REGULATORY INFORMATION DISTRIBUTION SYSTEM (RIDS)

ACCESSION NBR:9612270151 DOC.DATE: 96/12/23 NOTARIZED: NO DOCKET #
FACIL:50-400 Shearon Harris Nuclear Power Plant, Unit 1, Carolina 05000400
AUTH.NAME AUTHOR AFFILIATION
VERRILLI,M. Carolina Power & Light Co.
DONAHUE,J.W. Carolina Power & Light Co.
RECIP.NAME RECIPIENT AFFILIATION

SUBJECT: LER 96-022-00:on 961122,wiring discrepancy was found in auxiliary building ventilation sys circuitry.Caused by personnel error.Training on this event will also be performed for appropriate maintenance.W/961220 ltr.

DISTRIBUTION CODE: IE22T COPIES RECEIVED:LTR 1 ENCL 1 SIZE: 5
TITLE: 50.73/50.9 Licensee Event Report (LER), Incident Rpt, etc.

NOTES:Application for permit renewal filed. 05000400

	RECIPIENT ID CODE/NAME	COPIES LTTR	COPIES ENCL	RECIPIENT ID CODE/NAME	COPIES LTTR	COPIES ENCL
	PD2-1 PD	1	1	LE,N	1	1
INTERNAL:	ACRS	1	1	AEOD/SPD/RAB	2	2
	AEOD/SPD/RRAB	2	2	FILE CENTER	1	1
	NRR/DE/ECGB	1	1	NRR/DE/EELB	1	1
	NRR/DE/EMEB	1	1	NRR/DRCH/HHFB	1	1
	NRR/DRCH/HICB	1	1	NRR/DRCH/HOLB	1	1
	NRR/DRCH/HQMB	1	1	NRR/DRPM/PECB	1	1
	NRR/DSSA/SPLB	1	1	NRR/DSSA/SRXB	1	1
	RES/DET/EIB	1	1	RGN2 FILE 01	1	1
EXTERNAL:	L ST LOBBY WARD	1	1	LITCO BRYCE,J H	1	1
	NOAC MURPHY,G.A	1	1	NOAC POORE,W.	1	1
	NRC PDR	1	1	NUDOCS FULL TXT	1	1

CATEGORY 1 DOCUMENT

NOTE TO ALL "RIDS" RECIPIENTS:
PLEASE HELP US TO REDUCE WASTE! CONTACT THE DOCUMENT CONTROL DESK, ROOM OWFN 5D-5(EXT. 415-2083) TO ELIMINATE YOUR NAME FROM DISTRIBUTION LISTS FOR DOCUMENTS YOU DON'T NEED!

FULL TEXT CONVERSION REQUIRED
TOTAL NUMBER OF COPIES REQUIRED: LTTR 26 ENCL 26

A04

CP&L

Carolina Power & Light Company
Harris Nuclear Plant
PO Box 165
New Hill NC 27562

DEC 20 1996

U.S. Nuclear Regulatory Commission
ATTN: NRC Document Control Desk
Washington, DC 20555

Serial: HNP-96-210
10CFR50.73

SHEARON HARRIS NUCLEAR POWER PLANT UNIT 1
DOCKET NO. 50-400
LICENSE NO. NPF-63
LICENSEE EVENT REPORT 96-022-00

Sir or Madam:

In accordance with Title 10 to the Code of Federal Regulations, the enclosed Licensee Event Report is submitted. This report describes a wiring discrepancy found in the Reactor Auxiliary Building Ventilation System.

Sincerely,

J. W. Donahue
Director of Site Operations
Harris Plant

MV

Enclosure

c: Mr. J. B. Brady (HNP Senior NRC Resident)
Mr. S. D. Ebneter (NRC Regional Administrator, Region II)
Mr. N. B. Le (NRC - NRR Project Manager)

IE22

cc: Mr. R. T. Biggerstaff
Ms. P. B. Brannan
Mr. H. K. Chernoff (RNP)
Mr. B. H. Clark
Mr. J. M. Collins
Mr. G. W. Davis
Ms. S. F. Flynn
Mr. H. W. Habermeyer
Mr. M. D. Hill
Mr. W. J. Hindman
Ms. C. W. Hobbs (HEEC)
Ms. W. C. Langston
Mr. C. W. Martin (BNP)
Mr. R. D. Martin
Mr. J. W. McKay
Mr. P. M. Odom (RNP)
Mr. W. R. Robinson
Mr. G. A. Rolfson
Mr. R. F. Saunders
Mr. R. S. Stancil
Mr. C. N. Sweely
Mr. M. A. Turkall
Mr. J. P. Thompson (BNP)
Mr. T. D. Walt
Mr. R. L. Warden (RNP)
HNP Real Time Training
INPO
Harris Licensing File
Nuclear Records

NRC FORM 366 (4-95) U.S. NUCLEAR REGULATORY COMMISSION

APPROVED BY OMB NO. 3150-0104
EXPIRES 04/30/98

ESTIMATED BURDEN PER RESPONSE TO COMPLY WITH THIS MANDATORY INFORMATION COLLECTION REQUEST: 50.0 HRS. REPORTED LESSONS LEARNED ARE INCORPORATED INTO THE LICENSING PROCESS AND FED BACK TO INDUSTRY. FORWARD COMMENTS REGARDING BURDEN ESTIMATE TO THE INFORMATION AND RECORDS MANAGEMENT BRANCH (T-6 F33), U.S. NUCLEAR REGULATORY COMMISSION, WASHINGTON, DC 20555-0001, AND TO THE PAPERWORK REDUCTION PROJECT (3150-0104), OFFICE OF MANAGEMENT AND BUDGET, WASHINGTON, DC 20503.

LICENSEE EVENT REPORT (LER)

(See reverse for required number of digits/characters for each block)

FACILITY NAME (1)	DOCKET NUMBER (2)	PAGE (3)
Harris Nuclear Plant Unit-1	50-400	1 OF 3

TITLE (4)

Wiring discrepancy found in Reactor Auxiliary Buiding Ventilation System circuitry.

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 NAME	DOCKET NUMBER
11	22	96	96	-- 022 --	0	12	23	96	FACILITY NAME	DOCKET NUMBER 05000

OPERATING MODE (9)	1
POWER LEVEL (10)	100%

THIS REPORT IS SUBMITTED PURSUANT TO THE REQUIREMENTS OF 10 CFR §: (Check one or more) (11)

	20.2201(b)		20.2203(a)(2)(v)	X	50.73(a)(2)(i)		50.73(a)(2)(viii)
	20.2203(a)(1)		20.2203(a)(3)(i)		50.73(a)(2)(ii)		50.73(a)(2)(x)
	20.2203(a)(2)(i)		20.2203(a)(3)(ii)		50.73(a)(2)(iii)		73.71
	20.2203(a)(2)(ii)		20.2203(a)(4)		50.73(a)(2)(iv)		OTHER
	20.2203(a)(2)(iii)		50.36(c)(1)		50.73(a)(2)(v)		Specify in Abstract below or in NRC Form 366A
	20.2203(a)(2)(iv)		50.36(c)(2)		50.73(a)(2)(vii)		

LICENSEE CONTACT FOR THIS LER (12)

NAME	TELEPHONE NUMBER (Include Area Code)
Michael Verrilli Sr. Analyst - Licensing	(919) 362-2303

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).	X NO				

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

On November 22, 1996, with the plant operating in Mode 1 at 100% power, a wiring lead was found incorrectly terminated in the Reactor Auxiliary Building Ventilation System. This lead was landed on the wrong relay terminal on August 27, 1996 during installation of a plant modification. The incorrect wiring configuration did not result in any plant transients, alarms or actuations, but did provide a parallel power supply source to two relays which are required to deenergize following a safety injection signal. With the lead landed in the wrong location, the parallel power source would become energized upon receipt of a certain main control room alarm. On November 12, 1996, this alarm occurred resulting in energizing the two relays. With these relays energized from the parallel power supply source, twenty-six A-train dampers that isolate the non-safety related portions of the RAB Ventilation system from the safety-related portion, would not have closed to perform their safety function following a safety injection signal. The relays remained energized until the wiring discrepancy was discovered and corrected on November 22, 1996. The corresponding B-train dampers were operable throughout this period and would have performed the safety related isolation function.

This event was caused by personnel error on the part of the maintenance technician that incorrectly terminated the wiring lead and the quality control technician that verified the work to be correct.

Immediate corrective actions included properly terminating the wiring lead and counseling the involved individuals. Training on this event will also be performed for appropriate maintenance and quality control personnel.

FACILITY NAME (1)	DOCKET	LER NUMBER (6)			PAGE (3)
		YEAR	SEQUENTIAL NUMBER	REVISION NUMBER	
Shearon Harris Nuclear Plant - Unit #1	50-400	96	-- 022 --	00	2 OF 3

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

EVENT DESCRIPTION:

On November 22, 1996, with the plant operating in Mode 1 at 100% power, a wiring lead from annunciator relay E1(2/3151) was found incorrectly terminated in Auxiliary Relay Panel 2A-SA in the Reactor Auxiliary Building Ventilation System circuitry (EIIS Code:VF-RLY). This lead was incorrectly landed on terminal #2 of relay G1(52X2/3177) instead of terminal #1 on August 27, 1996 during installation of a plant modification. The incorrect wiring configuration did not result in any plant transients, alarms, or actuation, but did allow a parallel power supply to the G1 and J1(52X1/3177) relays. With the lead landed in the wrong location, the parallel power source would become energized upon receipt of a RAB Ventilation System alarm located in the main control room on the Auxiliary Equipment Panel (AEP-1).

This path remained deenergized during the time period that no alarm signal was present. However, on November 12, 1996, at approximately 1759 hours, a clearance was placed on one of the twenty-seven A-train RAB Ventilation System dampers that isolate the non-safety related portions of the RAB Ventilation system from the safety-related portion following a safety injection signal. This caused the E1 annunciator relay to energize as expected, which providing a HVAC trouble alarm on AEP-1. This energized the parallel path to the G-1 and J-1 relays. With these two relays energized the other twenty-six A-train RAB dampers would not have closed to perform their safety function following a safety injection signal.

On November 22, 1996 the RAB normal exhaust fans were secured to allow un-related maintenance. Operations personnel observed that the A-train RAB isolation dampers did not shut as expected with all fans secured. Investigation into this condition revealed the wiring discrepancy in ARP 2A-SA. At 1443 hours, the lead was landed correctly restoring the ability of the A-train RAB dampers to perform their safety function following a safety injection signal.

The period of time between November 12, 1996 (1759 hours) and November 22, 1996 (1443 hours) when the lead was incorrectly landed and the relays were energized, exceeded the seven day allowed outage time for the RAB Emergency Exhaust System per Technical Specification 3.7.7.

CAUSE:

The cause of this event was personnel error on the part of the maintenance technician that incorrectly terminated the wiring lead in ARP 2A-SA and the quality control technician that verified the work to be correct. Proper self-checking techniques were not applied. Both individuals are experienced utility personnel and the work package that was being used provided adequate guidance.

SAFETY SIGNIFICANCE:

The safety consequences associated with this event were minimal. The wiring discrepancy affected only the A-train RAB Ventilation System dampers. The B-train dampers were available to perform the safety function of isolating the non-safety related portion of the system from the safety-related portion.

This condition is being reported in accordance with 10CFR50.73.a.2.i.B. as a violation of Technical Specification 3.7.7.

PREVIOUS SIMILAR EVENTS:

There have been no previous similar personnel error events reported due to incorrectly landed leads which resulted in disabling a safety function and subsequent Technical Specification violation.

FACILITY NAME (1)	DOCKET	LER NUMBER (6)			PAGE (3)
		YEAR	SEQUENTIAL NUMBER	REVISION NUMBER	
Shearon Harris Nuclear Plant - Unit #1	50-400	96	-- 022 --	00	3 OF 3

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

CORRECTIVE ACTIONS COMPLETED:

1. The wiring discrepancy in ARP 2A-SA was discovered and corrected on November 22, 1996.

2. A review of other leads landed while installing the plant modification in August 1996 was performed during the event investigation. No other problems were identified.

3. The Maintenance and QC individuals involved were counseled following the event.

CORRECTIVE ACTIONS PLANNED:

1. The involved individuals will provide training on this event to other appropriate Maintenance and QC personnel. This training will be completed by January 31, 1997.