U.S. NUCLEAR REGULATORY COMMISSION

LICENSEE EVENT REPORT

CONTROL BLOCK / / / / / / / / (1) (PLEASE PRINT OR TYPE ALL REQUIRED INFORMATION)

/0/1/ /V/A/N/A/S/1/ (2) /0/0/-/0/0/0/0/0/-/0/0/ (3) /4/1/1/1/1/ (4) / / / (5)
LICENSEE CODE — LICENSE NUMBER — LICENSE TYPE — CAT

/0/1/ REPORT SOURCE /L/ (6) /0/5/0/0/0/3/3/8/ (7) /0/9/1/7/8/2/ (8) /1/0/1/2/8/2/ (9)
DOCKET NUMBER — EVENT DATE — REPORT DATE

EVENT DESCRIPTION AND PROBABLE CONSEQUENCES (10)

/0/2/ / During a review of Chemistry Logs on September 17, 1982, it was discovered that /
/0/3/ / the specific activity of the primary coolant exceeded 1.0 micro ci/gram Dose /
/0/4/ / Equivalent I-131 on 1-23-82. The sample frequency of item 4a of T.S. Table /
/0/5/ / 4.4.-4 was met but the special reporting requirement was overlooked. The health /
/0/6/ / and safety of the public were not affected. This event is reportable pursuant to/
/0/7/ / T.S. 6.9.2.f. /
/0/8/ / /

	SYSTEM CODE	CAUSE CODE	CAUSE SUBCODE	COMPONENT CODE	COMP. SUBCODE	VALVE SUBCODE
/0/9/	/R/C/ (11)	/X/ (12)	/Z/ (13)	/Z/Z/Z/Z/Z/Z/ (14)	/Z/ (15)	/Z/ (16)

	LER/RO REPORT NUMBER	EVENT YEAR	SEQUENTIAL REPORT NO.		OCCURRENCE CODE	REPORT TYPE		REVISION NO.
(17)		/8/2/	/-/	/0/6/1/	/ /	/0/3/	/L/	/-/	/0/

ACTION TAKEN	FUTURE ACTION	EFFECT ON PLANT	SHUTDOWN METHOD	HOURS	ATTACHMENT SUBMITTED	NPRD-4 FORM SUB.	PRIME COMP. SUPPLIER	COMPONENT MANUFACTURER
/X/ (18)	/Z/ (19)	/Z/ (20)	/Z/ (21)	/0/0/0/0/ (22)	/Y/ (23)	/N/ (24)	/N/ (25)	/W/1/2/0/ (26)

CAUSE DESCRIPTION AND CORRECTIVE ACTIONS (27)

/1/0/ / The specific activity increase was due to Iodine 131 migration through pinhole /
/1/1/ / leaks in fuel cladding during a unit ramp down to Mode 2 and subsequent reactor /
/1/2/ / trip during the return to power. The failure to report this event within 30 days/
/1/3/ / was an oversight. Station personnel have been made aware of this event and pro- /
/1/4/ / cedure changes have been made that will ensure the proper review. /

	FACILITY STATUS	%POWER	OTHER STATUS (30)	METHOD OF DISCOVERY	DISCOVERY DESCRIPTION (32)
/1/5/	/E/ (28)	/0/0/0/ (29)	/ NA /	/B/ (31)	/ Chemistry Analysis /

	ACTIVITY RELEASED	CONTENT OF RELEASE	AMOUNT OF ACTIVITY (35)	LOCATION OF RELEASE (36)
/1/6/	/Z/ (33)	/Z/ (34)	/ NA /	/ NA /

	PERSONNEL EXPOSURES NUMBER	TYPE	DESCRIPTION (39)
/1/7/	/0/0/0/ (37)	/Z/ (38)	/ NA /

	PERSONNEL INJURIES NUMBER	DESCRIPTION (41)
/1/8/	/0/0/0/ (40)	/ NA /

	LOSS OF OR DAMAGE TO FACILITY TYPE	DESCRIPTION (43)
/1/9/	/Z/ (42)	/ NA /

	PUBLICITY ISSUED	DESCRIPTION (45)	NRC USE ONLY
/2/0/	/N/ (44)	/ NA /	/ / / / / / / / / / / / / /

NAME OF PREPARER W. R. CARTWRIGHT PHONE (703) 894-5151

Description of Event

On September 17, 1982, during a review of Chemistry Logs by an NRC inspector, it was discovered that on January 23, 1982, the specific activity of the primary coolant exceeded the limit of T.S. 3.4.8.a. The Dose Equivalent I-131 exceeded 1.0 µCi/gm following a controlled unit shutdown to Mode 2 to repair a feedwater heater. During the subsequent turbine restart, the reactor tripped due to an impulse pressure spike which reset the turbine trip/reactor trip permissive.

The duration of the spike as well as the information required by T.S. 3.4.8 is included under Supplemental Information. During a review of Chemistry Logs, this event was discovered. It was also determined that the Special Report required by T.S. 3.4.8 was not submitted. Therefore, this report is being submitted as required by T.S. 3.4.8 pursuant to T.S. 6.9.2.

Probable Consequences of Occurrence

The Unit 1 Cycle 3 Core Performance Report (VEP-FRD-50) identified the existence of pinhole leakage as the probable cause of iodine spiking following a large core transient. In addition the average Dose Equivalent I-131 concentration of 8.2×10^{-2} µCi/gm for the cycle 3 core was less than 9% of the Technical Specification limit. Therefore, the health and safety of the public were not affected.

Cause of Event

This event was caused by an increase in the Iodine 131 cocentration in the RCS following a unit shutdown. The spike was probably caused by pinhole leakage in the fuel elements which becomes aggravated during a transient.

The reporting of this event was not performed within 30 days as required by T.S. 3.4.8 due to an oversight by station personnel.

Immediate Corrective Action

The primary coolant was sampled and analyzed at the frequency required by T.S. Table 4.4-4 and it was verified that the specific activity returned to acceptable limits.

Appropriate station personnel have been reinstructed on the reporting requirements related to this event.

The chemistry periodic tests have been revised for both units to require the submittal of a Deviation Report to the Shift Supervisor in the event of an abnormal chemistry condition.

Scheduled Corrective Action

No further action required.

Action Taken To Prevent Recurrence

No further action required.

Generic Implications

Very slight fuel defect leakage has been experienced with fuel elements of this type, and is not considered abnormal. Therefore, there are no generic implications from this event.

Supplemental Information

DATE	TIME	D.E. I-131 (μCi/gm)	REMARKS
Jan. 23, 1982	0105	7×10^{-2}	Commenced ramp down from 100% RTP
	0305	1×10^{-1}	Mode 2
	0334	3.4×10^{-1}	
	0338		Reactor Trip
	0443	5.36×10^{-1}	
	1202	1.44	Limit exceeded
	1538	1.76	Limit exceeded
	1917	1.80	Limit exceeded
	2315	1.25	Limit exceeded
Jan 24, 1982	0302	7.37×10^{-1}	
	0552	6.57×10^{-1}	Sample frequency returned to normal

1. The power history 48 hours prior to initiating rampdown was about 99.3%.

2. Fuel Burnup by region as of Jan. 23, 1982.

1A3	22,716 MWD/MTU
3A2	27,787 MWD/MTU
4	20,470 MWD/MTU
5	10,936 MWD/MTU

Total as of Jan. 23, 1982 - 9,856 MWD/MTU

3. For the 48 hours prior to the spike, the normal mixed bed demineralizer flow existed; Average 87 gpm.

4. No degassing operations were performed.

5. The duration of the D.E. I-131 levels above the T.S. 3.4.8 limit (1.0 μCi/gm) was about 15 hours.