - Unexpected Plant Performance
- H - Other:

CAUSE

- ① - Equipment Failure
- 2 - Design or Installation Error
- 3 - Operating Error
- 4 - Maintenance Error
- 5 - External
- 6 - Other \_\_\_\_\_

EVENT TYPE

- SIG - Significant Event
- EOI - Event of Interest
- TBD - To Be Determined
- ⑥ - Other

POTENTIAL AO: 10

Criterion: \_\_\_\_\_

Proposed By: BENNER E. EAB 12/12/94  
Engineer

Approved: EFG 12/19  
Section Leader

A. Chaffee  
Branch Chief

EVENTS ASSESSMENT PANEL

First Screening:

Significance Description:

RELAY FAILURES (SEE ATTACHED PAGE).

do not  
panel

K May 12/19/94  
closure:

6/9

2-11-97

9412230186 2pp XA

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DOCUMENT LOCATION & NAME: G:\EJBI\UPRSE\_28.EFR

PSE:UPR

EVENT FOLLOW-UP ASSIGNMENT SHEET

ASSIGNMENT DATE: 06/09/94  
ASSIGNED TO: BENNER E  
PLANT & UNIT: SAINT LUCIE  
EVENT DATE: \_\_\_\_\_  
50.72 REPORT NO: \_\_\_\_\_  
DAILY REPORT DATE/NO: \_\_\_\_\_  
OTHER REPORT: UPRSE #940418II.6

EVENT SUMMARY AND SPECIFIC FOLLOW-UP ASSIGNMENT

RELAY FAILURES (SEE ATTACHED PAGE).

DETERMINE DETAILS, PREVIOUS DISPOSITIONS (IF ANY), RISK SIGNIFICANCE (IF PRACTICAL), PREVIOUS SIMILAR EVENT DISPOSITIONS, AND ENFORCEMENT ACTIONS. PROPOSED EVENT CLASSIFICATION AND EVALUATE THE NEED FOR GENERIC COMMUNICATION. **INCLUDE THE NUMBER OF HOURS SPENT ON THIS ASSIGNMENT IN THE CLOSEOUT.**

**CIRCLE THE APPLICABLE CASE:**

SAFETY SIGNIFICANCE CLASSIFICATION: OTH YES EOI NO SIG NO AO NO

GENERIC CONCERN STATUS: YES IN #94-78 BUL # \_\_\_\_\_ GL# \_\_\_\_\_

OR BRIEF: NO # \_\_\_\_\_

CLOSEOUT

While calibration testing was being performed on overcurrent protective relays, a non-safety related ABB/Westinghouse protective relay of Type CO-9 failed to operate the instantaneous trip function. An inspection of the malfunctioning relay revealed the normally open contacts were coated with a green substance. This substance was determined to have dripped onto the contacts from the terminal lugs on the end of the relay internal cabinet wiring. The green substance, which was identified as polyvinyl chloride (PVC), had leached out of the insulation on the wiring. The analysis of this event is of interest because the same type of relay is used in numerous safety-related applications at St. Lucie.

A risk analysis performed by Pacific Northwest Laboratories (Battelle) indicated that the calculated core damage frequency is insensitive to failures of the overcurrent relays. This is due to the passive function of these relays, which are rarely called upon. Because of redundancy in design, the direct consequence of a malfunction of an overcurrent relay is a reduction in redundancy, not the defeat of a safety function.

This event is classified as an OTHER. Information Notice 94-78 was issued to alert the industry to this issue. Four staff hours were spent on this event, in addition to the risk assessment performed by Battelle.