

OEAB EVENT TRACKING SHEET

SORT> Assignment Date
QUERY> "TAPPERT" \$ Assigned To & Assigned Date >= 08/01/95 & Assigned Date <= 09/01/95

Plant: SAINT LUCIE Unit: 2 Engineer: TAPPERT J.
Event: 08/18/95 Morning Report: Briefing:
50.72#: 0 LER#: 050000009500000 PN#:

Other Notification: REGION II CALL OF 8/18/95

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
- F - 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
- X EOI - Event of Interest
- TBD - To Be Determined
- OTH - Other

POTENTIAL AO: Criterion:

Proposed By: TAPPERT J. 8/29/95
Engineer
Approved: 08/29/95
Section Leader

A. Chaffee
Branch Chief

EVENTS ASSESSMENT PANEL First Screening:

Significance Description:

SPRAY DOWN OF CONTAINMENT
9509140063 4pk

K. May 9/6/95
closure:

G/15

100030

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ASSIGNMENT SHEET

PANEL -- Y YES NO

ASSIGNMENT DATE: August 21, 1995
ASSIGNED TO: TAPPERT
PLANT & UNIT: ST LUCIE 2
EVENT DATE: August 18, 1995
50.72 REPORT NO:
MR NO: REGION 2 CALL OF August 18, 1995
OTHER SOURCE REPORT:
RELATED REPORTS: LER 95-07
SPECIALTY CODE:

EVENT/CONDITION SUMMARY

SPRAY DOWN OF CONTAINMENT

SPECIFIC FOLLOW-UP ASSIGNMENT

DETERMINE DETAILS, EVALUATE SAFETY SIGNIFICANCE AND GENERIC IMPLICATIONS. IN ADDITION, ADDRESS THE FOLLOWING SPECIFIC CONCERNS:

POTENTIAL MANAGEMENT PROBLEMS INDICATED BY MULTIPLE EVENTS

PREPARE TO BRIEF: X YES NO

TARGET CLOSEOUT SCHEDULE: FAST

INITIAL SCREENING BY PANEL

REGULATORY ASSESSMENT:

EVENT/CONDITION SAFETY SIGNIFICANCE: OTH EOI SIG AO

REMAINING OR ADDITIONAL FOLLOW-UP ITEMS:

CLOSEOUT TEXT

REGULATORY ASSESSMENT: (Abstract of Closeout/Findings)

A procedural deficiency led to an inadvertent 10,000 gallon spray down of the St Lucie Unit 1 containment while in hot shutdown. Equipment important to safety installed in containment is designed to withstand the effects of a spray down event and therefore the safety significance of the event was minimal. Damage was limited to several smoke detectors, a ground on a Safety Injection Tank sample valve, and contamination. The licensee held a work stand down and has carefully planned their recovery actions. These actions appear adequate to address all immediate safety concerns. The specific procedural deficiency that led to the event is not a generic issue, however, inadvertent containment spray is generic and has been a recurring industry problem. The frequency and consequences of inadvertent containment spray events are not sufficient to justify additional generic regulatory action.

CLOSEOUT/FINDINGS:

On August 17, 1995, St Lucie Unit 1 was in Mode 3 at 532°F and 1550 psia making preparations to start up. The containment spray system had been aligned for automatic actuation as part of the startup procedure. The A containment spray header flow control valve was not in its normal position because it had failed its stroke test the previous week. The licensee opted to fail the valve in its safety position (open) and repair it during the next refueling outage. In the standby lineup, the spray header flow control valve is the only shut valve between the SDC HX and the containment spray header. The licensee did perform a 50.59 evaluation for this temporary modification.

As a corrective action for a previous LPSI problem, the licensee had written an ECCS fill and vent procedure to be implemented following the conclusion of shutdown cooling operations. This procedure vented the LPSI system then ran the LPSI pumps and vented the system again. When this procedure was performed with the abnormal containment spray configuration, a direct flow path was created from the RWT to the containment spray header. Three minutes after establishing the flow path, the control room received high reactor cavity leakage annunciators and multiple containment fire alarms. Operators entered the off-normal procedure for excessive RCS leakage and verified normal RCS parameters. Operators then identified the flow path from LPSI to the containment spray header and secured the LPSI pump and isolated the SDC HX. Post event analysis determined approximately 10,000 gallons were sprayed in containment.

In response to this event, the licensee stopped all nonessential work on site. The plant was cooled down and a thorough containment inspection and cleanup was undertaken. Damage was limited to several failed smoke detectors and a ground on a SIT sample valve. St Lucie has had a number of recent performance problems including procedural noncompliances which led to the failure of an RCP seal and an inadvertent MSIV isolation during a shutdown. Other errors led to inoperable PORVs for several months. A management meeting between the Region and licensee management has been scheduled to discuss recent performance trends. Additionally, an enforcement conference on the PORV inoperability issue has been scheduled. Further regulatory action will await the result of these meetings.

In light of recent performance problems, and despite the limited safety significance of the actual event, this event is classified as an Event of Interest.

Information Notices have been written for more significant containment spray events including 81-10, 87-25, and 94-52. Additionally, NRR has transmitted a 1991 safety evaluation regarding inadvertent containment spray events to all the regions to assist them in spray event followup. No additional generic communciation is warranted at this time.

FINAL PANEL ASSESSMENT:

The panel considered the significance of this to be moderate. The specific causes of the event were judged to not be generic. Factors impacting priority determination were effect of spraydown on containment and recent performance problems at the facility.

EVENT/CONDITION SAFETY SIGNIFICANCE: ☐ OTH ☒ EOI ☐ SIG ☐ AO

BASIS: ☐ RISK ☐ PROGRAMMATIC ☐ MARGIN ☐ N/A

GENERIC FOLLOW-UP ACTION RECOMMENDED: ☐ YES ☐ NO ☐ PRIORITY (1,2,3,4)¹
☐ IN ☐ BUL ☐ GL
☐ NUREG ☐ REG GUIDE

FILE: G:\JRT\EF08185J

BRIEF # _____

1. Priority endnote:

PRIORITY 1: Immediate assignment of resources (e.g., for highly risk-significant safety concerns)

PRIORITY 2: Near-term action (e.g., significant safety issues not warranting immediate action)

PRIORITY 3: Long-term action (e.g., issues of moderate to low safety significance)

PRIORITY 4: Resource dependent action (e.g., items that can be deferred)