POW 28-06-01-01

NRC Form 366
(9-83)

U.S. NUCLEAR REGULATORY COMMISSION
APPROVED OMB NO. 3150-0104
EXPIRES: 8/31/85

LICENSEE EVENT REPORT (LER)

FACILITY NAME (1)	DOCKET NUMBER (2)	PAGE (3)
SURRY POWER STATION, UNIT 2	0 5 0 0 0 2 8 1	1 OF 0 3

TITLE (4)

REACTOR TRIP BY TURBINE TRIP

EVENT DATE (5)			LER NUMBER (6)				REPORT DATE (7)			OTHER FACILITIES INVOLVED (8)	
MONTH	DAY	YEAR	YEAR	SEQUENTIAL NUMBER		REVISION NUMBER	MONTH	DAY	YEAR	FACILITY NAMES	DOCKET NUMBER(S)
1 2	1 6	8 4	8 4	0 2 1		0 0	0 1	1 5	8 5		0 5 0 0 0
											0 5 0 0 0

OPERATING MODE (9)		THIS REPORT IS SUBMITTED PURSUANT TO THE REQUIREMENTS OF 10 CFR §: (Check one or more of the following) (11)			
N		20.402(b)	20.405(c)	√ 50.73(a)(2)(iv)	73.71(b)
POWER LEVEL (10)	0 2 0	20.405(a)(1)(i)	50.36(c)(1)	50.73(a)(2)(v)	73.71(c)
		20.405(a)(1)(ii)	50.36(c)(2)	50.73(a)(2)(vii)	OTHER (Specify in Abstract below and in Text, NRC Form 366A)
		20.405(a)(1)(iii)	50.73(a)(2)(i)	50.73(a)(2)(viii)(A)	
		20.405(a)(1)(iv)	50.73(a)(2)(ii)	50.73(a)(2)(viii)(B)	
		20.405(a)(1)(v)	50.73(a)(2)(iii)	50.73(a)(2)(x)	

LICENSEE CONTACT FOR THIS LER (12)

NAME	TELEPHONE NUMBER
	AREA CODE
R. F. SAUNDERS, STATION MANAGER	8 0 4 3 5 7 - 3 1 8 4

COMPLETE ONE LINE FOR EACH COMPONENT FAILURE DESCRIBED IN THIS REPORT (13)

CAUSE	SYSTEM	COMPONENT	MANUFACTURER	REPORTABLE TO NPRDS		CAUSE	SYSTEM	COMPONENT	MANUFACTURER	REPORTABLE TO NPRDS	

SUPPLEMENTAL REPORT EXPECTED (14)		EXPECTED SUBMISSION DATE (15)	MONTH	DAY	YEAR
YES (If yes, complete EXPECTED SUBMISSION DATE)	√ NO				

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

On December 16, 1984, with unit 2 at approximately 20% power and ramping down for a secondary system repair, the unit tripped when the breakers for B Main Feed pump opened. At the time of the unit trip, no valid trip condition existed for B main feed pump.

From an investigation of the pump trip circuitry and operators observations, it is believed the pump tripped due to an invalid low flow condition coincident with the feed pump recirculation valve closed.

The trip circuitry of the pump was tested satisfactorily. During subsequent unit 2 ramps, the pump protection circuitry operated satisfactorily.

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NRC Form 366A (9-83)

LICENSEE EVENT REPORT (LER) TEXT CONTINUATION

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TEXT (If more space is required, use additional NRC Form 366A's) (17)

1. Description of the Event

On December 16, 1984, with unit 2 at approximately 20% power and ramping down for a secondary system repair, the unit tripped when the breakers for B main feed pump opened. At the time of the unit trip, no valid trip conditions existed for B main feed pump. The feed pump recirculation control valve was observed to remain closed during the event. Following the trip, all control and protection systems functioned as expected.

Operators followed appropriate plant procedures and quickly stabilized the plant following the trip.

2. Safety Consequences and Implications

The capability to supply feedwater to the generators is normally provided by the operation of the condensate and feedwater systems. In the event the normal feedwater supply is lost, residual heat removal would continue to be assured by the availability of either the steam driven auxiliary feedwater pump or one of the motor driven auxiliary feedwater pumps and the 110,000 gallon condensate storage tank. In addition, all other safety related parameters remained within the bounds of the accident analysis. Therefore, this event did not constitute an unreviewed safety question nor affect the health and safety of the public.

3. Cause

From an investigation of the pump trip circuitry and operator observations of plant conditions, it is believed the pump tripped due to an invalid low flow condition in coincidence with the feed pump recirculation valve closed.

4. Immediate Corrective Action

Operators performed all appropriate Emergency Procedures and Function Restoration Procedures to ensure the plant was returned to a stable condition.

Also, the STA performed the status tree reviews to ensure specific plant parameters were noted and appropriate procedures were used to maintain those parameters within safe bounds.

5. Additional Corrective Actions

Following the B main feed pump trip, the pump trip circuits for low lube oil pressure, low pump suction pressure, and low pump flow in coincidence with the recirculation valve not open were tested satisfactorily. Prior to the unit trip, annunciators for low lube oil pressure, low pump suction pressure and the pump over-current trip were not present.

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TEXT (If more space is required, use additional NRC Form 366A's) (17)

In addition, the feed pump breakers were found to have no overcurrent or ground conditions. During subsequent unit 2 ramp downs and return to power, the pump protection circuitry operated satisfactorily.

6. Action Taken to Prevent Recurrence

None deemed necessary.

7. Generic Implications

None.

Vepco

VIRGINIA ELECTRIC AND POWER COMPANY
Surry Power Station
P. O. Box 315
Surry, Virginia 23883

Serial No: 84-045

January 15, 1985

Docket No: 50-281

License No: DPR-37

U. S. Nuclear Regulatory Commission
Document Control Desk
016 Phillips Building
Washington, D.C. 20555

Gentlemen:

Pursuant to Surry Power Station Technical Specifications, the Virginia Electric and Power Company hereby submits the following Licensee Event Report for Surry Unit 2.

REPORT NUMBER

84-021-00

This report has been reviewed by the Station Nuclear Safety and Operating Committee and will be reviewed by Safety Evaluation and Control.

Very truly yours,

R F Saunders

R. F. Saunders
Station Manager

Enclosure

cc: Mr. James P. O'Reilly
Regional Administrator
Suite 2900
101 Marietta Street, NW
Atlanta, Georgia 30323

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