D 08/[illegible]/78

REGULATORY INFORMATION DISTRIBUTION SYSTEM (RIDS)
DISTRIBUTION FOR INCOMING MATERIAL 50-335

REC: OREILLY J P
NRC

ORG: SCHMIDT A D
FL PWR & LIGHT

DOCDATE: 07/24/78
DATE RCVD: 08/01/78

DOCTYPE: LETTER NOTARIZED: NO

COPIES RECEIVED
LTR 1 ENCL 1

SUBJECT:
FORWARDING LICENSEE EVENT REPT (RO 50-335/78-024) ON 06/25/78 CONCERNING DURING PLANT STARTUP FROM A SHORT MAINTENANCE , DOSE EQUIVALENT IODINE EXCEEDED TECH SPEC 3.4.8.A LIMIT OF 1.0 UCI/GRAM DOSE EQUIVALENT I-131... W/ATT.

PLANT NAME: ST LUCIE #1

REVIEWER INITIAL: XJM
DISTRIBUTOR INITIAL: DL

********** DISTRIBUTION OF THIS MATERIAL IS AS FOLLOWS **********

INCIDENT REPORTS
(DISTRIBUTION CODE A002)

FOR ACTION: BR CHIEF ORB#4 BC**W/4 ENCL

INTERNAL:
REG FILE**W/ENCL
I & E**W/2 ENCL
I & C SYSTEMS BR**W/ENCL
NOVAK/CHECK**W/ENCL
AD FOR ENG**W/ENCL
HANAUER**W/ENCL
AD FOR SYS & PROJ**W/ENCL
ENGINEERING BR**W/ENCL
KREGER/J. COLLINS**W/ENCL
K SEYFRIT/IE**W/ENCL
NRC PDR**W/ENCL
MIPC**W/3 ENCL
EMERGENCY PLAN BR**W/ENCL
EEB**W/ENCL
PLANT SYSTEMS BR**W/ENCL
AD FOR PLANT SYSTEMS**W/ENCL
REACTOR SAFETY BR**W/ENCL
VOLLMER/BUNCH**W/ENCL
POWER SYS BR**W/ENCL

EXTERNAL:
LPDR'S
FT PIERCE, FL**W/ENCL
TIC, LIZ CARTER**W/ENCL
NSIC**W/ENCL
ACRS CAT B**W/16 ENCL

DISTRIBUTION: LTR 45 ENCL 45
SIZE: 1P+1P+3P

CONTROL NBR: 782140106 A0 4 GD

********** THE END **********

FLORIDA POWER & LIGHT COMPANY

July 24, 1978

PRN-LI-78-198

Mr. James P. O'Reilly, Director, Region II
Office of Inspection and Enforcement
U. S. Nuclear Regulatory Commission
230 Peachtree Street, N. W., Suite 1217
Atlanta, Georgia 30303

Dear Mr. O'Reilly:

REPORTABLE OCCURRENCE 335-78-24
ST. LUCIE UNIT 1
DATE OF OCCURRENCE: JUNE 25, 1978

TECHNICAL SPECIFICATION 3.4.8.a
DOSE EQUIVALENT I-131

The attached Licensee Event Report is being submitted in accordance with Technical Specification 6.9 to provide 30-day notification of the subject occurrence.

Very truly yours,

A. D. Schmidt
Vice President
Power Resources

MAS/cpc

Attachment

cc: Harold F. Reis, Esquire
Director, Office of Inspection and Enforcement (30)
Director, Office of Management Information and Program Control (3)

782140106

A002
S 1/1

PEOPLE . . . SERVING PEOPLE

NRC FORM 366
(7-77)

U. S. NUCLEAR REGULATORY COMMISSION

LICENSEE EVENT REPORT

CONTROL BLOCK: [ ] (1) (PLEASE PRINT OR TYPE ALL REQUIRED INFORMATION)

01 | FLLSLS1 (2) | 010-0000-010 (3) | 4111 (4) | (5)

LICENSEE CODE — LICENSE NUMBER — LICENSE TYPE — CAT

CON'T

01 | REPORT SOURCE L (6) | 015 0 0 0 3 3 5 (7) | 0 6 2 5 7 8 (8) | 0 7 2 4 7 8 (9)

DOCKET NUMBER — EVENT DATE — REPORT DATE

EVENT DESCRIPTION AND PROBABLE CONSEQUENCES (10)

02 | During plant startup from a short (16-hour) maintenance shutdown, Dose
03 | Equivalent (DEQ) Iodine exceeded the Technical Specification 3.4.8.a limit
04 | of 1.0 μCi/gram DOSE EQUIVALENT I-131. The DEQ Iodine was first measured
05 | above this limit at 1900 on 6/25/78 while the plant was at 97% power. The
06 | attached sheets contain the information required by Technical Specification
07 | 3.4.8.a. A previous occurrence of this type is described in LER 335-78-13
08 |

09 | SYSTEM CODE CG (11) | CAUSE CODE E (12) | CAUSE SUBCODE X (13) | COMPONENT CODE FUELXX (14) | COMP. SUBCODE Z (15) | VALVE SUBCODE Z (16)

(17) LER/RO REPORT NUMBER: EVENT YEAR 78 — SEQUENTIAL REPORT NO. 024 — OCCURRENCE CODE 03 — REPORT TYPE L — REVISION NO. 0

ACTION TAKEN Z (18) | FUTURE ACTION Z (19) | EFFECT ON PLANT Z (20) | SHUTDOWN METHOD Z (21) | HOURS 0000 (22) | ATTACHMENT SUBMITTED Y (23) | NPRD-4 FORM SUB. N (24) | PRIME COMP. SUPPLIER N (25) | COMPONENT MANUFACTURER C490 (26)

CAUSE DESCRIPTION AND CORRECTIVE ACTIONS (27)

10 | After an extended period of power operation with a nominal level of fuel
11 | leakage, the plant shutdown and subsequent startup transients were
12 | sufficient to cause Iodine build up (Iodine spiking phenomenon) and
13 | exceed the purification capacity for a short period of time.
14 |

15 | FACILITY STATUS E (28) | % POWER 097 (29) | OTHER STATUS (30) NA | METHOD OF DISCOVERY A (31) | DISCOVERY DESCRIPTION (32) Operator Observation

16 | ACTIVITY RELEASED Z (33) | CONTENT OF RELEASE Z (34) | AMOUNT OF ACTIVITY (35) NA | LOCATION OF RELEASE (36) NA

17 | PERSONNEL EXPOSURES NUMBER 0000 (37) | TYPE Z (38) | DESCRIPTION (39) NA

18 | PERSONNEL INJURIES NUMBER 000 (40) | DESCRIPTION (41) NA

19 | LOSS OF OR DAMAGE TO FACILITY TYPE Z (42) | DESCRIPTION NA

20 | PUBLICITY ISSUED N (44) | DESCRIPTION (45) NA | NRC USE ONLY

NAME OF PREPARER M. A. Schoppman PHONE: (305) 552-3802

SUPPLEMENTARY INFORMATION
TECHNICAL SPECIFICATION REPORT
DOSE EQUIVALENT IODINE

1. Reactor power history starting 48 hours prior to the first sample in which the limit was exceeded.

DATE	TIME	AVERAGE REACTOR POWER
6/23/78	1900 to	97.1% (steady state)
6/24/78	2000	
6/24/78	2100	61.0%
6/24/78	2200	20.0%
6/24/78	2300 to	0.0% (plant outage)
6/25/78	1400	
6/25/78	1500	38.5%
6/25/78	1600	66.3%
6/25/78	1700	90.0%
6/25/78	1800	95.0%
6/25/78	1900**	97.0%

Additional Power History: 20% - 80% from June 1 to June 12, 1978
98% - 100% from June 13 to June 24, 1978
(DEQ I-131; 2.0 - 4.5 E-1 μCi/gram)

**First DEQ Iodine Sample >1.0 uCi/gram.

SUPPLEMENTARY INFORMATION (Cont)

2. Fuel burnup by core region.

Fuel burnup by octants:

Region 1	-	10945.0	
Region 2	-	10893.7	
Region 3	-	10781.0	Average Burnup in
Region 4	-	10876.5	Megawatt Days per
Region 5	-	10783.6	Metric Ton Uranium
Region 6	-	10798.3	(MWD/MTU)
Region 7	-	10752.0	
Region 8	-	10868.8	

Total Core Average Burnup - 10837.4

3. Clean-up flow history starting 48 hours prior to the first sample in which the limit was exceeded.

From 1900 on 6/23/78 until 2100 on 6/24/78, purification flow rate was ∿82 gpm (two charging pumps).

At 2300 on 6/24/78, purification flow rate was reduced to 52 gpm.

From 2400 on 6/24/78 until 0300 on 6/25/78, purification flow rate was ∿40 gpm (one charging pump).

At 0400 on 6/25/78, purification flow rate was increased to 58 gpm.

From 0500 on 6/25/78 until 1900 on 6/25/78, purification flow rate was ∿86 gpm (two charging pumps).

NOTE: Clean-up demineralization consisted of a mixed bed at a 1:1 ratio, cation to anion, with a bed volume of 36 cubic feet.

4. History of de-gassing operation starting 48 hours prior to the first sample in which the limit was exceeded.

No degassing operations were performed within the above 48-hour time span.

SUPPLEMENTARY INFORMATION (Cont)

5. The time duration when the specific activity of the primary coolant exceeded 1.0 uCi/gram DEQ I-131.

Iodine 131 Dose Equivalent was greater than 1.0 uCi/gram from 6/25/78 at 1900 until 6/26/78 at 0030. The total time above 1.0 uCi/gram was 5.50 hours.

6. Results of Specific Activity Analysis (uCi/gram).

DATE	TIME	I-131	I-132	I-133	I-135	DEQ
6/25/78	0215	2.249 E-1	9.64 E-2	3.322 E-1	1.311 E-1	3.291 E-1
6/25/78	1900	1.024 E-0	8.12 E-2	6.963 E-1	9.04 E-2	1.222 E-0
6/25/78	2010	1.120 E-0	7.38 E-2	7.500 E-1	9.33 E-2	1.333 E-0
6/26/78	0030	7.736 E-1	3.01 E-2	4.724 E-1	4.92 E-2	9.064 E-1
6/26/78	0615	4.708 E-1	1.93 E-2	2.393 E-1	3.01 E-2	5.386 E-1