January 17, 2003

U. S. Nuclear Regulatory Commission Attn: Document Control Desk Mail Stop P1-137 Washington, DC 20555-0001



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ULNRC-04797

Ladies and Gentlemen:

DOCKET NUMBER 50-483
Callaway PLANT UNIT 1
UNION ELECTRIC CO.
FACILITY OPERATING LICENSE NPF-30
LICENSEE EVENT REPORT 2002-013-00
RPS actuation in Mode 4 while performing TADOT testing

The enclosed licensee event report is submitted in accordance with 10CFR50.73(a)(2)(iv)(A) to report a Reactor Protection System (RPS) actuation in Mode 4 while performing a Trip Actuating Device Operational Test (TADOT)

Very truly yours,

Warren A. Witt

Manager, Callaway Plant

Warren A. with

WAW/ewh

Enclosure

JE22

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cc: Mr. Ellis W. Merschoff
Regional Administrator
U.S. Nuclear Regulatory Commission
Region IV
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Arlington, TX 76011-4005

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Records Center Institute of Nuclear Power Operations 700 Galleria Parkway Atlanta, GA 30339 NRC FORM 366 (7-2001)

U.S. NUCLEAR REGULATORY COMMISSION

APPROVED BY OMB NO. 3150-0104 Estimated burden per response to comply with this mandatory information collection

EXPIRES 7-31-2004

1. FACILITY NAME

LICENSEE EVENT REPORT (LER) (See reverse for required number of

digits/characters for each block)

CALLAWAY PLANT UNIT 1

request: 50 hours Reported lessons learned are incorporated into the licensing process and fed back to industry Send comments regarding burden estimate to the Records Management Branch (T-6 E6), U.S. Nuclear Regulatory Commission, Washington, DC 20555-0001, or by internet e-mail to bjs1@nrc gov, and to the Desk Officer, Office of Information and Regulatory Affairs, NEOB-10202 (3150-0104), Office of Management and Budget, Washington, DC 20503 If a means used to impose information collection does not display a currently valid OMB control number, the NRC may not conduct or sponsor, and a person is not required to respond to, the information collection

2. DOCKET NUMBER 05000 483 3. PAGE 1 OF 3

4. TITLE

RPS actuation in Mode 4 while performing TADOT testing

5 EVEN	6. LER NUMBER			7. REPORT DATE			8 OTHER FACILITIES INVOLVED							
				SEQUENTIAL	REV				FACILITY NAME		DOCKET NUMBER 05000			
MO	DAY	YEAR	YEAR	NUMBER	NO	МО	DAY	YEAR	FACILITY NAME					
11	21	2002	2002			01	17	2003			DOCKET NUMBER 05000			
9. OPERATING MODE			11. THIS REPORT IS SUBMITTED PURSUANT TO THE REQUIREMENTS OF 10 CFR 1: (Check all that apply)											
		4	20	20 2201(b) 20 2203(a)(3)(II)			(11)	<u> </u>	50 73(a)(2)(II)(B)	1	50 73(a)(2)(ıx)(A)			
10. POWER		-	20.	2201(d)		20 2203(a)(4)				50 73(a)(2)(iii)	١.	50 73(a)(2)(x)		
10. POWE	1	0		2203(a)(1)		50 36(c)(1)(i)(A)			Х	50 73(a)(2)(iv)(A)		73 71(a)(4)		
			20 2203(a)(2)(i)			50 36(c)(1)(ii)(A)			50 73(a)(2)(v)(A)		73 71(a)(5)			
				2203(a)(2)(ii)		50 36(c)(2)			50 73(a)(2)(v)(B)		OTHER			
			20 2203(a)(2)(iii)			50.46(a)(3)(ii)			50.73(a)(2)(v)(C)		Specify in Abstract below or ii NRC Form 366A			
			20	2203(a)(2)(ıv)		50.73(a)(2)(i)(A) 50 73(a)(2)(i)(B) 50 73(a)(2)(i)(C)		A)	1	50.73(a)(2)(v)(D)	1			
			20	2203(a)(2)(v)					50 73(a)(2)(vii)	」 》				
			20	2203(a)(2)(vi)				50 73(a)(2)(viii)(A)		- *				
			20	2203(a)(3)(ı)		50 73	a)(2)(ii)	(A)	(A) 50 73(a)(2)(VIII)(B)					

12. LICENSEE CONTACT FOR THIS LER

NAME

Mark A. Reidmeyer

TELEPHONE NUMBER (Include Area Code)

(573) 676-4306

13. COMPLETE ONE LINE FOR EACH COMPONENT FAILURE DESCRIBED IN THIS REPORT REPORTABLE REPORTABLE MANU-**FACTURER** SYSTEM COMPONENT TO EPIX FACTURER COMPONENT TO EPIX SYSTEM CAUSE MONTH 15. EXPECTED DAY YEAR 14. SUPPLEMENTAL REPORT EXPECTED **SUBMISSION** YES (If yes, complete EXPECTED SUBMISSION DATE) x No

16. ABSTRACT (Limit to 1400 spaces, i e, approximately 15 single-spaced typewritten lines)

At 2156, 11/21/02, with Callaway Plant in Mode 4 at zero percent power, an unplanned actuation of "B" Reactor (Rx) Trip Breaker occurred while performing plant procedure OSP-SB-0002B, Reactor Trip Breaker 'B' TADOT (Trip Actuating Device Operational Test) - Shutdown. At step 6.4.9.2, the Solid State Protection System (SSPS) logic testing switch "A" was inadvertently mispositioned, which activated permissive P-10. This in turn activated permissive P-7, which enabled the Low Pressurizer Pressure Reactor Trip set at 1885 psig. With the Reactor Coolant System (RCS) at approximately 970 psig, a low pressure was sensed, processed by SSPS, and a trip signal sent which opened the "B" Rx Trip Breaker. Since the plant was already shutdown, no adverse consequences resulted. An Event Review Team (ERT) was convened to review the event. It was determined that the event was due to human error caused by over-rotating the SSPS logic switch. Proposed corrective actions include a procedure enhancement on test switch alignment and manipulations

NRC FORM 366AU.S. NUCLEAR REGULATORY COMMISSION

(1-2001)

LICENSEE EVENT REPORT (LER)

FACILITY NAME (1)	FACILITY NAME (1) DOCKET (2) NUMBER (2)					LER NUMBER (6)					
		YEAR	s	EQUENTIA NUMBER	AL.	REVISION NUMBER					
Callaway Plant Unit 1	05000483	2002	-	013	-	00	2	OF	3		

NARRATIVE (If more space is required, use additional copies of NRC Form 366A) (17)

I. DESCRIPTION OF THE REPORTABLE EVENT

A. REPORTABLE EVENT CLASSIFICATION

This event was determined to be reportable per 10 CFR 50 73(a)(2)(iv)(A), System Actuation.

B. PLANT OPERATING CONDITIONS PRIOR TO THE EVENT

This event occurred while in Refuel 12 with Callaway Plant in Mode 4 at zero percent power. Both Rod Drive Motor Generator sets were secured and control rods were incapable of being withdrawn.

C. STATUS OF STRUCTURES, SYSTEMS OR COMPONENTS THAT WERE INOPERABLE AT THE START OF THE EVENT AND THAT CONTRIBUTED TO THE EVENT

Not Applicable for this event.

D. NARRATIVE SUMMARY OF THE EVENT, INCLUDING DATES AND APPROXIMATE TIMES

At 2156, 11/21/02, with Callaway Plant in Mode 4 at zero percent power, an unplanned actuation of "B" Reactor (Rx) Trip Breaker occurred while performing plant procedure OSP-SB-0002B, Reactor Trip Breaker 'B' TADOT-Shutdown.

Prior to performing the procedure, a pre-job brief was conducted due to the critical nature of the test to be performed. During the pre-job brief Operating Experience (OE) was covered discussing the potential results of mispositioning these SSPS logic testing switches. These switches are multiposition selector switches that can be rotated 360 degrees either counterclockwise or clockwise.

At step 6.4.9.2, the Solid State Protection System (SSPS) logic testing switch "A" was inadvertently mispositioned by over-rotating the switch one position counterclockwise, which activated normally blocked permissive P-10. This in turn activated permissive P-7, which enabled the Low Pressurizer Pressure Reactor Trip set at 1885 psig. With the Reactor Coolant System (RCS) at approximately 970 psig, a low pressure was sensed, processed by SSPS, and a trip signal sent which opened the "B" Rx Trip Breaker. Additionally, P-10 also blocked source range high voltage and thus Source Range (SR) channel N-32 was de-energized. Since both Rod Drive Motor Generators were secured and control rod withdrawal was not possible, the loss of SR N32 did not violate Technical Specification 3.3.1, Table 3.3.1-1 Function 5.

Upon mispositioning the switch, the licensed operator immediately recognized the error and stopped all further procedure performance. The Control Room staff was immediately aware of the error due to receiving unexpected alarm annunciators. A meeting was held with Operations and Instrument and Control personnel to discuss what had occurred and determine how to restore from the event. Once a plan of action was established, restoration was performed as expected and the procedure was then successfully completed

Since the plant was already shutdown, no adverse consequences resulted. An Event Review Team (ERT) was convened to review the event. It was determined that the event was due to human error caused by over-rotating the SSPS logic switch. Proposed corrective actions include a procedure enhancement on test switch alignment and manipulations.

E. METHOD OF DISCOVERY OF EACH COMPONENT, SYSTEM FAILURE, OR PROCEDURAL ERROR

Upon mispositioning the SSPS Logic Switch, the Licensed Operator recognized the error and immediately stopped The Control Room was immediately aware of the problem due to unexpected alarm annunciators being received.

NRC FORM 366AU.S. NUCLEAR REGULATORY COMMISSION

(1-2001)

LICENSEE EVENT REPORT (LER)

FACILITY NAME (1)	DOCKET (2) NUMBER (2)	L	ER NUMBER (6)	PAGE (3)			
College Plant Unit 4		YEAR	SEQUENTIAL NUMBER	REVISION NUMBER			
Callaway Plant Unit 1	05000483	2002	- 013 -	00	3	OF	3

NARRATIVE (If more space is required, use additional copies of NRC Form 366A) (17)

II. EVENT DRIVEN INFORMATION

A. SAFETY SYSTEMS THAT RESPONDED

The Reactor Protection System (RPS) sensed an actual plant parameter that satisfied the criteria for generating an actuation signal and responded appropriately.

B. DURATION OF SAFETY SYSTEM INOPERABILITY

Not Applicable for this event.

C. SAFETY CONSEQUENCES AND IMPLICATIONS OF THE EVENT.

At the time of this event, the plant was shutdown in Mode 4 with all rods fully inserted and both rod drive motor generator sets de-energized. There was no safety consequence due to this event.

III. CAUSE OF THE EVENT

The cause of the event was human error when positioning the SSPS Logic Switch.

IV. CORRECTIVE ACTIONS

Proposed corrective actions include a procedure enhancement on test switch alignment and manipulations

V. PREVIOUS SIMILAR EVENTS

There has been one similar LER, 2001-001-00, event involving TADOT testing This occurred on 1/21/01 when a non-licensed individual failed to perform a step within a plant procedure, which resulted in the actuation of the "A" Rx Trip Breaker.

A review of the Callaway Action Request (CAR) system for the previous three years only identified one CAR, 200100116, which documents the event described in the above mentioned LER

VI. <u>ADDITIONAL INFORMATION</u>

The system and component codes listed below are from the IEEE Standard 805-1984 and IEEE Standard 803A-1984 respectively.

System:

NOT APPLICABLE – THIS EVENT WAS NOT CAUSED BY COMPONENT OR SYSTEM FAILURE Component: