



UNITED STATES
NUCLEAR REGULATORY COMMISSION
REGION II
101 MARIETTA STREET, N.W., SUITE 2900
ATLANTA, GEORGIA 30323-0199

JAN 27 1994

MEMORANDUM FOR: Ken Barr, RII
Ken Clark, RII
Larry Cohen, NRR
Glen Salyers, RII
William Sartor, RII

FROM: Fred Wright
Emergency Preparedness Team Leader

SUBJECT: FEBRUARY 9, 1994 ST. LUCIE NUCLEAR STATION EXERCISE

This memo transmits the Exercise Scenario Package (Exercise Objectives, Narrative Summary, and Scenario Timeline) and provides work assignments and planning guidance for the St. Lucie Nuclear Station emergency preparedness exercise on February 9, 1994. You are reminded that the Exercise Scenario Package contains confidential information and should be treated as such until after the exercise is terminated. The work assignments are provided as Enclosure 1 to this memo, along with the inspection requirements for your assigned emergency response facility as listed in Inspection Procedure 82301. These assignments are for reference in your planning. Last minute changes may necessitate some minor adjustments; however, the assignments should be consistent with your experience and interest.

The plant site is located near St. Lucie, Florida, with commercial air service available via West Palm Beach, Florida. Lodging reservations are available at:

Holiday Inn Stewart-Jensen Beach, 3793 NE Ocean Blvd. (Hwy 1A1) Jensen Beach, Florida, 34957. The hotel telephone number is 407/225-3000 and the toll free reservation number is 1-800/HOLIDAY, or

Indian River Plantation Beach Resort, 555 N.E. Ocean Blvd. Hutchinson Island. The hotel telephone number is 407/225-3700 and the toll free reservation number is 1-800/444-3389.

Please report to the site Monday, February 7, 1994. The licensee contact at St. Lucie will be Mr. Rick Walker. His business telephone number is (407) 465-3550 X3197. The work location for the team onsite has not yet been determined. Report to the licensee's East Security and Main Badging Building (see Enclosure 2). Contact Mr. Walker to determine working location and report there.

Enclosure 3 is a map of the highway route from West Palm Beach Airport to lodging, EOF, and site locations. Enclosure 4 is a map of the Site area and offsite Emergency Response Facilities.

DD/SI

Multiple Addressees

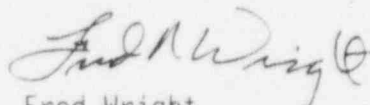
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Preliminary schedule of activities are summarized below:

Monday 2/7/94	1:00 p.m.	Entrance Meeting
	2:00 p.m.	Scenario Review With Licensee Scenario Developers
	4:00 p.m.	Team Meeting
Tuesday 2/8/94	6:45 a.m.	Team to Site
	7:00 a.m.	Exercise Preparation and Emergency Facilities Tour
	4:00 p.m.	Team meeting
Wednesday 2/9/94	6:15 a.m.	Team to Site
	6:45 a.m.	Assume Positions At Assigned Facilities
	7:00 a.m.	Exercise Starts
	2:00 p.m.	Exercise Terminates Observe Player Critiques At Facilities
Thursday 2/10/94	6:45 a.m.	Team to Site
	7:00 a.m.	Prepare Findings for Exit
	8:00 a.m.	Observe Controller/Evaluator Exercise Critiques
	*11:00 a.m.	Public Meeting
	1:00 p.m.	Prepare Findings for Exit
	4:00 p.m.	Team Meeting
Friday 2/11/94	6:30 a.m.	Team to Site
	*9:00 a.m.	Formal Exercise Critique to Management
	*10:00 a.m.	NRC Exit
	11:00 a.m.	Approximate Time for Team Departure from Site

*As of January 25, 1994, the licensee had not established a schedule for these meetings and they may change.

If you have any questions or comments please contact me at (404) 331-3769.


Fred Wright

Enclosures:

1. Team Assignments
2. Site Map
3. Airport to Site Map
4. Site Area and Emergency
Response Facilities Map

cc w/o encls: (See page 3)

Multiple Addressees

3

cc w/o encls:

W. Cline

K. Landis

J. Norris

~~R. Trojanowski~~

ENCLOSURE 1

TEAM ASSIGNMENTS

<u>Observer</u>	<u>Facility</u>	<u>Work Assignment</u>
F. Wright	Site	Team Leader
G. Salyers	Control Room	(a) facility management and control; (b) analysis of plant conditions and corrective action (c) detection and classification of emergency events (d) protective action decision-making (e) notifications and communications (f) implementation of protective actions (g) dose assessment (h) evaluation of post-accident sampling results (i) dispatch and coordination of monitoring teams
W. Sartor	TSC	(a) staffing and activation of TSC (b) facility management and control (c) accident assessment and classification (d) dose assessment (e) protective action decision-making (f) notifications and communications (g) implementation of protective actions (h) assistance and support to Control Room (i) evaluation of post-accident sampling results (j) dispatch and coordination of monitoring teams

Enclosure 1

2

G. Salyers

OSC

- (a) staffing and activation of the OSC
- (b) facility management and control
- (c) performance of support functions

L. Cohen

EOF

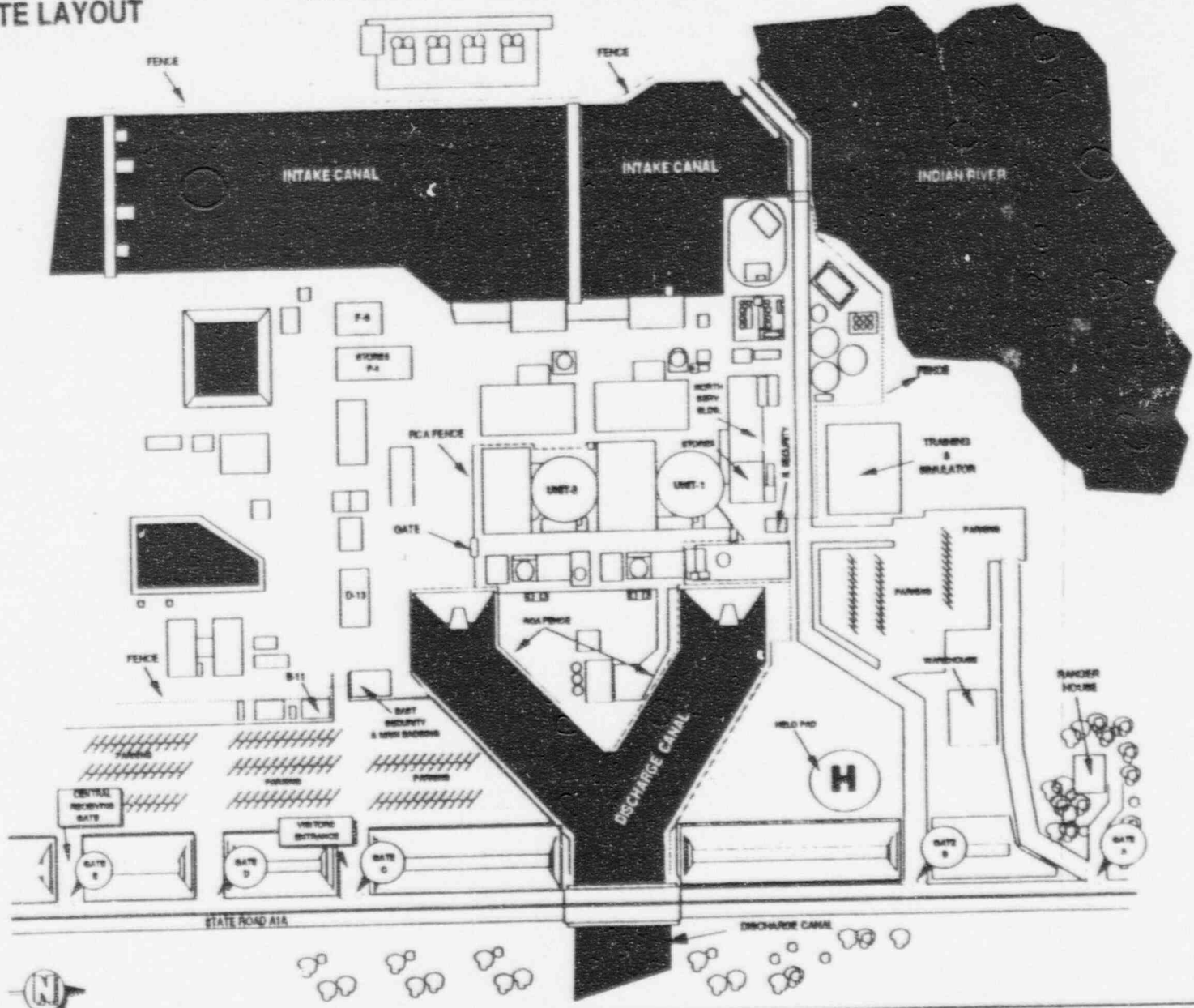
- (a) staffing and activation of the EOF
- (b) facility management and classification
- (c) accident assessment and classification
- (d) offsite dose assessment
- (e) protective dose assessment
- (f) notifications and communications
- (g) implementation of protective actions
- (h) interaction with offsite officials, NRC, and other organizations

K. Clark

ENC

- (a) staffing activation and facility control
- (b) processing and dissemination of information to the media

ST. LUCIE NUCLEAR PLANT SITE LAYOUT



PLANT: **ST. LUCIE**

LOCATION: **Ft. Pierce, FL**

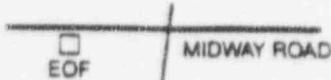
LICENSEE: **Florida Power & Light Co.**

DIRECTIONS FROM WEST PALM BEACH INTERNATIONAL:

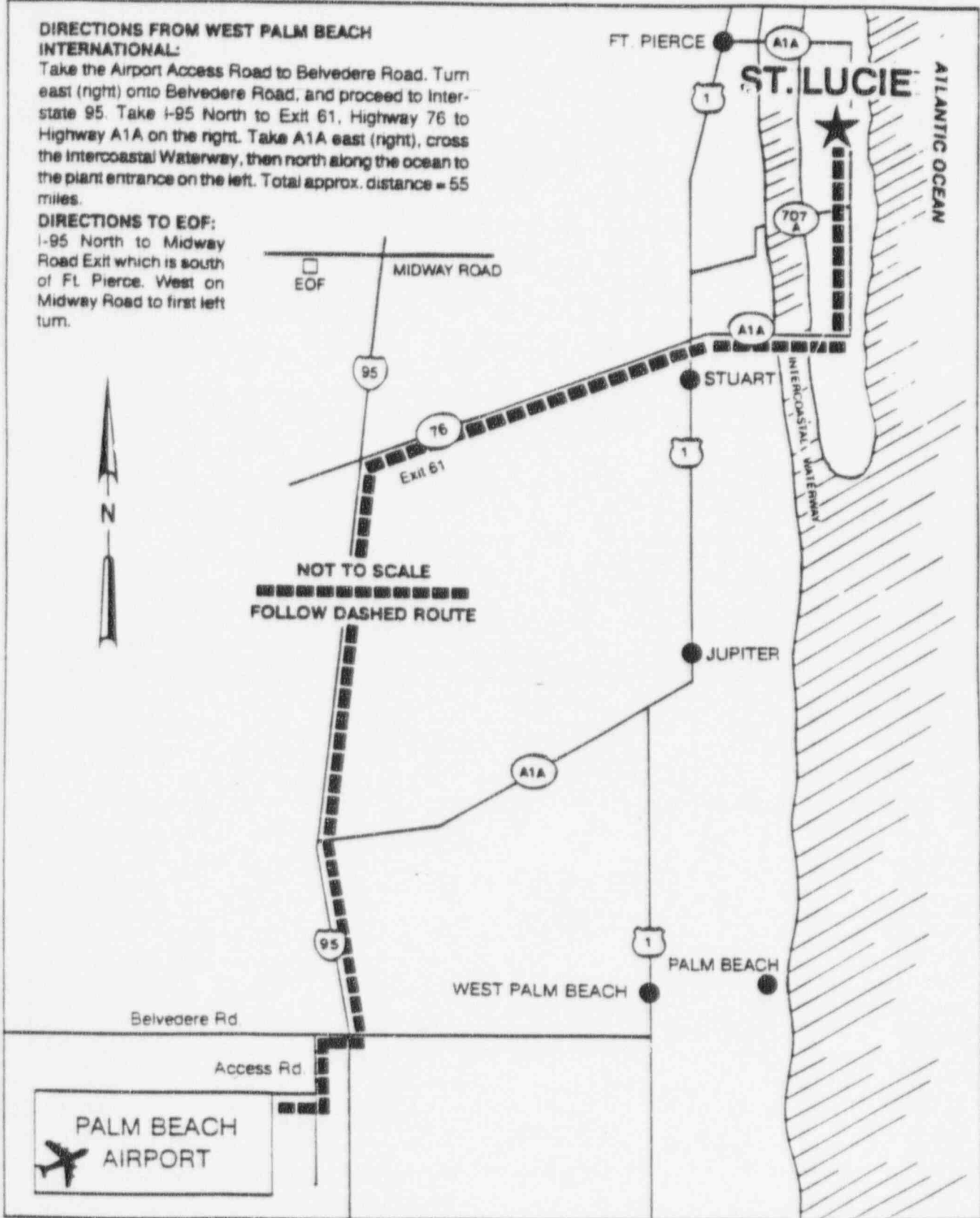
Take the Airport Access Road to Belvedere Road. Turn east (right) onto Belvedere Road, and proceed to Interstate 95. Take I-95 North to Exit 61, Highway 76 to Highway A1A on the right. Take A1A east (right), cross the Intercoastal Waterway, then north along the ocean to the plant entrance on the left. Total approx. distance = 55 miles.

DIRECTIONS TO EOF:

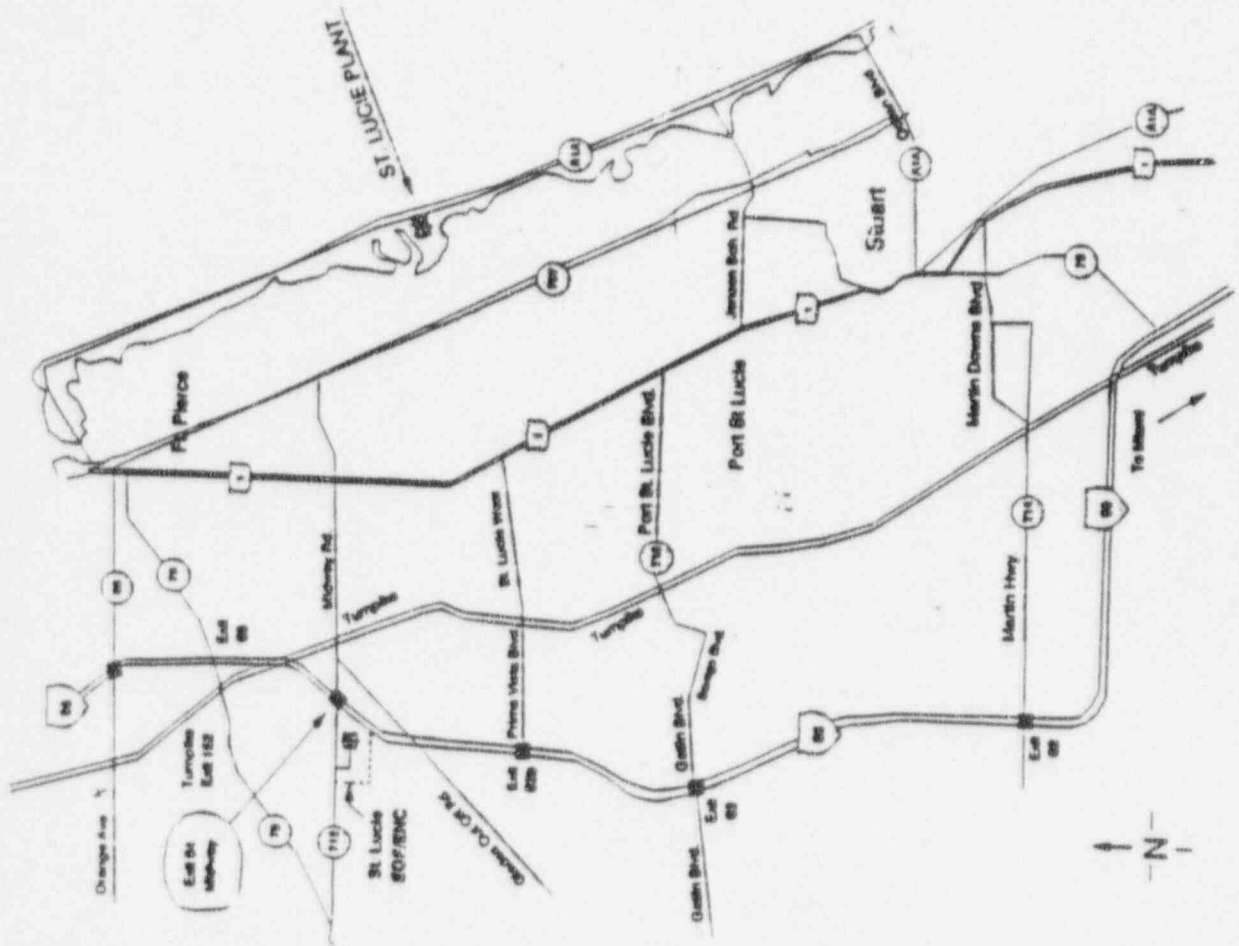
I-95 North to Midway Road Exit which is south of Ft. Pierce. West on Midway Road to first left turn.



NOT TO SCALE
FOLLOW DASHED ROUTE



EMERGENCY RESPONSE FACILITIES EOF/ENC LOCATION



EOF LOCATION: Florida Power and Light
 9001 West Midway Road
 Fort Pierce, Florida
 (Intersection of State Route 712 and I-95; approximately
 10.5 miles west of the St. Lucie Plant)

JPIC LOCATION: Florida Power and Light
 9001 West Midway Road
 Fort Pierce, Florida

FLORIDA POWER AND LIGHT COMPANY
ST. LUCIE NUCLEAR POWER PLANT
1994 EMERGENCY PREPAREDNESS
EVALUATED EXERCISE
FEBRUARY 9, 1994

2.2 OBJECTIVES

The St. Lucie Plant (PSL) 1994 emergency preparedness evaluated exercise objectives are based upon Nuclear Regulatory Commission requirements provided in 10 CFR 50, Appendix E, *Emergency Planning and Preparedness for Production and Utilization Facilities*. Additional guidance provided in NUREG-0654, FEM. -REP-1, Revision 1, *Criteria for Preparation and Evaluation of Radiological Emergency Response Plans and Preparedness in Support of Nuclear Power Plants*, was utilized in developing the objectives.

The exercise will be conducted and evaluated using a realistic basis for activities. Scenario events may escalate to a release of radioactive material to the environment.

The following objectives for the exercise are consistent with the aforementioned documents:

A. Accident Assessment and Classification

1. Demonstrate the ability to identify initiating conditions, determine Emergency Action Level (EAL) parameters and correctly classify the emergency throughout the exercise.

B. Notification

1. Demonstrate the ability to alert, notify and mobilize Florida Power and Light (FPL) emergency response personnel.
2. Demonstrate appropriate procedures for both initial and follow-up notifications.
3. Demonstrate the capability to promptly notify the U.S. Nuclear Regulatory Commission (NRC), State and Local Authorities of an emergency declaration or change in emergency classification.
4. Demonstrate the ability to provide accurate and timely information to State, Local and Federal Authorities concerning plant status, conditions and/or radioactive releases in progress, as appropriate.
5. Demonstrate the ability to provide periodic plant status updates to State, Local and Federal Authorities.

2.2 OBJECTIVES (Continued)

C. Emergency Response

1. Demonstrate staffing of Emergency Response Facilities (ERF)s.
2. Demonstrate planning for 24-hour per day emergency response capabilities.
3. Demonstrate the timely activation of the Technical Support Center (TSC) and Operational Support Center (OSC).
4. Demonstrate the timely activation of the Emergency Operations Facility (EOF).
5. Demonstrate the functional and operational adequacy of the Emergency Response Facilities, TSC, OSC, EOF and Emergency News Center (ENC).
6. Demonstrate the adequacy, operability and effective use of designated emergency response equipment.
7. Demonstrate the adequacy, operability and effective use of emergency communications equipment.
8. Demonstrate the ability of each Emergency Response Facility Manager to maintain command and control over the emergency response activities conducted within the facility throughout the exercise.
9. Demonstrate the ability of each facility manager to periodically inform facility personnel of the status of the emergency situation and plant conditions.
10. Demonstrate the precise and clear transfer of Emergency Coordinator (EC) responsibilities from the Nuclear Plant Supervisor (NPS) to designated senior plant management and transfer of Emergency Coordinator responsibilities to the Recovery Manager (RM).
11. Demonstrate the ability to promptly and accurately transfer information between Emergency Response Facilities (ERF)s.
12. Demonstrate the ability of the TSC to request, prioritize and control Emergency Response Teams (ERT)s in a timely manner.
13. Demonstrate the ability of the OSC to assemble, dispatch and control ERTs in a timely manner.

2.2 OBJECTIVES (Continued)

C. Emergency Response (Continued)

14. Demonstrate the capability for development of the appropriate Protective Action Recommendations (PAR)s for the general public within the 10 Mile Emergency Planning Zone (EPZ).
15. Demonstrate that the appropriate PARs can be communicated to State and Local Authorities within the regulatory time constraints.

D. Radiological Assessment and Control

1. Demonstrate the coordinated gathering of radiological and non-radiological (meteorological) data necessary for emergency response, including collection and analysis of in-plant surveys and samples, as applicable.
2. Demonstrate the capability to calculate radiological release dose projections and perform timely and accurate dose assessment, as appropriate.
3. Demonstrate the ability to compare onsite and off-site dose projections to Protective Action Guidelines (PAG)s and determine and recommend the appropriate protective actions.
4. Demonstrate the ability to provide dosimetry to emergency response personnel as required and adequately track personnel exposure.
5. Demonstrate the capability for onsite contamination control.
6. Demonstrate the ability to adequately control radiation exposure to onsite emergency workers, as appropriate to radiological conditions.
7. Demonstrate the decision making process for authorizing emergency workers to receive radiation doses in excess of St. Lucie Plant administrative limits, as appropriate.
8. Demonstrate the ability to control and coordinate the flow of information regarding off-site radiological consequences between radiological assessment personnel stationed at the TSC and EOF.
9. Demonstrate the ability of field monitoring teams to respond to and analyze an airborne radiological release through direct radiation measurements in the environment, as appropriate.

2.2 OBJECTIVES (Continued)

D. Radiological Assessment and Control (Continued)

10. Demonstrate the collection and analysis of air samples and provisions for effective communications and recordkeeping, as appropriate.
11. Demonstrate the ability to control and coordinate the flow of information regarding off-site radiological consequences with State radiological assessment personnel in the EOF.

E. Public Information Program

1. Demonstrate the timely and accurate response to news inquiries.
2. Demonstrate the ability to brief the media in a clear, accurate and timely manner.
3. Demonstrate the ability to coordinate the preparation, review and release of public information with State and Local Government Agencies as appropriate.

F. Medical Emergency

1. Demonstrate the ability to respond to a radiation medical emergency in a timely manner.
2. Demonstrate the capability of the First Aid and Personnel Decontamination Team to respond to a medical emergency, administer first aid and survey for contamination on a simulated contaminated injured individual.
3. Demonstrate the capability to arrange for and obtain transportation and off-site medical support for a radiological accident victim.
4. Demonstrate the ability of Martin Memorial Hospital personnel to treat an injured and/or contaminated patient.

G. Evaluation

1. Demonstrate ability to conduct a post-exercise critique to determine areas requiring improvement or corrective action.

The medical emergency portion of the 1994 Exercise may not be performed concurrently with the Exercise. The Medical Emergency Objectives will be utilized for the Medical Emergency sub-drill in any case.

2.2 OBJECTIVES (Continued)

H. Exemptions

Areas of the PSL Emergency Plan that will NOT be demonstrated during this exercise include:

1. Site evacuation of non-essential personnel
2. Onsite personnel accountability
3. Actual shift turnover (long term shift assignments will be demonstrated by rosters).
4. Actual drawing of a sample utilizing the Post-Accident Sampling System (PASS).
5. Real time activation of the Emergency News Center (ENC).

FLORIDA POWER AND LIGHT COMPANY
ST. LUCIE NUCLEAR POWER PLANT
1994 EMERGENCY PREPAREDNESS
EVALUATED EXERCISE
FEBRUARY 9, 1994

3.1 NARRATIVE SUMMARY

The scenario begins with Unit 2 operating at 100% power. The 2B High Pressure Safety Injection (HPSI) pump is tagged out of service (OOS) for maintenance. A 5 gallon per minute (gpm) leak develops on a cold leg weld in the Unit 2 Reactor Coolant System (RCS) piping. This should produce a declaration of a Notification of Unusual Event (NUE). The RCS leak escalates to 65 gpm. This should produce a declaration of Alert and a down power on the reactor. During the reactor down power, when the in-house electrical loads are transferred to the Startup (S/U) Transformers (Xformers), the 2A3 4160 Volt (4.16 KV) bus will lock out on differential current when the "A" 4.16 KV S/U breaker is taken to close. The leaking cold leg weld fails, resulting in a shear break in the piping. This should produce a declaration of a Site Area Emergency (SAE). When the Recirculation Actuation Signal (RAS) occurs, the 2B Low Pressure Safety Injection (LPSI) pump shuts down and will not restart. The large break Loss of Coolant Accident (LOCA) with no Emergency Core Cooling System (ECCS) flow to the reactor vessel allows the reactor core to become uncovered and fuel damage results. A leak develops in the Containment sump piping allowing sump water to be released into the Safety Injection (SI) pipe tunnel and the Unit 2 Reactor Auxiliary Building (RAB) basement. The released activity is picked up by the running 2B ECCS ventilation system and transported to the environment through the 2B ECCS vent stack on the Unit 2 RAB roof. A General Emergency (GE) should be declared. The 2B LPSI and/or HPSI pump is restored and ECCS flow is initiated to the reactor. This will exacerbate the core damage and increase release to the Containment at first until rewetting and cooling of the core can take effect.

FLORIDA POWER AND LIGHT COMPANY
ST. LUCIE NUCLEAR POWER PLANT
1994 EMERGENCY PREPAREDNESS
EVALUATED EXERCISE
FEBRUARY 9, 1994

3.2 SCENARIO TIMELINE

TIME	EVENT
0700	Player briefing, shift turnover and initial conditions establish Unit 2 operating at 100% power, in the middle of core life. Power history has been full power operation for the last 180 days. Unit 1 is in day 42 of a 45 day scheduled refueling outage. Demand on the system is moderate with an anticipated peak of 10,000 MW. Service area conditions are normal. The 2B High Pressure Safety Injection (HPSI) pump is out of service (OOS) for outboard seal and bearing replacement. The 2B HPSI pump was placed on clearance at 1600 on February 8, 1994. The pump bearing and seal work continued on the previous peak and mid shifts. The completion of installation and testing is anticipated by the middle of the day. The Hot Ring-Down (HRD) and National Warning System (NAWAS) phone systems are both OOS in the Unit 2 Control Room (Simulator). Weather has been sunny and mild for the last week. Forecast is for clear skies, temperatures in the upper 70's. Current temperature is 75° with winds from the Northeast (45°) at 3-4 mph.
0715	Full Length Control Element Assembly (FLCEA) testing is begun on Unit 2 in accordance with Operating Procedure OP-2-0110050, <i>Control Element Assembly Periodic Exercise</i> .
0800	A 5 gallon per minute (gpm) leak begins from a faulty weld in the Reactor Coolant System (RCS) 2A1 Cold Leg. A NOTIFICATION OF UNUSUAL EVENT (NUE) should be declared based upon Emergency Plan Implementing Procedure (EPIP) 3100022E, <i>Classification of Emergencies</i> , greater than 1 gpm unidentified leakage. The Nuclear Plant Supervisor (NPS) should assume the duties of the Emergency Coordinator (EC).

3.2 SCENARIO TIMELINE (Continued)

TIME	EVENT
0805	Reactor Cavity Leakage alarm, Charging/Letdown mismatch, Reactor Cavity sump levels and Containment atmosphere indications are utilized to validate the RCS leakage. Operators should enter ONOP 2-0120031, <i>Excessive Reactor Coolant System Leakage</i> and perform a leak rate calculation using AP-2-0010125A, <i>Surveillance Items, Data Sheet 1</i> .
0815 (Approx.)	The Nuclear Plant Supervisor (NPS) may order a power Containment entry at this time to investigate the RCS leak. (Entry team activity will be allowed up to the point of actual Containment entry, which will be <i>simulated</i> .)
0830 (Approx.)	Contingency message for the Notification of Unusual Event declaration.
0845	The RCS leakage increases to 65 gpm. Within minutes, Reactor Cavity Leak High goes off scale (12 gpm) as a result of the increased leakage. Containment pressure, temperature and radiation levels are increasing and RCS pressure and level are decreasing.
	An ALERT should be declared based upon Emergency Plan Implementing Procedure (EPIP) 3100022E, <i>Classification of Emergencies</i> , greater than 50 gpm leakage.
	The Technical Support Center (TSC) and Operations Support Center (OSC) should begin activation. The Emergency Operations Facility (EOF) should be staffed and activated by the initial responders. (The Emergency Control Officer (ECO) may fully activate the EOF at any time after this point if he deems it necessary.)
	Operators should begin a downpower at 10 MW _e /min, enter OP-2-0030125, <i>Turbine Shutdown Full Load to Zero Load</i> and utilize OP-2-0030123, <i>Reactor Operating Guidelines During Steady-State and Scheduled Load Changes</i>
0915 (Approx.)	Contingency message for the Alert declaration.

3.2 SCENARIO TIMELINE (Continued)

TIME

EVENT

- 0930 (Approx.) During the course of the downpower, if the operations crew attempts to transfer house electrical loads to the Startup Transformers, the 2A3 4.16 KV bus will lock out on differential current when the "A" 4.16 KV Startup breaker is taken to "close". (If operators have not taken this action voluntarily, the bus will lock out on the reactor trip.) Operators enter ONOP-2-0910054, *Loss of Safety Related Bus*. Operators stabilize the plant and request assistance from the TSC and OSC. Operations and electrical personnel are dispatched to investigate.
- 1000 The RCS 2A1 cold leg weld fails and the line shears resulting in a large break Loss of Coolant Accident (LOCA).
- A SITE AREA EMERGENCY should be declared based upon a LOCA greater than available charging capacity. The full activation of the Emergency Operations Facility (EOF) should begin at this time if not previously done so.
- 1005 (Approx.) The reactor and turbine are tripped. After standard post-trip actions, the operations crew enters Emergency Operating Procedure (EOP) 2-EOP-03, *LOCA*. On the trip, or earlier when aligning loads, the 2A3 4.16 KV bus locks out. Operators stabilize the plant and request assistance from the TSC and OSC. Operations and electrical personnel are dispatched to investigate.
- The TSC and OSC should be staffed and activated by this time. The EC duties should be turned over to Plant Management in the TSC by this time. The Reactor Vessel Level Monitoring System (RVLMS) indicates head voiding. Safety Injection Tanks (SITs) are injecting.
- 1030 (Approx.) Contingency message for the Site Area Emergency declaration.
- 1100 Recirculation Actuation Signal (RAS) occurs. The 2B LPSI pump trips and will not restart. A leak develops in the Containment Sump piping allowing sump water to be released into the Safety Injection (SI) pipe tunnel and the Unit 2 Reactor Auxiliary Building (RAB) basement. The released activity is picked up by the running 2B ECCS ventilation system and transported to the environment through the 2B ECCS vent stack on the Unit 2 RAB roof.

3.2 SCENARIO TIMELINE (Continued)

TIME	EVENT
1130	<p>As the reactor vessel level drains down and the core uncovers, fuel damage begins.</p> <p>The EC should declare a GENERAL EMERGENCY based upon verified fuel damage with LOCA and loss of containment integrity. Protective Action Recommendations (PAR)s are generated based upon plant conditions.</p>
1140 (Approx.)	<p>Recovery of 2B LPSI and/or HPSI allows reflooding of the core. This will exacerbate the core damage and increase release to the Containment at first until rewetting and cooling of the core can take effect. Containment water is still being released to the basement of the Unit 2 Reactor Auxiliary Building (RAB) through the ECCS pipe tunnel. The released radioactive material enters the environment through the monitored 2B ECCS vent exhaust.</p>
1200 (Approx.)	<p>Contingency message for the General Emergency declaration. Emergency Core Cooling Systems (ECCS) have covered the core. Containment radiation, temperature and pressure have stabilized.</p>
1300	<p>Cooldown, depressurization and/or Low Pressure Safety Injection (LPSI) have refilled the reactor vessel. Field radiation readings have declined. Field monitoring activities continue. The emergency response teams continue to stabilize the reactor, initiate long-term cooling, verify safe shutdown and evaluate containment integrity.</p>
1400 (Approx.)	<p>Termination of Exercise Play</p>

ST. LUCIE MAINTENANCE EVALUATION - OCTOBER 1996

A. **Assessment:** The licensee experienced 9 cases of equipment failure including a repeat of a previous Unit 2 manual Reactor trip resulting from high generator H2 temp due to failed TCV, along with a number of examples of personnel error and failure to follow procedures, inadequate procedures, or weak procedures. The problems associated with TCV failures may indicate a weakness in determining root cause. The number of problems related to personnel errors and procedure problems indicate weaknesses, possibly attitude problems, in the Maintenance Program. Additionally, the Unit 1 Steam Generators have a significant portion of tubes plugged (1A-25.3% & 1B-21.5%). Replacement of these Steam Generators is scheduled for the spring of 1998.

B. **Basis:**

1. Last SALP Rating: Category 2 (1/2/94 - 1/5/96)
Next Period End: 04/15/97

2. Maintenance Backlog:

Corrective Maintenance Work Request Backlog - 1101 Non-outage work orders were open at the beginning of September, 1996, no significant changes since beginning of year. Licensee has not met their goals of reducing backlog.

Overdue Preventive Maintenance Backlog - 30 Maintenance PMs were late during the third quarter of 1996 (no prior trending information).

3. Power Reduction/Trips Caused by Equipment Failures:

Unit 2	01/05/96	Manual reactor trip resulting from high generator H2 temp due to failed TCV.
Unit 1	02/22/96	Manual trip/shutdown following dropped/unrecoverable CEA.
Unit 1	04/29/96 - 07/23/96	Refueling Outage.
Unit 2	04/20/96	Turbine Stop Oil orifice blockage.
Unit 2	04/09/96	Downpower due to Circ Water Piping leakage.
Unit 2	05/24/96	Downpower due to CEDM problems.
Unit 2	05/31/96	Downpower due to MSR TCV closure due to blown fuse.
Unit 2	06/06/96	Manual reactor trip resulting from high generator H2 temp due to failed TCV.
Unit 2	06/22/96	Downpower due to 2B FRV Controller problems.

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4. Licensee Self-Assessment: A licensee audit in the area of implementation of Maintenance Rule requirements performed during July 1996 was thorough, comprehensive and considered a strength.
5. Major Enforcement Issues: Since January 1, 1996, violations were identified, associated with: lack of controlled procedure at jobsite; failure to verify current procedure at jobsite; inadequate independent verification; unattended freeze seal; failure to adhere to CEDM coil resistance test criteria; documentation of as-found & as-left data; failure to properly implement procedural usage requirements in work planning process.
6. Strengths: Predictive monitoring program, development of equipment unavailability risk determination matrix were noted as strengths during Maintenance Rule Baseline Inspection. Additionally, increased predictive maintenance of CEDM System has resulted in a reduction in CEA drop events.

C. **Future Inspections:**

- 4-man weeks of inspection in the maintenance area (Regional Initiative), focus on outage activities BOP and EDG maintenance (2-man weeks), procedure adequacy and safety system performance (2-man weeks).
- Conduct (1-man week) ISI (core inspection).
- Integrated S/G Inspection

ST. LUCIE MAINTENANCE EVALUATION - OCTOBER 1996

A. Assessment: An increase in personnel errors and equipment problems was noted. The majority of the equipment problems are BOP related. For the most part the licensee considered safety in establishment of goals and for monitoring of systems and components in the maintenance rule. The maintenance program is adequate.

B. Basis:

The maintenance area was rated good overall the last SALP period. The last PPR indicated a problem with EDGs and procedure problems.

The plant matrix indicates 12 equipment failures, 12 personnel errors and 3 procedure problems during the last 6 months. Examples of personnel errors were:

- 8/31/96 Improper use of M&TE for meggering NI cables
- 8/3/96 Freeze seal left unattended
- 7/30/96 3 of 4 linear NI channels found miswired
- 7/20/96 2 charging pumps tripped due to erroneous level signal

Power Reduction caused by Equipment Failures in the last 6 months:

- 4/20/96: Unit 2 - Turbine Stop Oil orifice blockage.
- 4/09/96: Unit 2 - Downpower due to Circ Water Piping leakage.
- 5/24/96: Unit 2 - Downpower due to CEDM problems.
- 5/31/96: Unit 2 - Downpower due to MSR TCV closure due to blown fuse.
- 6/06/96: Unit 2 - Reactor trip resulting from high generator H2 temp due to failed TCV.
- 6/22/96: Unit 2 - Downpower due to 2B FRV Controller problems.
- 7/23/96: Unit 1 - Manual trip due to turbine maintenance.

Maintenance Backlog:

- Non-outage corrective maintenance backlog: 1101 items, no significant changes since beginning of year.
- Overdue Preventive Maintenance Backlog: 30 Maintenance PMs were late

Maintenance Rule A(1) systems: 6 systems

- EDG governors, EDGs, 4.16 KV AC safety related breakers, PORVs, C AFW, and RCP seals.

C. Future Inspections:

- Maintenance Rule follow-up: 62703 (RI) - 1 man-week
- ISI inspection: 73753 (core) - 1 man-week
- Integrated S/G Inspection: 73753 (RI) - 3 man-weeks

~~Pre-Operational~~
Semiannual Plant Performance Assessment
St. Lucie 1 and 2

Current SALP Assessment Period: 1/7/96 through 3/97

	Last SALP Rating <u>1/2/94 - 1/6/96</u>	Previous SALP Rating <u>5/3/92 - 1/1/94</u>
Operations	2	1
Maintenance	2	1
Engineering	1	1
Plant Support	1	1

INPO assessment July 1995 - Category 1

I. Performance Overview

Since July 1995, there have been a series of events that led to questioning the plant's overall performance. An NRC root cause effort determined that, in addition to procedural adherence/adequacy weaknesses, the licensee suffered from weaknesses in both interfaces across organizational lines and corrective actions. The SALP board concluded that performance in the areas of Operations and Maintenance had declined to level 2. Since the SALP board, additional examples of declined performance were noted. These have included:

- Significant operator inattentiveness which resulted in the overdilution event on January 22, 1996, highlighted the recent large number of personnel errors and lack of command and control in the control room (SL3, CP).
- On February 22, 1996, a dropped CEA and an ensuing Unit 1 shutdown resulted in the declaration of an unusual event. During the shutdown, main feedwater regulating valve instabilities resulted in operators manually tripping the unit.
- On February 24, a containment radiation monitor was rendered inoperable for two days due to an improper valve lineup following a grab sample. As a result, the unit was started up without this TS-required component available. Several instances of failure to follow procedures and operator inattention led to the extended period of inoperability (SL4).
- On May 7, an inspection indicated that a significant number of shifts had been worked with fire brigade members which were not medically qualified. A breakdown in the tracking of this data resulted from a key individual being laid off.
- On May 12, fuel movement was commenced on Unit 1 without only 1 of 2 wide range NI channels available. Operators performing a surveillance test on the inoperable channel did not coordinate

DD/LS3

with the refueling center properly. Additionally, the fuel offload was commenced without incorporating requirements from the spent fuel pool heat load calculation into the appropriate operational procedures.

- On June 6, Unit 2 s manually tripped due to high generator gas temperature. Root cause was a screw which vibrated loose and resulted a temperature control valve feedback arm falling free of its connection. This failure mode had been encountered before.
- On June 16, an inspection identified that 56 individual violations of overtime guidelines had occurred on the part of 4 individuals over a 30 day period. Evidence also existed that employees were regularly working longer hours than those reported on their timesheets.
- On July 20, Unit 1 experienced a loss of charging flow when, due to a mispositioned board selector switch, both operating pumps stopped on a faulty indication of high pressurizer level, caused by I&C errors.
- A number of engineering-related problems have been identified, to include:
 - A number of annunciator response procedures which were inaccurate due to a failure to update them when design modifications took place.
 - Four similarly miswired nuclear instrumentation channels due to errors in control wiring diagrams implemented during a modification. The condition was identified at full power and resulted in an entry into TS 3.0.3.
 - Nonconservative errors were identified in auxiliary feedwater actuation system setpoints due to a failure to incorporate as-built data in instrument calibration calculations.
- Maintenance overtime usage was found excessive in that four individuals were responsible for 56 examples of non-approved exceedences of Technical Specification overtime guidelines.
- On August 14, glue was found in key lock switches on both units' hot shutdown panels, rendering the switches inoperable. The tampering instances appeared to be additional examples of padlocks and door locks which were identified in July.

In addition to the inspection findings above, the inspectors have noted a general low state of morale. A great number of both management and non-management employees have expressed concern with regard to the company's ongoing downsizing effort. The general feeling is that, unlike Turkey Point, which was afforded the budget and time to improve prior to downsizing, St. Lucie is expected to improve AND downsize simultaneously.

II. Functional Area Assessment - Operations

A. Assessment

Performance in Operations appears to have leveled. At the time of the last PPR, operator errors and operational events were on the increase. In the past six months, examples of improved operator attention to detail and conservative decision-making have been identified. Strong performance was identified in the area of reduced inventory operation. Weaknesses were identified in the areas of procedural quality and operability maintenance and decision-making. Improvements in control room environment, formality, and communications have been noted. The licensee has appeared to make inroads in the areas of operator self-assessment and documentation of adverse conditions.

B. Basis

1. Attention to Detail and Conservative Decision-Making

- Non-licensed operators were successful in identifying two cases of inadvertent containment radiation monitor inoperability and a breach in a fire-rated assembly.
- After a non-conservative decision which resulted in a late declaration of an NOUE for CVCS system leakage, operators have declared three NOUEs for similar circumstances (CVCS leakage outside containment which could not be quickly quantified). Management has been effective in encouraging conservative decision-making.
- Entry into a shutdown action statement when 4 Unit 2 control rods would not respond electrically.
- Five entries into reduced inventory during the period without error.
- Timely trip of Unit 1 due to apparent gas buildup in the 1B transformer.
- Terminating a Unit 1 startup due to predictions that xenon decay would invalidate the estimation of critical conditions.

2. Weaknesses in Procedures and Maintenance of Operability

- Numerous errors identified in annunciator response procedures.
- Full core offload began on Unit 1 without incorporating requirements from the fuel pool heat load calculation into operational procedures.

- Operator aids found in the field did not agree with procedural requirements for the tasks they described.
- Unit 1 fuel movement began without the required 2 operable channels of wide range nuclear instruments due to the performance of a surveillance test.
- Clearance hung during the Unit 1 outage resulted in inoperability of audible count rate in containment.

3. Other Observations

- Good performance was noted during a Unit 2 downpower due to low turbine auto-stop oil pressure, a Unit 2 trip due to a failed turbine cooling water valve, several startups, and fuel movements in Unit 1 containment.
- Poor performance was noted in the use of a single operator for fuel movement in the spent fuel pool, in the control of keys for PORV operation outside of the control room, in the control of backup charging pump selector switch position, and in performing a test of a turbine-driven AFP which resulted in a pump trip.
- Equipment failures continue to challenge operators, with the occurrence of two manual trips per unit this calendar year due to equipment failures.

C. Future Inspections

The high number of allegations and an increase in resident involvement with engineering activities has reduced the available time for core Operations inspections. The site has been brought to an N+1 staffing level; however, qualification of the new resident is not anticipated until February, 1997. Additionally, both assigned Resident Inspectors will be attending CE training at TTC for three weeks in October/November. An acting resident has been arranged for the period; however, inspection at the N+1 level will not be possible until the end of the current SALP cycle (March 1997). Consequently, Senior Resident and Resident Inspectors objectivity visits, involving control room observations, are planned. Additionally, DRS inspections of the licensee's procedure development and approval process, which has recently changed in an effort to improve procedure quality, are planned.

III. Functional Area Assessment - Maintenance

- A Assessment: An increase in personnel errors and equipment problems was noted. The majority of the equipment problems are BOP related. For the most part the licensee considered safety in establishment of goals and for monitoring of systems and

components in the maintenance rule. The maintenance program is adequate.

B. Basis:

The maintenance area was rated good overall the last SALP period. The last PPR indicated a problem with EDGs and procedure problems.

The plant matrix indicates 12 equipment failures, 12 personnel errors and 3 procedure problems during the last 6 months.

Examples of personnel errors were:

- 8/31/96 Improper use of M&TE for meggering NI cables
- 8/3/96 Freeze seal left unattended
- 7/30/96 3 of 4 linear NI channels found miswired
- 7/20/96 2 charging pumps tripped due to erroneous level signal

Power Reduction caused by Equipment Failures in the last 6 months:

- 4/20/96: Unit 2 - Turbine Stop Oil orifice blockage.
- 4/09/96: Unit 2 - Downpower due to Circ Water Piping leakage.
- 5/24/96: Unit 2 - Downpower due to CEDM problems.
- 5/31/96: Unit 2 - Downpower due to MSR TCV closure due to blown fuse.
- 6/06/96: Unit 2 - Reactor trip resulting from high generator H2 temp due to failed TCV.
- 6/22/96: Unit 2 - Downpower due to 2B FRV Controller problems.
- 7/23/96: Unit 1 - Manual trip due to turbine maintenance.

Maintenance Backlog:

- Non-outage corrective maintenance backlog: 1101 items, no significant changes since beginning of year.
- Overdue Preventive Maintenance Backlog: 30 Maintenance PMs were late

Maintenance Rule A(1) systems: 6 systems

- EDG governors, EDGs, 4.16 KV AC safety related breakers, PORVs, C AFW, and RCP seals.

C Future Inspections:

- Maintenance Rule follow-up: 62703 (RI) - 1 week
- ISI inspection: 73753 (core) - 1 week
- Integrated S/G Replacement Inspection: 73753 (RI) - 3 weeks

IV. Functional Area Assessment - Engineering

A. Assessment

St. Lucie received a SALP 1 rating during the SALP period that ended January 6, 1996. The licensee has declined in performance during this PPR period (March-September 1996) due to problems with configuration management/design control and a failure to identify an USQ.

B. Basis

PIM TRENDS/ISSUES: The trend indicated was for configuration management as described in design control issues below and an issue for failure to identify an USQ for a 50.59 evaluation (September 19, 1996).

ENFORCEMENT: Letter of violation issued September 19, 1996. One level III and two level IVs in the area of USQ and configuration management.

DESIGN CONTROL ISSUES: In enforcement identified two problems, one which failed to coordinate design changes to operating procedures with three examples: 1) Set point change to low level alarm in the Hydrazine tank, 2) removal of ICW lube water piping and did not change abnormal procedure which affects operator actions, and 3) disabled a steam dump valve annunciator without changing the annunciator response procedure. The second problem identified the failure to change ICW drawings after a modification (All three examples September 19, 1996).

OPERATING FOCUS: The licensee took steps to prevent tube failure of its steam generators on Unit 1 by plugging approximately 2300 tubes. These steam generators will be replaced in fall 1997 outage.

MAJOR INITIATIVES: Unit 2 outage 4/15/97 '97, Unit 1 S/G replacement outage fall '97

FSAR INITIATIVES: A review has been conducted of approximately one-third of the FSAR (July 1996 inspection). This review was performed mostly on Unit 1 and was performed on text material and not for curves and tables. No USQ or operability problems were found. Approval pending for reviewing remaining part of FSAR.

DBD/R: A Design Basis Documentation was performed for 20 design basis documents. The program was completed near the end of 1995.

C. Future Inspections

Engineering-9 weeks, basis: Evaluate new engineering organization, FSAR project, configuration management and followup on design control issues.

V. Functional Area Assessments - Plant Support

A. Assessment

The last SALP cycle ended 1/6/96. Plant Support was Category 1. The licensee continues to maintain a satisfactory level of performance in the area of Plant Support. Some decline in Radiation Protection has been noted due to the loss of control of contaminated tools and exceeding dose goals. Emergency Preparedness ongoing inspection indicates a decline in

performance. Hurricane preparations for hurricane Bertha were conservative. Overall, site security has been adequate. Training and qualification noted as a strength and management observed to be aggressive in pursuing issues, but not aggressive in doing indepth review of events. Implementation of the fire protection program continued to be satisfactory.

B. Basis

Radiation Protection

NCV for failure to control contaminated tools used in RCA (96-04, p 45)

Violation (repeat of above NCV) for numerous examples of failure to control contaminated tools. (96-09, p 25)

Internal and external exposures below 10 CFR Part 20 limits. (96-04, p 45 and 96-04, p 23) (1996 dose levels?).

1995 dose was 412 person-rem. Unplanned maintenance and rework caused 1995 dose goal of 283 person-rem to be exceeded by 129 person-rem. (96-04, p 50)

Rad Techs decreased from 32 to 30 and 2 supervisors lost (96-04, p 48)

Decon staff reduced from 22 to 12 persons. Levels of contaminated equipment and materials increasing. (96-04, p 46)

Good radiological housekeeping and controls. (96-09, p 28)

The total area contaminated was at 250 ft². (96-04, p 47)

Licensee accreditation of the FP&L DADs a good example of Radiation Protection staff's technical capabilities. (96-04, p 44)

Emergency Preparedness

Conservative actions taken to prepare for Hurricane Bertha. (96-11, p 3)

Security

Failure to report a confirmed tampering event within one hour, which resulted in a violation.

Two events in prior to the above tampering event were documented as tampered or unauthorized work, but management failed to notify security of these events.

Numerous problems discovered by a QA audit determined the FFD program to be weak.

Fire Protection

A backup fire pump was installed to replace an out of service fire pump.

C. Future Inspections

Inspections

Rationale

Health Physics Operational HP(83750)	(SALP 1 decline - maintain; watch) 2-Inspections with focus on procedure compliance; rework doses
Effl/RadWast(84/86750)	3-inspections with focus on accident/process monitor installation & maintenance
TI 133 Rad Waste	Combine with 86750
Emergency Preparedness Prog. (82701)	1-Inspection with focus on Self- Assessment results Regional Initiative inspection on allegation followup (3 weeks, 2 inspectors)
Security Prog (81700)	Core Insp. to review security audits, corrective actions, management support and effectiveness, and review protected area detection equipment
Sec. Prg/FFD (81700/81502)	One regional initiative to followup on tampering and FFD issues
Fire Protection	None

VI. Attachments

1. Power Profile
2. Plant Issues Matrix
3. Current NRC Performance Indicators
4. Licensee Organization Charts
5. Allegation Status
6. Enforcement History
7. Major Assessments
8. Recent Generic Issues Status List

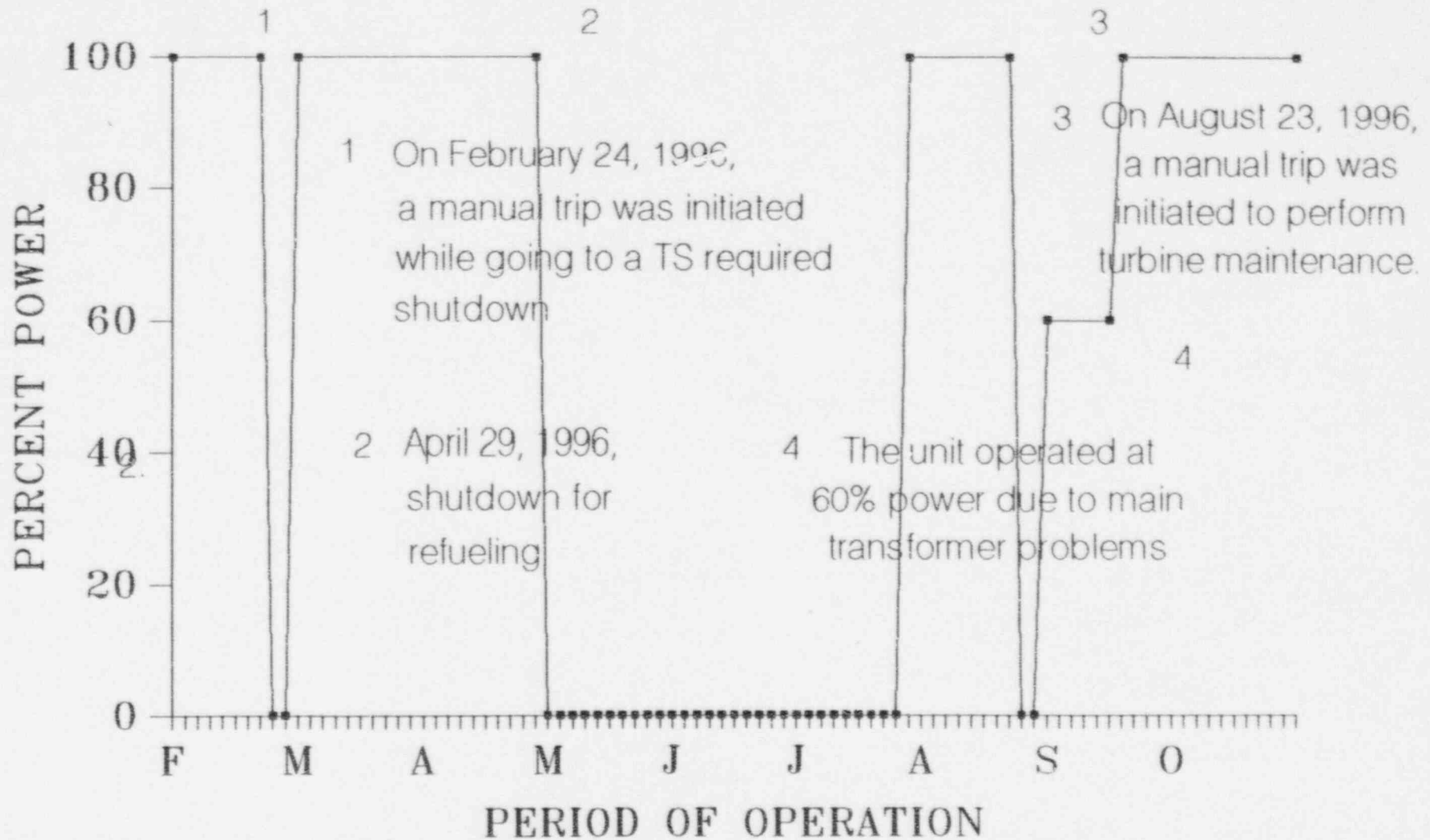
ST. LUCIE - INSPECTION PLAN

INSPECTION PROCEDURE / TEMPORARY INSTRUCTION	TITLE/PROGRAM AREA	NUMBER OF INSPECTORS	PLANNED INSPECTION DATES	TYPE OF INSPECTION - COMMENTS
37550	NUCLEAR INSTRUMENTATION INSPECTION	2	10/7-18/96	REGIONAL INITIATIVE
82701	OPERATIONAL STATUS OF THE EP PROGRAM	2	10/7-18/96 10/28-11/1/96	REGIONAL INITIATIVE
81502	FITNESS FOR DUTY	1	10/21-25/96	FOLLOWUP FFD/TAMPERING
40500	EFFECTIVENESS OF LICENSEE CONTROLS IN IDENTIFYING, RESOLVING, AND PREVENTING PROBLEMS; CORRECTIVE ACTION REVIEW	1 2	10/21-25/96 1/97	INSPECT STATUS OF PERFORMANCE IMPROVEMENT PROGRAM
84750 TI 133/86750	RADIOACTIVE WASTE TREATMENT AND EFFLUENT AND ENVIRONMENTAL MONITORING; SOLID RADIOACTIVE WASTE MANAGEMENT AND TRANSPORTATION OF RADIOACTIVE MATERIAL	1	11/4-8/96 11/18-22/96	REGIONAL INITIATIVE
83750	OCCUPATIONAL RADIATION EXPOSURE	1	12/2-6/96	REGIONAL INITIATIVE
71001	LICENSED OPERATOR REQUALIFICATION PROGRAM EVALUATION	1	12/2/96	REQUALIFICATION PROGRAM INSPECTION
62703	FOLLOWUP MAINTENANCE RULE TEAM INSPECTION	1	1/27 -31/97	REGIONAL INITIATIVE

INSPECTION PROCEDURE/ TEMPORARY INSTRUCTION	TITLE/PROGRAM AREA	NUMBER OF INSPECTORS	PLANNED INSPECTION DATES	TYPE OF INSPECTION - COMMENTS
73753	STEAM GENERATOR INTEGRATED INSPECTION	1	1/27-31/97 2/10-14/97 5/5-9/97	REGIONAL INITIATIVE
37550	ENGINEERING	1	2/3-7/97	CORE 50.59 FOCUS
92703	FOLLOWUP A/E EXPANDED SSFI TEAM INSPECTION OPEN ISSUES	3	3/3-14/97	REGIONAL INITIATIVE
73753	INSERVICE INSPECTION	1	4/28-5/2/97	CORE -MAINTENANCE
81700	PHYSICAL SECURITY PROGRAM FOR POWER REACTORS	1	TBD	CORE - SAFEGUARDS

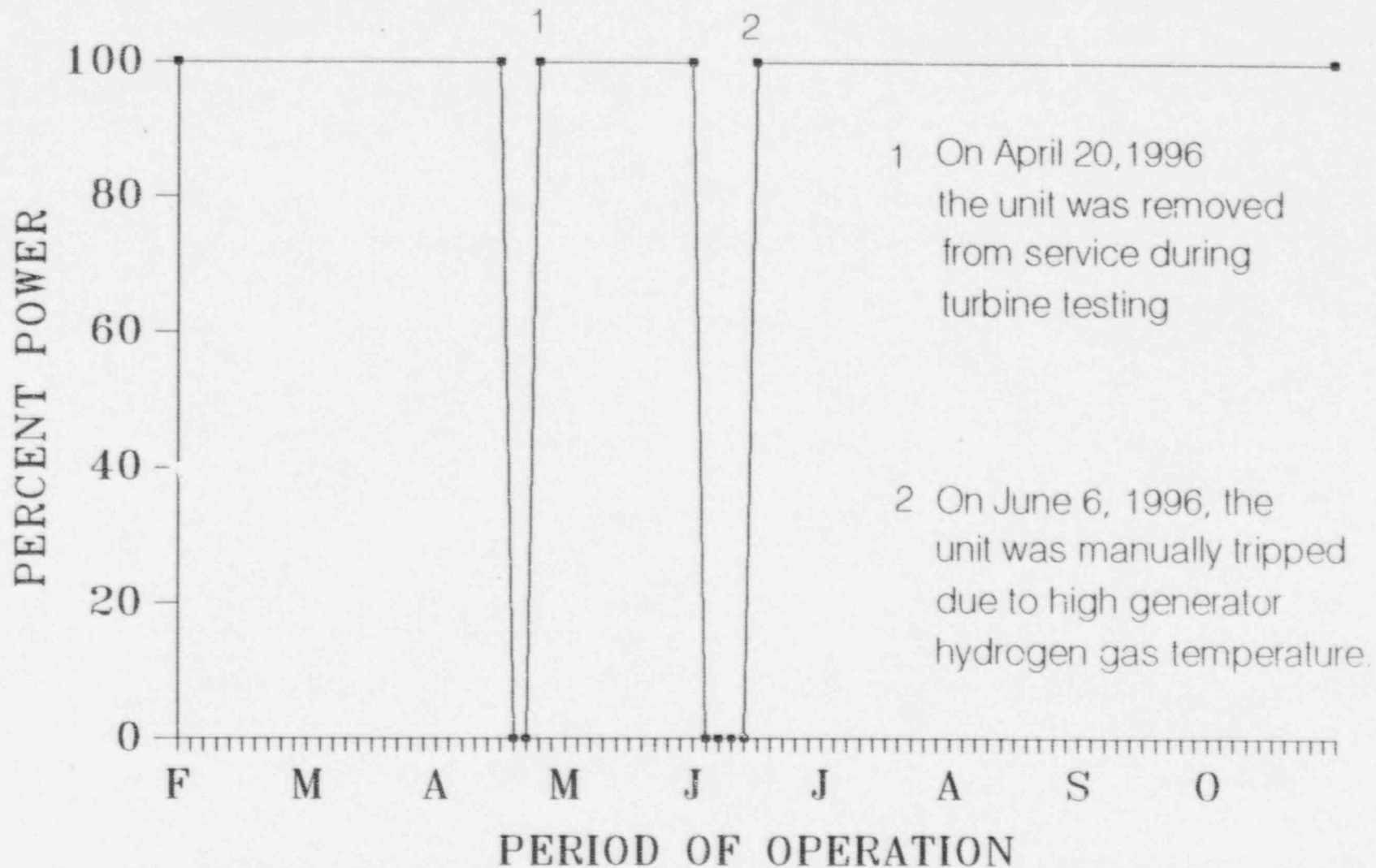
ST. LUCIE UNIT 1

Operational Period February 1996 through October 18, 1996



Graph does not include power reductions
for routine repairs, waterbox cleaning,
or required repairs.

ST. LUCIE UNIT 2
Operational Period February 1995
through October 18, 1996



Graph does not include power reductions
for routine repairs, waterbox cleaning,
or required repairs.

PLANT ISSUES MATRIX BY SALP AREA

St. Lucie

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
ENGINEERING						
4/18/96	NCV	IR 96-06	M	L	Missing orifice plate identified in Unit 1 ICW system during licensee field walkdowns.	Either failure to install orifice during plant modification, or failure to reinstall orifice following maintenance.
4/29/96	NCV	IR 96-06		N	Failure to promptly document a nonconformance.	Engineering failed to initiate CR upon discovery that approx. 35 S-R instruments on each unit might have been calibrated at temperatures lower than those assumed in setpoint calcs.
5/12/96	NCV	IR 96-12 , EA 96-236	O	L	Initial temperature (and other) conditions specified in Unit 1 spent fuel pool heat load calculation (to support total core offload) was not factored into procedures.	Programmatic weakness in Plant Change/Modification process.
4/9/96	NEG			S	CIRC water piping through-wall leaks observed in two water boxes' outlets.	Galvanic corrosion due to inadequate cathodic protection following installation of stainless steel Tapparogge components.
6/3/96	OTHER	IR 96-08	O	L	Unit 1 outage extended due to expansion of SG MRPC tube inspections. Tube plugging approached 25% limit. PLAs submitted to NRR to allow plugging up to 30%.	New plugging criteria resulting from discussions with NRR on defect characterization methodologies.
6/8/96	OTHER	IR 96-08		L	Ongoing review by licensee of UFSAR accuracy identified approximately 150 items, ranging from typographical errors to more substantive issues.	Failure to update FSAR over time and failure to review FSAR properly when preparing procedures.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
7/18/96	OTHER	IR 96-11	M	L	Unit 1 AFAS setpoints found nonconservative during review of recalibration activities.	Failure to employ as-built elevations of condensate pots in the development of calibration criteria.
7/30/96	OTHER	IR 96-11	O	L	3 of 4 Unit 1 linear NI channels found miswired, with the detectors' upper chambers feeding the lower NI drawer inputs and vice-versa. Result was 3 channels for which axial shape index was in error.	Drawing errors - discrepancy between vendor technical manuals and control wiring diagrams generated for the installation of the new Unit 1 NI drawers.
4/13/96	POS	IR 96-06		N	Engineering response to failure of HVS-4A motor considered good.	Procurement engineering effective in locating and dedicating replacement motor and in identifying and resolving incorrect bearing rating calc for new motor. Minor problem existed in that new starting current profile was not adequately treated.
6/1/96	POS	IR 96-08		N	CNRB activities surrounding PLA reviews in support of SG tube plugging issues were probing and competent.	
6/8/96	POS	IR 96-08	M	N	Unit 1 RWT liner inspection.	Licensee satisfied commitments to inspect fiberglass liner in RWT. Results sat.
8/26/96	POS	IR 96-14		N	Engineering activities associated with leak in class 3 line to containment fan cooler in accordance with GL 91-18 and GL 90-05 for non-code repair.	
6/8/96	STREN	IR 96-08	M	N	ISI activities for SG and reactor vessel eddy current examinations reviewed.	Examinations well-planned, performed and managed by very talented and knowledgeable personnel.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
6/6/96	VIO	IR 96-12 , EA-96-249		N	USQ, involving taking a normally open EDG fuel oil line isolation valve to the closed position and the use of operator action to open the valve on EDG start, cited at SL III.	Licensee determined that small increase in the probability of failure could be overcome by admin processes.
7/12/96	VIO	IR 96-12 , EA 96-236		N	Two SL IV violations cited for configuration management control problems involving inaccuracies in procedures and drawings due to design changes.	Lack of appropriate pre and post-installation review.
8/3/96	VIO	IR 96-11	M	N	Prelubrication of valves prior to surveillance testing in 1995 resolved as being a violation of 10CFR50 Appendix B criterion XI.	Procedure which required prelube had not been considered for potential effects on stroke time.
10/18/96	VIO	IR 96-17		L	Failure to satisfy QA plan requirements in the development of design modifications to the Unit 1 Nuclear Instrumentation system.	Failure to perform independent verifications of design outputs (drawings). Multiple examples. Also, failure to perform adequate validation and verification of software for incore monitoring.
6/3/96	WEAK	IR 96-12 , EA 96-236	M	S	High temperature condition in Unit 2 rod control cabinet room due to failure of an air conditioner led to indications of rod control problems. Indications later shown to be false. Also, high temp condition led to failure of a diverse turbine trip relay.	Failure of an air conditioner. Further review by licensee/NRC showed air conditioner was temporary equipment installed without design controls during pre-op test phase.
7/12/96	WEAK	IR 96-12		L	Licensee vertical slice inspection of EDG, HPSI, and CCW systems revealed numerous deficiencies in procedure, design document and FSAR accuracy.	Lack of proper configuration control over time.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
10/12/96	WEAK	IR 96-15	PS	N	No evidence could be found that containment leakage detection systems satisfied leak-before-break assumptions for detectability or seismicity.	Lack of design basis documentation.
MAINTENANCE						
11/1/95	NCV	IR 95-18 - NCV 95-18-05		S	ICI wiring error during RX head installation last RFO.	Personnel Error
2/17/96	NCV	IR 96-01, IR 96-04	PS	N	Work on 1A ECCS suction header through-wall leak revealed strong FME, but poor HP work practices observed regarding contamination control resulted in NCV.	Personnel work practices (workers ignored RWP requirements)
5/8/96	NCV	IR 96-06		N	Lack of verified (controlled) copy of procedure identified at CCW heat exchanger jobsite.	Failure of Maintenance workers to properly verify procedures prior to beginning work.
5/17/96	NCV	IR 96-08		N	Failure to verify the currency of procedure in use at jobsite	Cognitive personnel error
5/17/96	NCV	IR 96-08		N	Failure to satisfy requirements for "independence" on the part of independent verifier.	Cognitive error.
8/3/96	NCV	IR 96-11		N	Review of outage freeze seals indicated that one freeze seal had been left unattended for approximately one hour.	Stop work order by management for cleanup of the Unit 1 pipe tunnel resulted in directing freeze seal watch to another area to make room for trash being hauled out of area.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
10/12/96	NCV	IR 96-15		N	QA identified 3 areas of noncompliance with M&TE controls; one lack of a cal sticker, lack of segregation of sat and unsat M&TE, lack of an individual controlling M&TE.	M&TE storage area had been relegated to a self-service facility, counter to QA plan requirements. Indications are that a lack of personnel contributed.
2/17/96	NEG	IR96-01		N	Freeze seal procedure lacked objective criteria defining when a freeze seal existed.	Procedural Weakness
2/17/96	NEG	IR 96-01		L	Weakness identified in I&C calibration procedure - lack of detail provided for safety related calibrations.	Procedural Inadequacy
3/30/96	NEG	IR 96-04		N	Control of maintenance procedures was such that an outdated procedures could, programmatically, wind up in the field due to their inclusion in previously prepared packages. Licensee corrective action adequate.	Programmatic vulnerability.
6/8/96	NEG	IR 96-08		N	Application of ladder and scaffolding programs appears to be minimally compliant with licensee's self-imposed requirements. Many scaffolds and ladders required caution tags or had not been removed promptly after use.	
11/6/95	OTHER	IR 95-21		S	Failure of EDG 2A relay sockets. Potential common mode failure.	Equipment Failure
12/9/95	OTHER	IR 95-22		L	2A2 RCP seal pkg lower seal destaged due to reverse pressure across seal.	Filling RCS Before Coupling RCP

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
12/20/95	OTHER	IR 95-22		S	RX vessel flange inner O-ring groove pitting resulted in cooldown and head removal for repair.	Pitting - Localized Corrosion
3/30/96	OTHER	IR 96-04		S	Maintenance underwent major departmental reorganization. Selected supervisors' qualifications found satisfactory per TS requirements.	
5/22/96	OTHER			L	V 3483 (SDC Suction Relief) setpoint found out-of-spec high, rendering valve incapable of performing its intended function.	Root cause not established. Either tampering or poor maintenance practices (most likely).
6/3/96	OTHER	IR 96-08		N	EDG reliability calculations indicate that EDG reliability is in keeping with SBO assumptions	
6/8/96	OTHER	IR 96-08		N	Review of maintenance backlog indicated that licensee had a plan for backlog reduction in place but has yet to meet goals.	
8/3/96	OTHER	IR 96-11	E	N	Licensee's activities regarding maintenance of rod control system were adequate.	
9/7/96	OTHER	IR 96-14		N	Apparent improper use of M&TE for meggering NI cabling identified. Lack of tracability from M&TE to work order due to borrowing the equipment from one job for use on another job. URI.	Failure to follow procedure.
9/9/96	OTHER	IR 96-15		S	Set screw/locknut in Trip Circuit Breaker 5 sheared off during surveillance testing and was later found in breaker cubicle.	Root cause pending. Initial indications were of apparent hydrogen embrittlement.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
2/17/96	POS	IR 96-01		N	Noted improvements in housekeeping and material conditions.	
3/30/96	POS	IR 96-04		N	10 maintenance activities observed during inspection period. No significant deficiencies noted.	
5/11/96	POS	IR 96-06		N	Observations of Pressurizer Code Safety Valve testing and repair	No deficiencies noted
5/11/96	POS	IR 96-06		N	Preparations for Unit 1 reactor vessel ISI.	In accordance with requirements and showed good outage planning.
5/11/96	POS	IR 96-06		N	Observations of maintenance activities in containment (Unit 1 outage) involving valve packing replacement and modification.	No deficiencies noted.
5/11/96	POS	IR 96-06		N	MSSV testing - Unit 1 Outage	Review of test data and methodology sat.
5/11/96	POS	IR 96-06	E	N	Polar crane load rating calc and Unit 1 head lift.	No deficiencies identified.
6/8/96	POS	IR 96-08		N	Repair work for Unit 1 fuel transfer tube isolation valve.	Conducted satisfactorily
6/13/96	POS	IR 96-09		N	Maintenance activities associated with Unit 1 reactor head lift and Unit 2 feed reg valve work.	Work conducted satisfactorily.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
6/20/96	POS	IR 96-09	O	L	Loss of 3 Wide Range Nuclear Instrument Channels on Unit 1 resulted in entering TS AS for NIs.	Operators prompt and accurate in verifying shutdown margin requirements.
7/20/96	POS	IR 96-11	O	N	Post-outage walkdown of Unit 1 containment indicated excellent cleanliness.	
9/7/96	POS	IR 96-14		N	ESF response time testing procedure identified as weak in detail. CR resolution to change procedure appropriate. Review of last 4 performances of procedure for each unit indicated that TS satisfied for completion of all channels.	
9/7/96	POS	IR 96-14		N	Review of 20 work orders indicated appropriate control of work scope.	
2/24/96	VIO	IR 96-04		N	Acceptance criteria specified for CEDM coil resistances in PC/M package found varied and unclear. Criteria were not properly applied and values outside of specifications were not documented and resolved.	Failure of I&C System Supervisor to adhere to test criteria compounded by failure of I&C management to identify obvious errors during post-work review.
6/13/96	VIO	IR 96-09		N	A review of overtime for a one month period indicated that overtime guidelines were routinely exceeded without prior (or subsequent) approval. 56 examples cited for 5 individuals.	Failure of management to track the use of overtime as specified in site procedure. Procedure poorly defined requirements.
7/6/96	VIO	IR 96-09	E	N	Review of testing activities for containment blast dampers indicated that violations of 10 CFR 50 App. B and site procedures existed. Two violations cited.	Failure to properly implement App. B and QA plan as they related to documenting as-found and as-left data.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
10/12/96	VIO	IR 96-15		N	M&TE used in testing control channel NI during installation was not logged out against the work order for the job. Tracability was thus lost.	M&TE was borrowed from another job, in violation of procedural controls.
10/18/96	VIO	IR 96-17		N	Failure to initiate a condition report for a deficiency when cable labeling for Unit 1 B channel NI detector did not agree with drawing.	Resulted in miswiring the detector.
2/24/96	WEAK	IR 96-04		N	Maintenance practices for Steam Bypass and Control System and Feedwater Regulating valves found weak in inspection following 2/22/96 Unit 1 trip.	Poor preventive maintenance on SCBC valve air lines and FRVs.
OPERATIONS						
1/7/96				N	SALP CYCLE 12 BEGINS	
3/31/96	EMERG	IR 96-06	PS	N	Operator response to RCS leakage through CVCS system.	Operators effective at identifying/isolating leak; however, Unusual Event call was non-conservative in that the call was delayed to allow a 1 hour RCS inventory balance to be calc'd when other information indicated that excessive leakage existed.
7/13/96	EMERG	IR 96-11	M	L	NOUE declared when 2C charging pump check valve stuck open, creating bypass flowpath from charging pumps to VCT. Operators timely in declaring event.	Check valve stuck open due to possibly generic effects of pulsating low flow in a continuous service valve.
8/9/96	EMERG	IR 96-14	M	L	NOUE declared due to RCS leakage in excess of 1 gpm unidentified.	Charging pump packing leakage identified as source of leak. Operators correctly applied EAL.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
2/22/96	LER	LER 335/96-002	M	S	Dropped CEA led to declaration of NOUE and plant shutdown. During shutdown, failure of air line to a FRV led to manual trip.	
5/29/96	LER		M	L	Suspected loss of approximately 1200 condenser tube cleaning balls reported to state/NRC. Balls were found unaccounted for during an inventory balance. Suspected that balls were released to Atlantic Ocean.	
6/2/96	LER		M	L	Non-safety related breaker alignments to support Unit 1 outage resulted in loss of audible count rate amplifier for containment. Audible counts lost in containment for approximately 5 minutes during fuel movements.	Operators not aware that containment amplifier was going to be affected by lineup. Control room amplifier not affected.
10/18/95	NCV	IR 95-18 - NCV 95-18-07		L	Missed RCS Boron sample surveillance.	Personnel Error
10/19/95	NCV	IR 95-18 - NCV 95-18-06		S	Missed shift CEA position indication surveillance.	Personnel Error
11/21/95	NCV	IR 95-21 - NCV 95-21-04		L	Failure to maintain Penetration Log.	FTF Procedure
1/5/96	NCV	IR 95-22 - NCV 95-22-01	PS	N	Several deficiencies in procedure change process implementation identified. Expired or cancelled TCs found in control rooms and hot shutdown panel.	Failure to Properly Implement Procedures

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
4/22/96	NCV	IR 96-06	E	L	Unauthorized breach in RAB fire barrier during installation of CCW piping modification.	Operators showed good attention to detail in identifying two holes bored in wall. Engineering failed to account for the effects of modification installation in fire rated assembly, as required by procedure for engineering packages.
5/14/96	NCV	IR 96-08		L	Fuel movement begun with only one of two required wide range NI channels operable. Condition identified and fuel movement secured after approximately 1 ft of travel.	Poor communication between control room operators performing surveillance testing (which inop'd NI) on the subject channel and the refueling center.
8/3/96	NCV	IR 96-11		L	QA audit discovered that corrective action documents had been closed without being forwarded to originator for approval (as required by procedure). NRC identified that personnel without signature authority were closing documents.	Rush to close out STARs (old corrective action document) when CRs (new corrective action document) were instituted.
8/6/96	NCV	IR 96-14		N	Operator observed not walking down control boards prior to assuming shift, as required by procedure. Operator terminated.	
9/9/96	NCV	IR 96-15	PS	L	Licensee had not complied with requirements for ensuring that operators read training bulletins required to maintain requalification current. Licensee identified issue, with independent NRC findings.	Failure to follow procedures.
9/18/96	NCV	IR 96-15		L	Licensee bypassed the wrong ESFAS steam generator low level channel in response to channel inoperability. Resulted in a failure to satisfy TS action statement requirements.	Poor labeling of bypass key slots

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
12/1/95	NEG	IR 95-21		N	Recurrent non-valid alarms when starting fire pumps were not documented as operator workarounds. Voltage dips associated with such starts were contributors to a trip previously.	FTF Procedure
12/1/95	NEG	IR 95-21		N	Operators unable to effectively obtain I&C setpoints from computer after hard copies were removed from control room.	Inadequate Operator Training
12/1/95	NEG	IR 95-21		N	Unit 2 procedures and valve deviation log used to cycle Unit 1 cross connect valves.	Valve Position Administrative Controls
12/1/95	NEG	IR 95-21		N	SDC Procedure required natural circ-related surveillance prior to establishing RCS pressure boundary. Natural circ not possible without pressurization.	Procedural Inadequacy
12/27/95	NEG	IR 95-22	E	S	FRG meeting suffered/items deferred due to lack of OPS/Eng'g attendance at meeting. Major issues at meeting affected OPS/Eng'g.	Lack of Attendance at FRG
1/5/96	NEG	IR 95-22		N	Several procedural deficiencies and calculational errors identified in reload physics test procedure.	Inadequate Procedure Review and Execution
2/15/96	NEG	IR 96-01	M	N	Tours of ECCS rooms revealed several active leaks. Licensee could not explain how (if) FSAR assumptions on ECCS leakage were satisfied. Later review of FSAR indicated leakage within assumptions.	Material Condition
3/7/96	NEG	IR 96-04		N	Licensee failed to place a CEA which had been declared administratively inoperable in the equipment out-of-service log. CEA was operable per TS.	Operator oversight.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
3/7/96	NEG	IR 96-04		N	During MTC testing, inspector noted that boron concentration had been verified at 30 minute intervals, vice 15 minute intervals as called for in procedure.	Poor attention to detail.
6/3/96	NEG	IR 96-08		N	Poor practice observed in spent fuel pool operations. Fuel assemblies were left hanging in an "on deck" status while awaiting upender availability. Also, operator left machine unattended with fuel hanging at least once per movement.	"On deck" status was an effort to expedite reload. Operator leaving machine was due to inadequate manpower - operator had to operate upender controls, which were mounted on wall.
7/16/96	NEG	IR 96-11		L	2C auxilliary feedwater pump tripped on overspeed during post-maintenance testing.	Operator error in not properly implementing cautions in a procedure.
7/20/96	NEG	IR 96-11	M	L	2 operating charging pumps tripped when maintenance induced an erroneous level signal into reactor regulating system. Letdown isolated by operators. Upon reinitiating letdown, minor waterhammer event occurred.	I&C failed to recognize that reactor regulating system would be affected by their activities. Operators had charging pump backup switch in wrong position, leading to cessation of charging flow.
10/1/96	NEG	IR 96-15	O	N	2B HPSI pump discharge pressure noted to be 880#. Operators could not explain it, had not noticed it. Was due to a pump run a week before.	Poor attention to detail.
11/16/95	OTHER	IR 95-21	M	S	Unit 1 manually tripped when 1B MFRV locked in 50% position. Root cause - degraded power supply, compounded by voltage dip on starting both station fire pumps.	Long-Standing Equipment Problem
11/21/95	OTHER	IR 95-21		S	Light socket failure during lamp replacement results in loss cooling to 1A Main Transformer. Unit downpower to ~60%.	Equipment Failure

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
1/26/96	OTHER	IR 96-01		N	Inspection of corrective action program revealed timely action on the part of management, but weaknesses in plans for tracking progress on personnel performance and procedure quality improvement.	Corrective Actions
3/1/96	OTHER			L	Management Changes - T. Plunkett succeeds G. Goldberg, C. Wood replaces L. Rogers as manager of SCE, C. Marple replaces C. Wood as Ops Supervisor.	
3/10/96	OTHER	IR 96-04		L	Unit 1 downpowered to 97.5% due to hot leg stratification and flow swirl which resulted in higher than actual indicated reactor power.	Hot leg stratification.
4/4/96	OTHER	IR 96-06		L	Interim Operations Manager (H. Johnson) named.	
4/10/96	OTHER	IR 96-300		N	4 of 4 SRO candidates passed SRO examination. In 3 of the cases, performance was marginally satisfactory. No generic candidate weaknesses identified.	
4/20/96	OTHER	IR 96-06		S	Unit 2 downpowered and taken off-line due to low pressure condition in auto-stop oil. Operators observed to control evolution well.	Blockage in auto-stop oil line orifice which prevented buildup of auto-stop oil pressure. Only negative aspect was crowding of control panels by control room SROs during portions of evolution.
5/31/96	OTHER	IR 96-08	M	S	Blown fuse resulted in closure of all Unit 2 MSR temperature control valves, resulting in a 5% load rejection.	Moisture found in a junction box following heavy rain.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
6/27/96	OTHER	IR 96-09	E	L	Site reorganization announced which would place almost all engineering functions (system engineering, STAs, test engineers) under Engineering. Also, Outage Management folded into a global work planning group under the Plant General Manager.	
3/12/96	POS	IR 96-04		S	Licensee disposition for deficiency noted in 1 boroflex panel (top 15" missing) found satisfactory. FRG treatment of issue found appropriate.	
3/29/96	POS	IR 96-04		N	Operator requalification program found to be supporting management expectations for operations and covering timely and important topics.	
3/30/96	POS	IR 96-04		N	Review of 5 clearances indicates better attention to detail than had been observed in past.	
4/10/96	POS	IR 96-300		N	Simulator performed well throughout SRO qualification testing.	
4/28/96	POS	IR 96-06		N	Operators performed well during Unit 1 RFO shutdown.	Communications formal, excellent use of annunciator response procedure. Performance of rod drop time testing a noteworthy initiative.
5/2/96	POS	IR 96-06		N	Good performance by operators and test personnel during integrated safeguards testing on Unit 1. 1B EDG output breaker failed to close during first test. Operators handled situation well.	
5/5/96	POS	IR 96-06		N	Reduced inventory operations conducted well by operators.	

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
5/11/96	POS	IR 96-06		N	2 clearances audited, both correct.	
5/14/96	POS	IR 96-08		N	Fuel movements during Unit 1 core offload and reload performed well.	
5/24/96	POS	IR 96-08	M	S	Rod control system failure resulted in inability to move (electrically) 4 CEAs. Operators conservatively interpreted TS to require shutdown in this instance. Situation complicated by an out of service Startup Transformer.	Operators conservative in interpreting TS, plant organizations provided timely support with lists of equipment which would be inoperable when the main generator was tripped.
6/6/96	POS	IR 96-08		S	Unit 2 manually tripped due to high main generator gas temperature due to failed temperature control valve.	Operators acted promptly and correctly in tripping the unit. Post trip response of both plant and operators was good.
6/8/96	POS	IR 96-08		N	3 QA audits reviewed	Broad in scope, appropriately focused, indicated an aggressive application of quality standards.
6/8/96	POS	IR 96-08		N	3 QA Audits reviewed	Broad in scope, focused on weak areas. Aggressive application of standards evident in the number of findings cited.
6/19/96	POS	IR 96-09		N	Unit 1 reduced inventory preparations and execution.	Controls were appropriate.
7/5/96	POS	IR 96-09		N	Unit 1 reduced inventory preparations and execution.	Mid-Loop controls effective. Licensee attention and management oversight excellent.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
7/8/96	POS	IR 96-11	M	N	Licensee preparations for Hurricane Bertha proactive and responsible.	Hurricane forecasts showed storm missing area, but licensee prepared as though it would change course.
8/31/96	POS	IR 96-14	M	L	Operators manually tripped Unit 1 due to indications of gas accumulating in the 1B transformer. Operating crew self-assessment following event viewed as excellent.	Operators acted quickly, conservatively, and in accordance with plant procedures.
9/2/96	POS	IR 96-14		N	Unit 1 startup conducted well. Operator action to terminated first approach to criticality when Xe decay drove estimated critical conditions near allowed band limits was appropriate.	
9/9/96	POS	IR 96-15	PS	N	Control room watchstanding practices satisfactory. Watchstanders maintained a professional environment and were attentive to plant parameters.	
10/9/96	POS	IR 96-15		N	Surveillance testing of 2A EDG performed well. Good use of Real Time Training Coordinators	
7/9/96	STREN	IR 96-11		N	Two entries into reduced inventory made during inspection period. Strong management involvement in scheduling around Hurricane Bertha. Reduced inventory operations continues to be a strength.	
11/11/95	VIO	IR 95-21 - VIO 95-21-02		N	Tech. Spec. equipment not specified for IV on Equipment Clearance Order.	FTF Procedure
11/20/95	VIO	IR 95-21 - VIO 95-21-01		N	Valve discovered Closed vice Locked Closed as specified on Equipment Clearance Order.	FTF Procedure

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
11/27/95	VIO	IR 95-21 - VIO 95-21-03		L	Missed RCS Boron sample surveillance - Repeat from IR 95-18.	Personnel Error
1/5/96	VIO	IR 96-04		L	NLO failed to employ procedure when placing EDG fuel oil tank on recirculation for chemistry. As a result, he improperly performed the evolution by isolating the discharge of the EDGFO transfer pump, which resulted in an inoperable EDG.	Failure to use procedure, failure to notify control room of evolution.
1/22/96	VIO	IR 96-03 - EA 96-040	E	L	Boron dilution event due to operator leaving control panel while dilution was in progress. Weak command and control, procedural adherence, and short-term turnover. Additionally, OP for boration/dilution not consistent with FSAR and no 50.59 performed.	Operator error, poor short term turnover, poor command and control
1/26/96	VIO	IR 96-01 - VIO 96-01-01		N	Violation identified regarding temporary changes to procedure which changed intent and which were approved for use without prior FRG review.	Procedure Control
2/22/96	VIO	IR 96-04	O	N	Operators found adding boric acid to VCT without procedure in hand, as required by conduct of operations procedure. Additional example of EEA 96-040.	Procedures were put away to tidy up control room prior to NRC senior managers' tour prior to SALP meeting
3/27/96	VIO	IR 96-04		N	Operators failed to properly log boron dilution evolutions. Global log entry was made at the beginning of the shift stating dilutions would be made; however, procedure required each dilution to be logged.	Management direction to operators allowing global log entries for reactivity manipulations during transient conditions (e.g. uppower) which was not in accordance with Conduct of Operations procedure.
8/19/96	VIO	IR 96-16		N	Operations key controls found inadequate for keys associated with control room evacuation/remote shutdown	Keys found uncontrolled at normal/isolate switch boxes for unit 2 PORVs

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
12/1/95	WEAK	IR 95-21		N	SDC procedure contained conflicting values for RX cavity level requirements. Procedure had been approved since emphasis on accuracy stressed.	Procedural Weakness/Inadequate Review
12/1/95	WEAK	IR 95-21		N	CCW sample valve showed dual indication without corrective action documentation initiated.	FTF Procedure
12/1/95	WEAK	IR 95-21		N	Clearance in place to isolate N2 from CST to facilitate pressure switch replacement for nine days without work order being written.	Poor Corrective Actions
12/1/95	WEAK	IR 95-21		N	Followup to previous inspection findings indicated a weakness in followthrough in addressing deficiencies.	Corrective Actions
12/5/95	WEAK	IR 95-22	M	N	ESFAS cabinet doors found unlocked following maintenance work - I&C error. Log entries associated with work were not complete.	Poor Logkeeping/Attn to Detail
1/5/96	WEAK	IR 95-22	M	L	U2 manual RX trip on high generator H2 temp due to failure of temp control valve. Operator awareness of RPS status post-trip poor. Inspection of post-trip review(for current trip as well as past trips)indicated weaknesses in the rigor of post-trip reviews	Temp Control Valve Failure. Additionally, failure to identify unexpected reactor trip signals which came in during trip.
2/17/96	WEAK	IR 96-01	E	N	Numerous deficiencies identified in instrument air system walkdowns, including drawings accuracy, ONOP adequacy, and annunciator response procedure accuracy.	Procedural Inadequacy

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
2/24/96	WEAK	IR 96-04		S	Procedural weakness results in attempting to synchronize main generator with grid with generator disconnect links open.	Procedure review weakness - lack of verification that disconnect links were closed.
4/14/96	WEAK	IR 96-06	E	N	Configuration Control issues resulted from ESF system walkdowns.	Walkdowns of both units' CS, ICW and IA systems indicate programmatic failures in incorporating design changes into drawings, the FSAR and operating procedures. Unresolved item tracking expansion of inspection scope to include instrumentation setpoints.
4/14/96	WEAK	IR 96-06	E	N	ICW system walkdown.	Results indicate weaknesses in procedure-to-procedure agreement, labeling, and surveillance requirements, in addition to configuration control issues discussed separately.
8/6/96	WEAK	IR 96-14		N	Operator aids found in various areas of the plant which were not in agreement with system operating procedures.	Type of aids identified did not meet criteria for inclusion in operator aid program and were not controlled.
PLANT SUPPORT						
8/14/96	EMERG	IR 96-16	O	L	NOUE declared due to security alert resulting from discovery of tampering. A glue-like substance had been injected into Unit 1 and 2 hot shutdown panel key lock switches.	Event was similar to discoveries made in July of a glue-like substance in padlocks.
3/1/96	NCV	IR 96-04		N	Inspection of Hot Tool Room identified several tools which were either not painted purple (as required) or which slightly exceeded limits for contamination.	Attention to detail in tool storage and surveying.
8/12/96	NCV	IR 96-15	O	L	Failure to follow procedure resulted in the inoperability of the Unit 1 containment radiation monitor following PASS panel operability check.	Poorly written procedure, compounded by weak execution by chemistry personnel. Good attention to detail be NLO in identifying condition

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
12/1/95	NEG	IR 95-21		N	Rad survey results unavailable for B hot leg work. Surveys performed but not documented.	Failure to Document RAD Survey
2/7/96	NEG	IR 96-02		N	Two areas for improvement identified in graded EP exercise - Need for management to become more involved in assuring correctness of info being provided in offsite notification forms and need to refine C&C for damage control teams.	Inconsistencies in the use of Florida Notification Message Form. Confusion existed between NLOs dispatched from OSC and Control room for similar repair missions.
5/15/96	NEG	IR 96-08		N	Observations of radiation worker practices revealed inconsistencies in the application of site practices (e.g. wearing of dosimetry, donning/doffing PCs).	
7/26/96	NEG	IR 96-10		L	QA audit of Fitness for Duty program identified problems including personnel with negative tests being recorded as positive (and vice versa) and personnel randomly selected for testing not being tested (even though they were available).	Failure to follow procedures and lack of both attention to detail and self-checking cited as root causes.
8/9/96	NEG	IR 96-14		N	Examples of poor radiological housekeeping observed. Barrels for anti-C collection located outside of contaminated areas, use of multiple, undefined, stepoff pads, contaminated trash overflowing contaminated area boundaries.	
8/23/96	NEG	IR 96-16		N	Licensee extended control room access to a large number of personnel, potentially in excess of those needing access.	

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
9/19/96	NEG	IR 96-16		N	Licensee response to identification of glue in padlocks in July not thorough, as glue was later found in key lock switches.	Events believed to have occurred at same time, and licensee's initial audits included only padlocks, door locks and valve locks.
2/7/96	OTHER	IR 96-02		N	EP exercise demonstrated that onsite emergency plans were adequate and that licensee was capable of implementing them.	
3/1/96	OTHER	IR 96-04		N	Licensee found to be utilizing ALARA techniques and making progress at reducing collective doses for staff.	
3/1/96	OTHER	IR 96-04		N	Licensee found to be implementing adequate RP controls and monitoring individual exposures per code requirements.	
3/1/96	OTHER	IR 96-04		N	Housekeeping in RABs generally good; however, equipment storage areas found cluttered and untidy.	
3/14/96	OTHER			L	Management change. A. Desoiza (human resources manager) replaced by Lynn Morgan (from TP)	
8/12/96	OTHER	IR 96-14	O	L	Operator identified low flow in Unit 1 containment air monitor. Condition the result of Chemistry personnel failing to properly secure from a PASS system surveillance. URI	Failure to follow procedure.
2/7/96	POS	IR 96-02		N	Observations of licensee performance in CR, TSC, OSC, and EOF indicated good command and control, staff utilization and staff demeanor during graded exercise.	

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
2/7/96	POS	IR 96-02		N	Licensee's onsite emergency organization was found to be well-defined and generally effective at dealing with simulated emergency during graded exercise.	
2/7/96	POS	IR 96-02		N	Communication among the licensee's emergency response facilities and emergency organization and emergency response organization and offsite authorities were good during graded exercise.	
2/7/96	POS	IR 96-02		N	Licensee made significant observation of E-Plan execution - 2 practice drills were required prior to graded exercise for management to be satisfied with performance. Management determined that more frequent drills were required to ensure readiness.	Licensee objectively questioning overall state of readiness.
3/1/96	POS	IR 96-04		N	Ongoing HP efforts to obtain accreditation of FPL electronic dosimetry program identified as a good example of department's technical capabilities.	
5/3/96	POS	IR 96-05		N	Inspection of FPL Speakout program.	Program effective in handling and resolving employee safety concerns.
6/8/96	POS	IR 96-08		N	Fire barrier inspections performed by the licensee were found to employ conservative criteria and be detailed.	
7/6/96	POS	IR 96-09		N	Review of RCP oil collection system.	System met description in FSAR and was in accordance with App R, except as allowed by approved exemption.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
9/19/96	POS	IR 96-16		N	Licensee response to August discovery of glued key lock switches satisfactory.	
2/24/96	VIO	IR 96-04	O	L	Unit 1 containment radiation monitor found out-of-service due to isolation valve which was closed to support a grab sample prior to a containment entry and not returned to the open position. Condition existed for 2 days, unknown to licensee.	Failure to follow procedure on the part of HP personnel, compounded by failure to identify condition by operators during rounds.
5/7/96	VIO	IR 96-06		N	Programmatic weaknesses identified in Fire Protection Program for medical qualification of fire brigade members.	11/62 members had expired medicals. 9/65 with expired medicals worked 60 shifts in April. 2 Fire Team leaders not listed on roster worked 31 shifts in April. 1 Fire Team member with expired medical and not on roster worked 1 shift.
8/23/96	VIO	IR 96-16		N	Failure to report tampering which occurred in July to NRC in accordance with 10 CFR 73 requirements.	Licensee made decision at the time that tampering did not affect operation of the unit.
9/14/96	VIO	IR 96-15	O	N	Unit 1 containment radiation monitor rendered inoperable after obtaining grab sample due to mispositioned valve. Repeat of previous violation.	HP tech failed to employ a procedure for restoring the monitor to service. Independent verifications were not performed.
10/18/96	VIO	IR 96-18		N	Failure to implement requirements of E Plan with respect to arrangements to staff and activate emergency response facilities from 7/22 to 10/3.	Autodialer was inoperable and backup (manual) callout capability hindered by lack of distribution of controlled and current phone number lists.
10/18/96	VIO	IR 96-18		N	Failure to take corrective actions for critique items identified after Hurricane Erin in August, 1995.	Corrective actions were still in draft format and had not been acted upon.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
10/18/96	VIO	IR 96-18		N	Failure to implement training program for EP as specified in E Plan.	Filures to provide training for multiple positions for 3 years, failure to provide initial and requal training to multiple personnel, and other examples.
10/18/96	VIO	IR 96-18		N	Failure to provide adequate EPIP for transferring OSC functions to an alternate location in event an evacuation of the OSC is required.	EPIP provided no more detail than plan, which said that EC would determine if relocation was required. No specifics on possible alternatives.
5/3/96	WEAK	IR 96-05		N	Response letters prepared by Speakout to concerned employees did not contain adequate feedback to concerned employees.	
5/3/96	WEAK	IR 96-05		N	Investigative techniques of Speakout program have the potential to reveal, inadvertently, of concerned employees.	No requirement to develop plans to ensure identity is protected.
5/3/96	WEAK	IR 96-05		N	Speakout program corrective actions were not tracked through implementation as required.	Lack of procedural specificity.
8/16/96	WEAK	IR 96-16		N	Interviews with maintenance personnel assigned to observe access to critical areas of the plant as a result of tampering event revealed that they had not been told what to look for, how to react, who to contact in the event of a problem, etc.	Ineffective communication of expectations during rapid development of an augmented security posture.
10/18/96	WEAK	IR 96-18		N	Unreliable ability to notify state within 15 minutes of a declared emergency.	Too many colateral duties assigned to Emergency Coordinator.
10/18/96	WEAK	IR 96-18		N	Inadequate program of drills to ensure availability of sufficient personnel and timliness of ERF staffing.	No drills conducted since graded exercise in February and no programmatic requirement to perform drills.

DATE	TYPE	SOURCE	SECONDARY SALP AREA	ID	ITEM	APPARENT CAUSE / COMMENTS
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SALP Functional Areas:

E	ENGINEERING
M	MAINTENANCE
O	OPERATIONS
PS	PLANT SUPPORT
SA	SAFETY ASSESSMENT & QV





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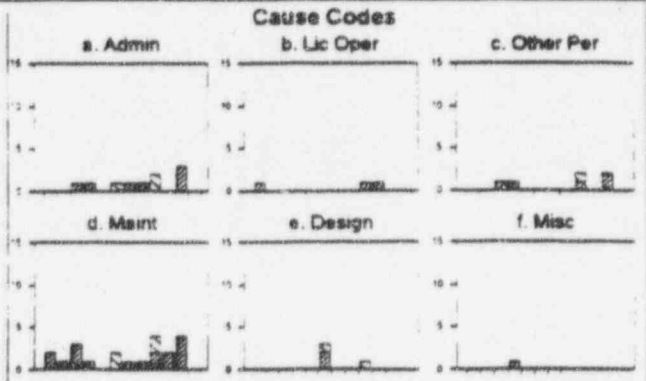
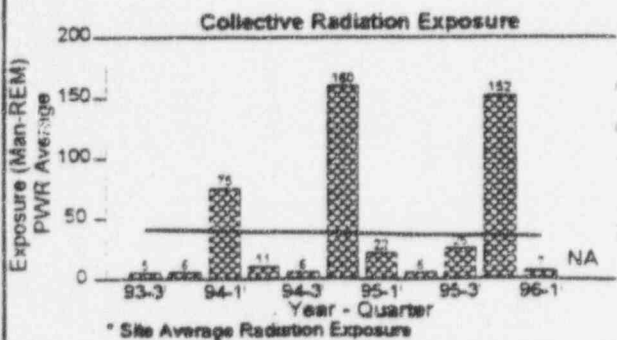
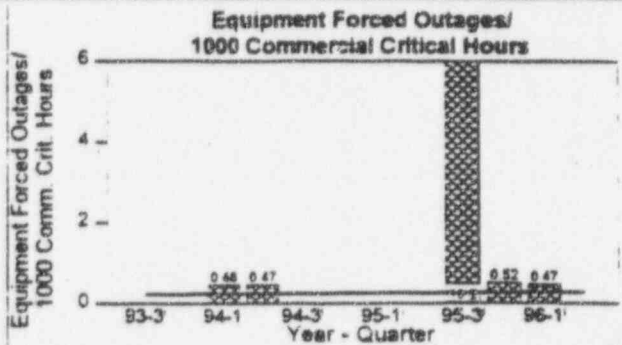
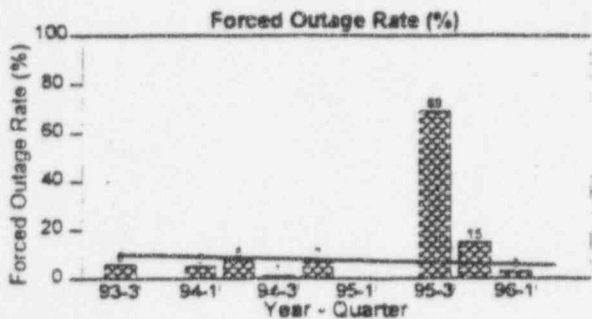
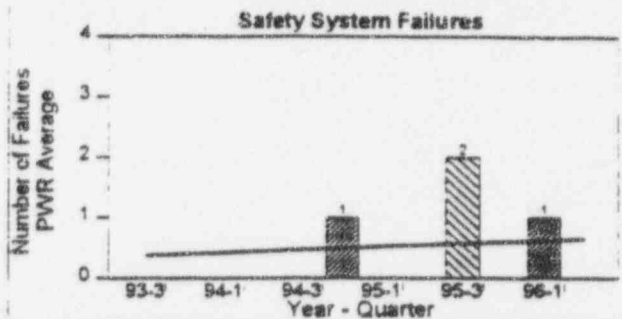
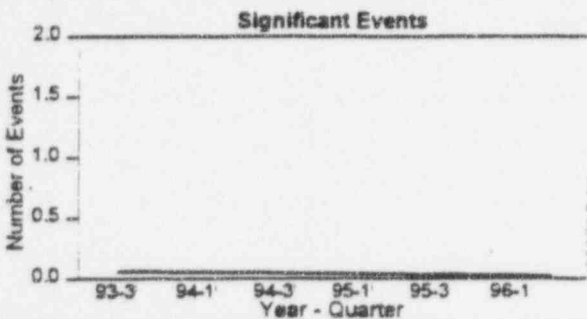
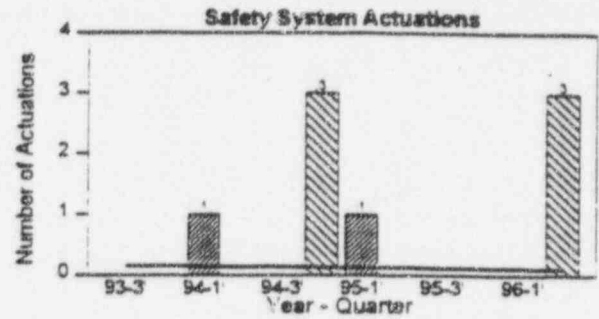
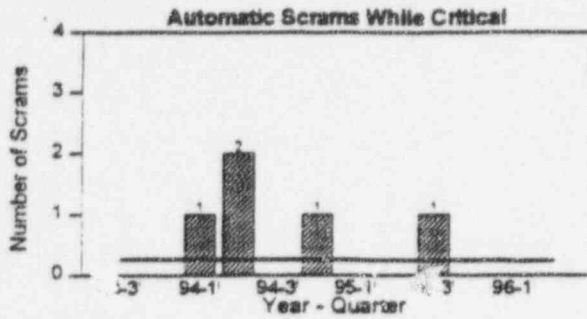
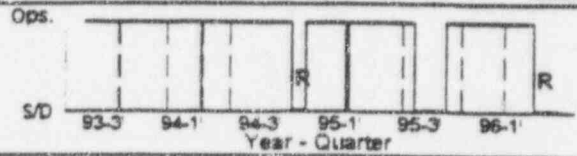
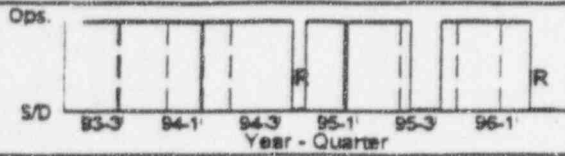
L	LICENSEE
N	NRC
S	SELF-REVEALED

ST. LUCIE 1

93-3 to 96-2

Quarterly Data

Legend:
 Shutdown < approx. 72 hrs | StartUp 
 Refueling | R | Operation 
 Industry Avg. Trend | | Shutdown 
 Not Shown Using Op. Cycle 



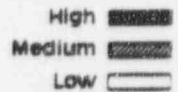
ST. LUCIE 1

Peer Group: Combustion Engineering w/o CPC

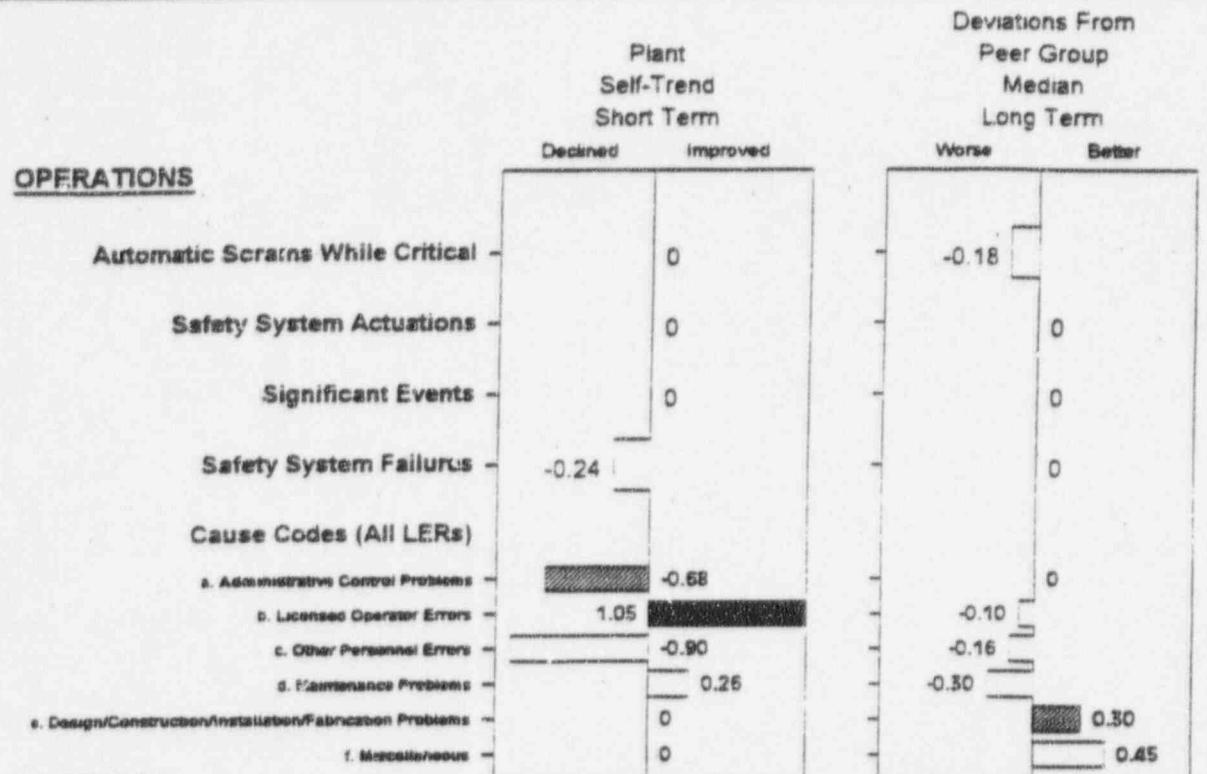
93-3 to 96-2

Trends and Deviations

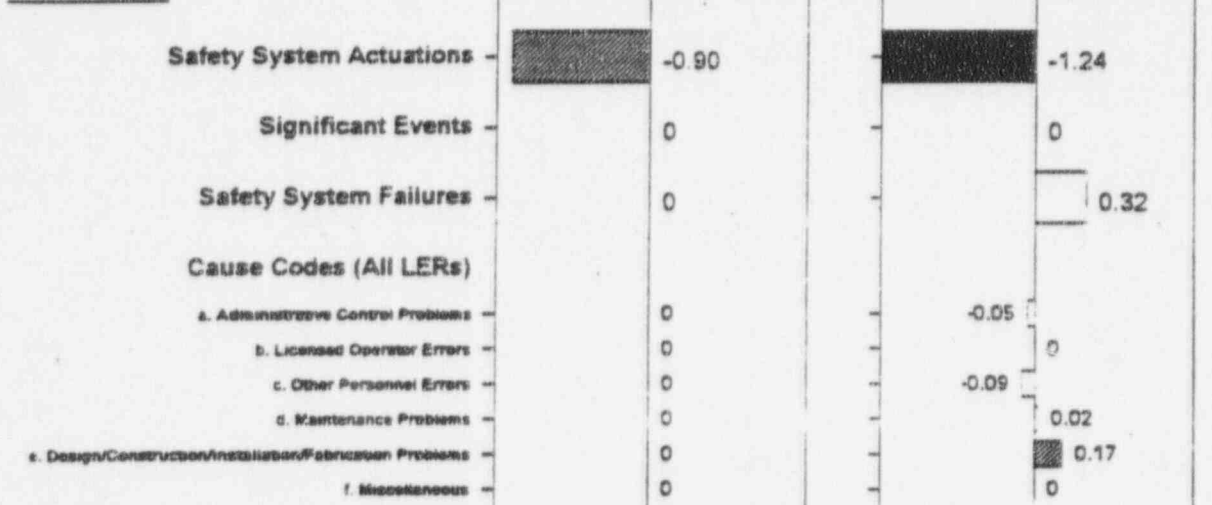
Legend: Statistical Significance



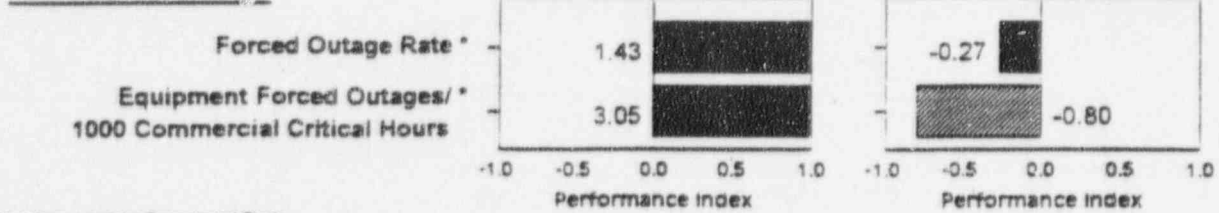
OPERATIONS



SHUTDOWN



FORCED OUTAGES



* Not Calculated for Operational Cycle

ST. LUCIE 1

PI EVENTS FOR 95-3

SCRAM 07/08/95 LER# 33595003 50.72#: 29039 PWR HIST: POWER OPERATIONS AT 100%
 DESC : THE REACTOR TRIPPED ON HIGH PRESSURIZER PRESSURE WHEN THE MAIN TURBINE GOVERNOR AND INTERCEPT VALVES WENT CLOSED DURING TESTING. THIS EVENT WAS CAUSED BY AN OPERATOR OMITTING A TEST PROCEDURE STEP.

SSF 08/09/95 LER# 33595005 50.72#: 29178
 PWR HIST: CONDITION EXISTED IN ALL MODES UP TO 100% POWER SINCE 1994
 GROUP : SAFETY AND RELIEF VALVES GROUP
 SYSTEM : REACTOR COOLANT SYSTEM
 DESC : THE POWER OPERATED RELIEF VALVES WERE FOUND INOPERABLE DURING TESTING. THE MAIN DISC GUIDES WERE INSTALLED INCORRECTLY DURING THE 1994 REFUELING OUTAGE.

SSF 08/10/95 LER# 33595006 50.72#:
 PWR HIST: EVENT OCCURRED IN COLD SHUTDOWN
 GROUP : RESIDUAL HEAT REMOVAL SYSTEMS GROUP
 SYSTEM : RESIDUAL HEAT REMOVAL SYSTEM
 DESC : BOTH TRAINS OF RESIDUAL HEAT REMOVAL WERE RENDERED INOPERABLE AS A RESULT OF A FAILED OPEN SUCTION RELIEF VALVE. THE ROOT CAUSE WAS INADEQUATE DESIGN MARGIN BETWEEN THE RELIEF AND BLOWDOWN SETPOINTS AND NORMAL SYSTEM OPERATING PRESSURE.

PI EVENTS FOR 95-4

NONE

PI EVENTS FOR 96-1

SSF 02/19/96 LER# 33596001 50.72#: 29994
 PWR HIST: EVENT OCCURRED DURING OPERATION AT 100% POWER
 GROUP : CONTROL ROOM EMERGENCY VENTILATION SYSTEM GROUP
 SYSTEM : CONTROL BUILDING/CONTROL COMPLEX ENVIRONMENTAL CONTROL SYSTEM
 DESC : THE CONTROL ROOM VENTILATION SYSTEM WAS RENDERED INCAPABLE OF PERFORMING ITS DESIGN FUNCTION WHEN TWO CONTROL ROOM ACCESS HATCHES WERE LEFT OPEN FOLLOWING MAINTENANCE. THE CAUSE WAS INADEQUATE GUIDANCE AND WORK CONTROLS FOR MAINTAINING THE BOUNDARY.

PI EVENTS FOR 96-2

SSA 06/07/96 LER# 33596007 50.72#: 30603 PWR HIST: REFUELING
 DESC : AN EDG STARTED AND LOADED WHEN A BUS LOAD SHED OCCURRED DURING A CONTAINMENT ISOLATION ACTUATION SIGNAL TEST. AN INADEQUATE PROCEDURE CONTAINED NO INSTRUCTIONS TO REINSTALL FUSES WHICH WERE REMOVED AS PART OF A PREVIOUS TEST.

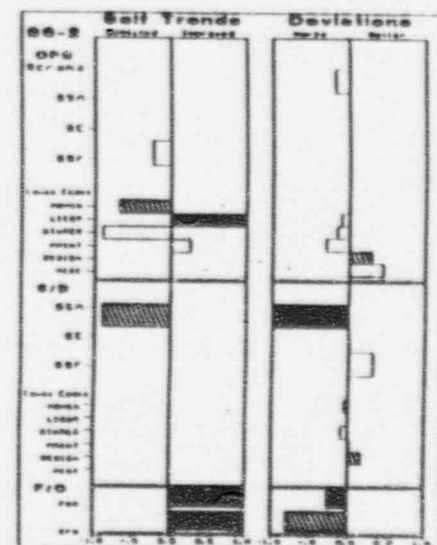
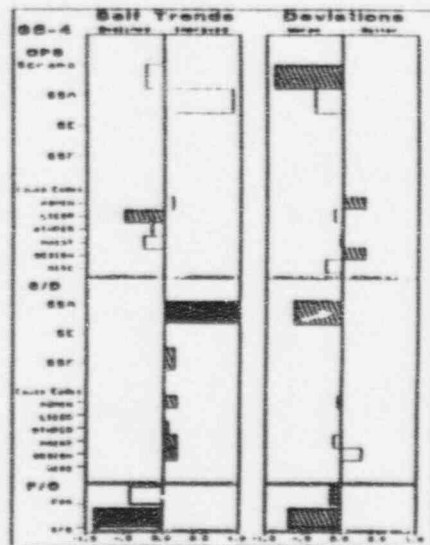
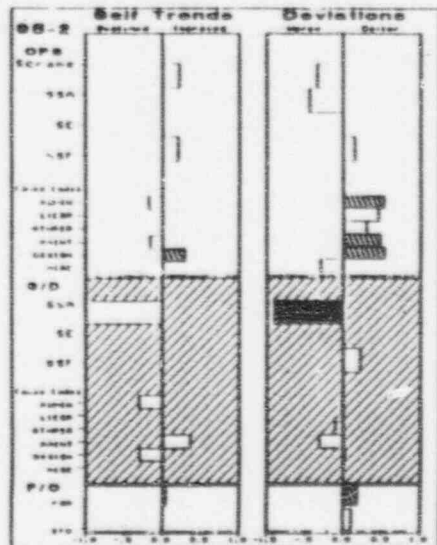
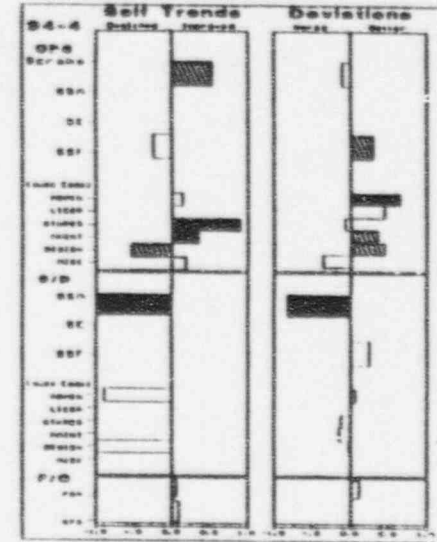
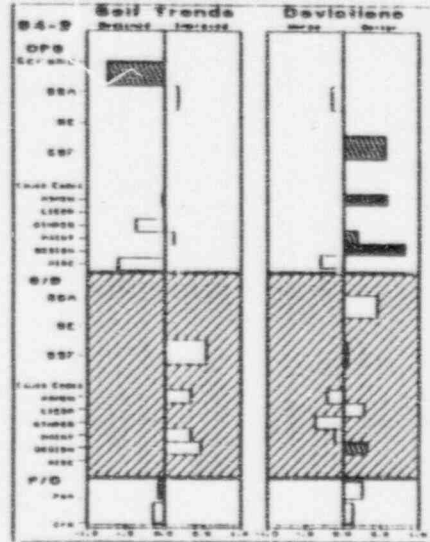
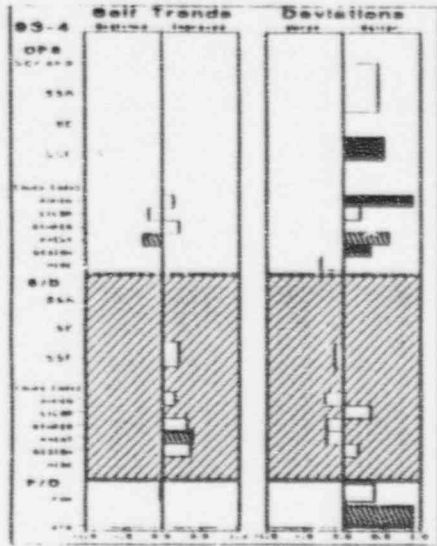
SSA 06/08/96 LER# 33596008 50.72#: 30604 PWR HIST: REFUELING
 DESC : A 4.16KV ELECTRICAL BUS LOST POWER DURING MAINTENANCE ON THE ESF SYSTEM POWER SUPPLIES. THE EDG DID NOT START BECAUSE IT WAS OUT OF SERVICE. THE POWER SUPPLY FAILED DURING INSTALLATION OF A CIRCUIT CARD.

SSA 06/08/96 LER# 33596008 50.72#: 30604 PWR HIST: REFUELING
 DESC : A SAFETY INJECTION ACTUATION SIGNAL WAS GENERATED DURING MAINTENANCE ON THE ESF SYSTEM POWER SUPPLIES. THE POWER SUPPLY FAILED DURING INSTALLATION OF A CIRCUIT CARD.

ST. LUCIE 1

Trends & Deviations

PREDECISIONAL







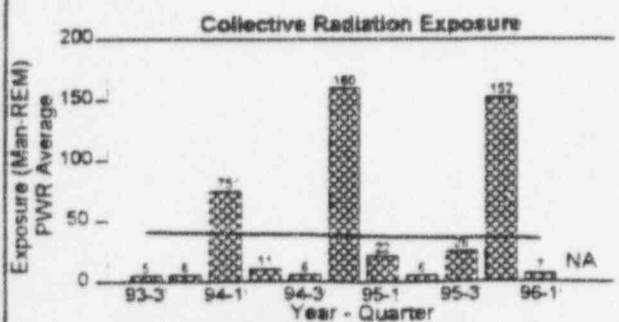
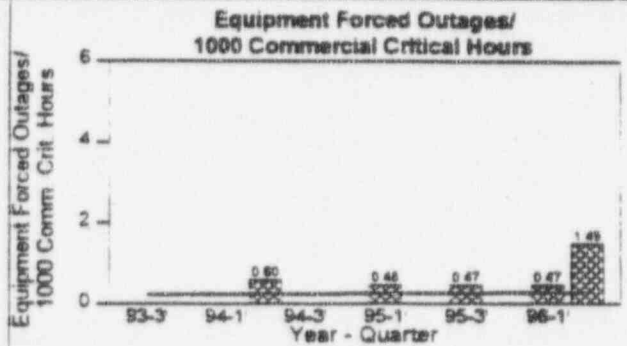
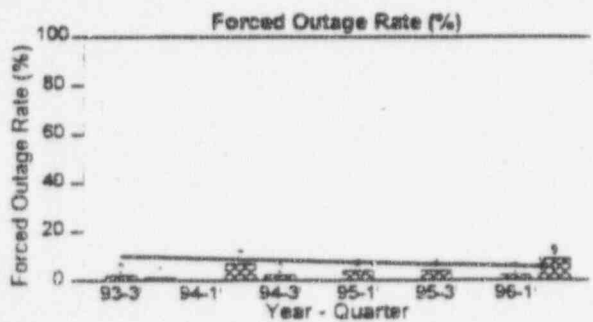
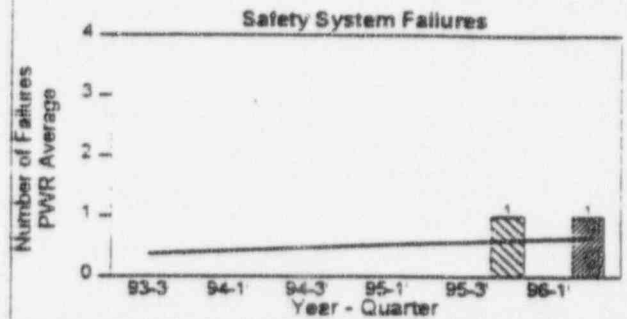
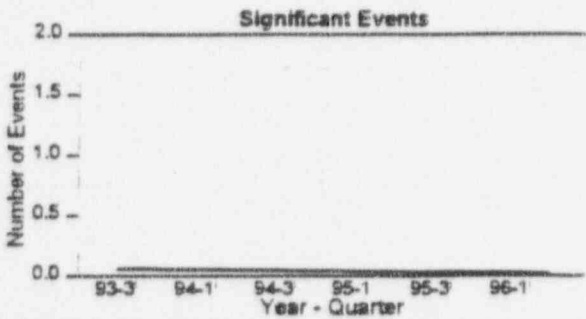
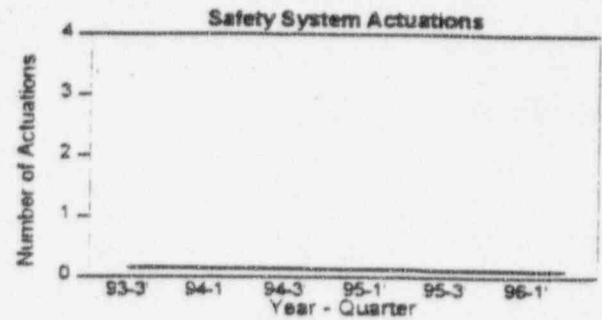
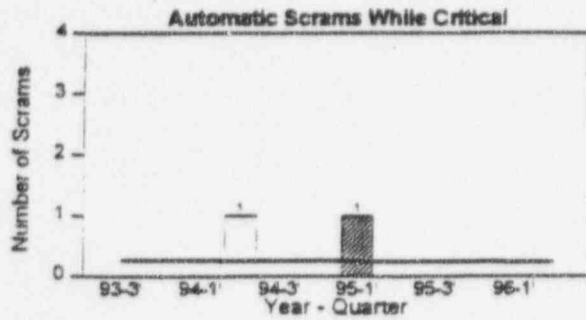
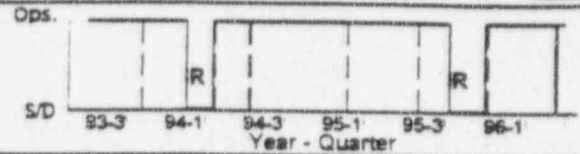
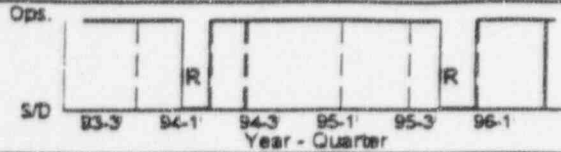
Shaded Regions: Inadequate phase data in last 2 quarters to update calculations

ST. LUCIE 2

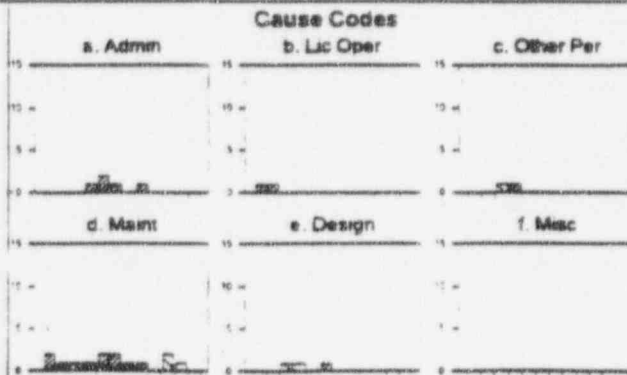
93-3 to 96-2

Quarterly Data

Legend:
 Shutdown < approx. 72 hrs | Startup 
 Refueling R | Operation 
 Industry Avg. Trend — | Shutdown 
 Not Shown Using Op. Cycle 



* Site Average Radiation Exposure

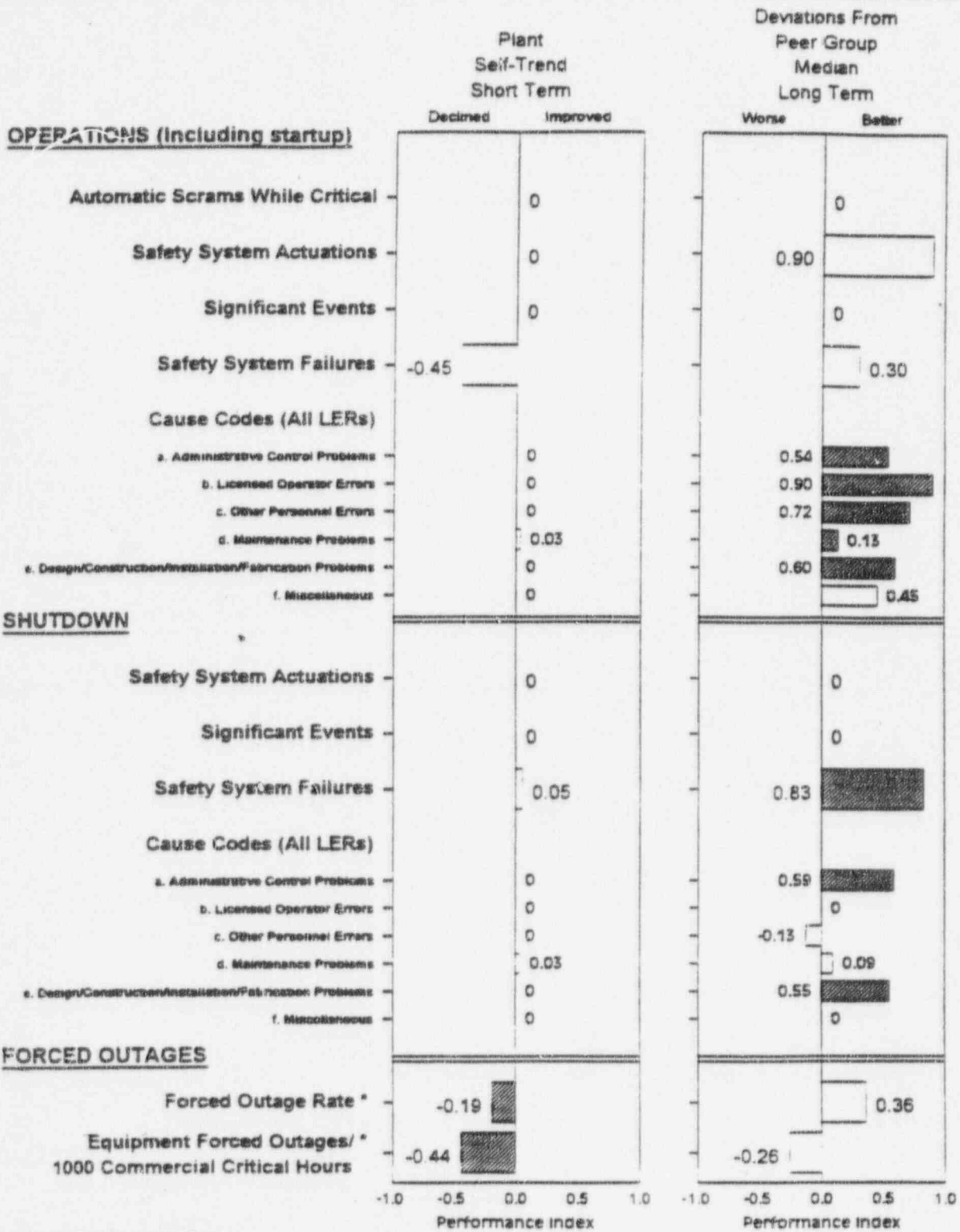
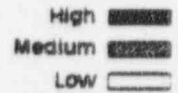


ST. LUCIE 2

Peer Group: Combustion Engineering w/o CPC
 93-3 to 96-2

Trends and Deviations

Legend: Statistical Significance



* Not Calculated for Operational Cycle

ST. LUCIE 2

PI EVENTS FOR 95-3

NONE

PI EVENTS FOR 95-4

SSF 11/20/95 LER# 38995005 50.72#: 29626
PWR HIST: CONDITION EXISTED FOR AN INDETERMINATE PERIOD OF TIME
GROUP : EMERGENCY AC/DC POWER SYSTEMS GROUP
SYSTEM : EMERGENCY ONSITE POWER SUPPLY SYSTEM
DESC : DEGRADED RELAY SOCKET CONNECTIONS CAUSED THE FAILURE OF ONE EDG, AND THE POTENTIAL FAILURE OF THE OTHER. VIBRATION INDUCED FATIGUE CAUSED THE SOCKET CONNECTION DEGRADATION.

PI EVENTS FOR 96-1

NONE

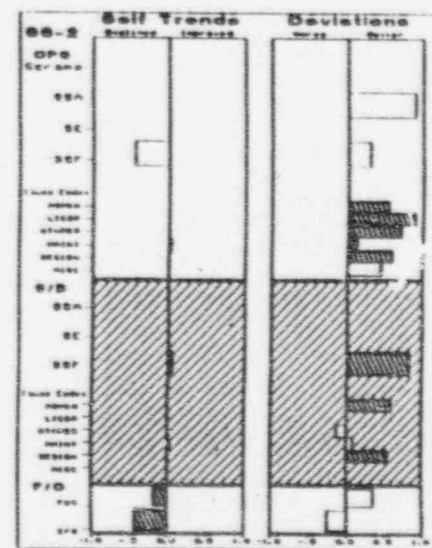
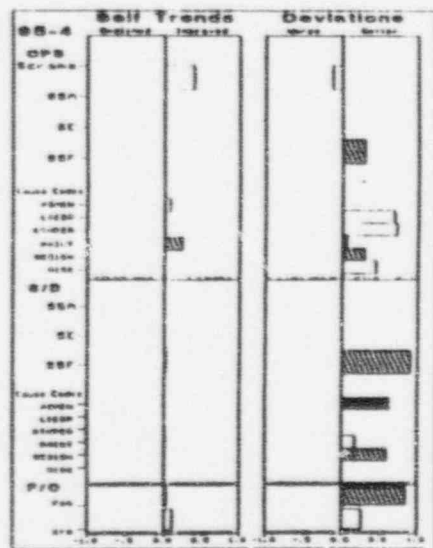
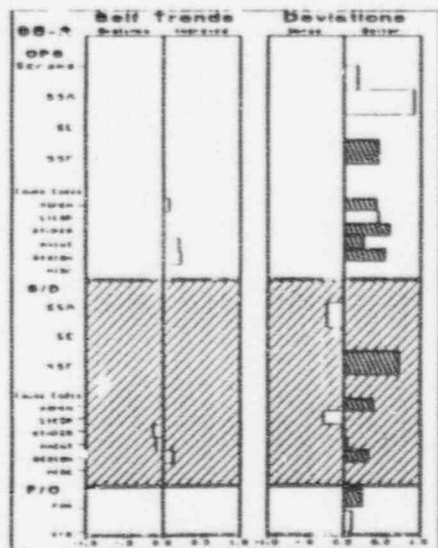
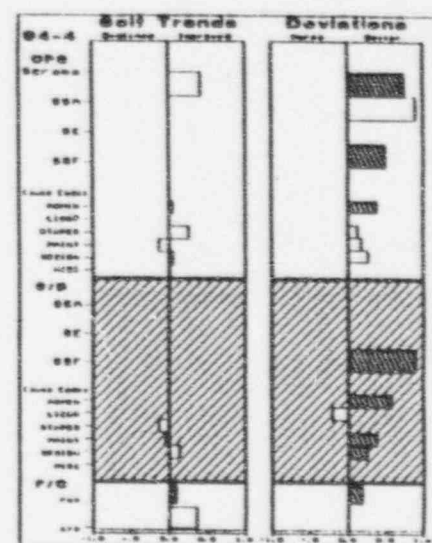
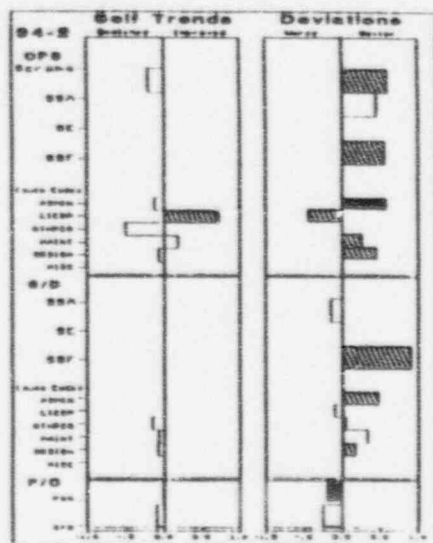
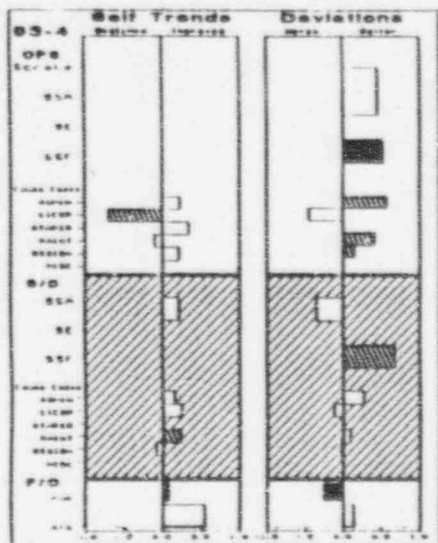
PI EVENTS FOR 96-2

SSF 06/25/96 LER# 50.72#: 30676
PWR HIST: CONDITION EXISTED FOR AN INDETERMINATE PERIOD OF TIME
GROUP : EMERGENCY CORE COOLING SYSTEMS GROUP
SYSTEM : LOW PRESSURE SAFETY INJECTION SYSTEM
DESC : THE PLANT PRACTICE OF DEENERGIZING THE SAFETY INJECTION TANK ISOLATION VALVES AFTER CLOSURE IN MODE FOUR DEFEATS THE AUTOMATIC OPEN FEATURE AT 515 PSIA AND ON A SIAS. THIS CONDITION WAS CAUSED BY INADEQUATE PLANT PROCEDURES.

ST. LUCIE 2

Trends & Deviations

PREDECISIONAL



Shaded Regions: inadequate phase time in last 2 quarters to update calculations

PLANT IPE CORE DAMAGE FREQUENCY INFORMATION

Plant IPE	Plant CDF	Core Damage Frequency Per Accident Class							Percent of Core Damage Frequency Per Accident Class							
		SBO	ATWS	Trans	LOCA	SGTR	ISLOCA	Int Flood	SBO	ATWS	Transients	LOCA	SGTR	ISLOCA	Int Flood	
<i>General Electric BWR 1</i>																
Big Rock Point	5.4E-05	5.10E-07	3.80E-06	6.50E-06	4.32E-05	---	negligible	1.10E-09	1%	7%	12%	80%	---	0%	0%	
<i>General Electric BWRs 2 and 3 (Isolation Condensers)</i>																
Nine Mile Point 1	5.5E-06	3.50E-06	5.40E-07	7.90E-07	7.00E-07	---	2.80E-08	negligible	64%	10%	14%	13%	---	0%	0%	
Oyster Creek (see Note (1))	3.9E-06	2.30E-06	2.40E-07	8.20E-07	2.50E-07	---	1.03E-07	2.10E-07	59%	6%	21%	6%	---	3%	5%	
Dresden 2/3 (BWR 3)	1.9E-05	9.30E-07	5.30E-07	1.48E-05	1.60E-06	---	4.34E-10	negligible	5%	3%	83%	9%	---	0%	0%	
Millstone 1 (BWR 3)	1.1E-05	7.00E-06	8.00E-07	1.80E-06	8.64E-07	---	1.30E-07	2.50E-07	65%	7%	16%	8%	---	1%	2%	
Pilgrim 1 (BWR 3)	5.8E-05	negligible	4.10E-06	5.09E-05	3.20E-06	---	1.00E-07	7.87E-07	0%	7%	86%	6%	---	0%	1%	
<i>General Electric BWRs 3 and 4</i>																
Monticello (BWR 3)	2.6E-05	1.20E-05	2.50E-06	3.47E-06	1.20E-06	---	3.20E-10	6.80E-06	46%	10%	13%	5%	---	0%	26%	
Quad Cities 1/2 (BWR 3)	1.2E-06	5.72E-07	7.61E-08	2.95E-07	2.08E-07	---	negligible	negligible	50%	7%	26%	18%	---	0%	0%	
Browns Ferry 2	4.8E-05	1.30E-05	1.30E-06	2.79E-05	4.80E-07	---	4.60E-08	4.70E-06	27%	3%	58%	1%	---	0%	10%	
Brunswick 1/2	2.7E-05	1.80E-05	7.00E-07	6.72E-06	1.60E-07	---	5.10E-08	1.90E-06	67%	3%	25%	1%	---	0%	7%	
Cooper	8.0E-05	2.80E-05	3.90E-06	3.97E-05	8.33E-06	---	negligible	negligible	35%	5%	50%	10%	---	0%	0%	
Duane Arnold	7.8E-06	1.90E-06	1.90E-06	3.90E-06	1.60E-07	---	negligible	negligible	24%	24%	50%	2%	---	0%	0%	
Fermi 2	5.7E-06	1.30E-07	1.80E-06	3.50E-06	negligible	---	2.00E-07	9.77E-08	2%	32%	61%	0%	---	4%	2%	
Fitzpatrick	1.9E-06	1.75E-06	1.20E-08	1.51E-07	7.40E-09	---	negligible	negligible	91%	1%	8%	0%	---	0%	0%	
Hatch 1	2.2E-05	3.30E-06	5.10E-07	2.07E-05	2.22E-07	---	1.71E-07	1.20E-07	15%	2%	80%	1%	---	1%	1%	
Hatch 2	2.4E-05	3.23E-06	6.37E-07	1.90E-05	2.22E-07	---	1.77E-07	1.60E-07	14%	3%	80%	1%	---	1%	1%	
Hope Creek	4.6E-05	3.38E-05	7.45E-07	6.42E-06	3.03E-06	---	negligible	5.50E-07	76%	1%	14%	7%	---	0%	1%	
Limerick 1/2	4.3E-06	1.00E-07	9.30E-07	2.93E-06	1.20E-07	---	negligible	1.90E-07	2%	22%	68%	3%	---	0%	4%	
Peach Bottom 2/3	5.5E-08	4.81E-07	1.44E-06	2.87E-06	5.92E-07	---	negligible	1.47E-07	9%	25%	52%	11%	---	0%	3%	
Vermont Yankee	4.4E-06	6.24E-07	7.99E-07	2.70E-06	6.42E-08	---	2.33E-08	negligible	14%	18%	62%	1%	---	1%	0%	

PLANT IPE CORE DAMAGE FREQUENCY INFORMATION

Plant IPE	Plant CDF	Core Damage Frequency Per Accident Class							Percent of Core Damage Frequency Per Accident Class							
		SBO	ATWS	Trans	LOCA	SGTR	ISLOCA	Int Flood	SBO	ATWS	Transients	LOCA	SGTR	ISLOCA	Int Flood	
<i>General Electric BWR 5</i>																
LaSalle 1/2	4.7E-05	3.82E-05	1.87E-07	7.36E-06	2.63E-08	---	negligible	3.39E-06	81%	0%	16%	0%	---		7%	
Nine Mile Point 2	3.1E-05	5.50E-06	1.10E-06	2.31E-05	7.40E-07	---	2.50E-08	1.50E-06	18%	4%	75%	2%	---	0%	5%	
WNP 2	1.8E-05	1.10E-05	6.25E-07	2.63E-06	5.10E-07	---	negligible	2.52E-06	63%	4%	15%	3%	---	0%	14%	
<i>General Electric BWR 6</i>																
Clinton	2.7E-05	1.00E-05	1.40E-07	1.40E-05	1.10E-06	---	negligible	1.60E-06	38%	1%	53%	4%	---	0%	8%	
Grand Gulf 1	1.7E-05	7.46E-06	5.56E-08	9.35E-06	5.18E-07	---	negligible	1.96E-07	43%	0%	54%	3%	---	0%	1%	
Perry 1	1.3E-05	2.25E-06	4.70E-06	4.30E-06	4.50E-07	---	negligible	1.50E-06	17%	36%	33%	3%	---	0%	12%	
River Bend	1.8E-05	1.35E-05	negligible	2.05E-06	negligible	---	negligible	1.80E-08	87%	0%	13%	0%	---	0%	0%	
<i>Babcock and Wilcox PWR 2-Loop</i>																
ANO 1	4.7E-05	1.58E-05	9.93E-07	1.48E-05	1.57E-05	9.20E-08	6.90E-08	9.34E-07	34%	2%	32%	34%	0%	0%	2%	
Crystal River 3	1.5E-05	3.28E-06	negligible	9.45E-07	9.00E-06	6.70E-07	negligible	1.25E-06	21%	0%	6%	59%	4%	0%	8%	
Davis Besse	6.6E-05	**	3.54E-07	5.71E-05	5.24E-06	4.60E-07	8.80E-07	2.00E-06	**	1%	86%	8%	1%	1%	3%	
Oconee 1,2,3	2.3E-05	2.57E-06	1.00E-07	5.33E-06	9.70E-06	2.10E-07	4.50E-10	5.50E-06	11%	0%	23%	42%	1%	0%	24%	
TMI 1	4.5E-05	1.57E-06	negligible	2.36E-05	1.57E-05	8.94E-07	1.80E-07	3.00E-06	3%	0%	52%	35%	2%	0%	7%	
<i>Combustion Engineering PWR 2-Loop</i>																
ANO 2	3.4E-05	1.23E-06	1.02E-06	2.67E-05	4.80E-06	9.53E-08	3.36E-07	negligible	4%	3%	79%	14%	0%	1%	0%	
Calvert Cliffs 1/2	2.4E-04	**	2.40E-05	1.30E-04	6.65E-05	4.49E-06	1.90E-06	1.55E-05	**	10%	54%	28%	2%	1%	6%	
Fort Calhoun 1	1.4E-05	**	2.89E-07	8.93E-06	1.07E-06	7.67E-07	6.74E-07	1.87E-06	**	2%	66%	8%	6%	6%	14%	
St Lucie 1	2.3E-05	2.65E-06	4.13E-07	5.36E-06	1.22E-05	8.16E-07	1.74E-06	5.00E-07	12%	2%	23%	53%	4%	8%	2%	
St Lucie 2	2.6E-05	2.64E-06	1.76E-06	5.31E-06	1.29E-05	8.99E-07	2.72E-06	5.00E-07	10%	7%	20%	49%	3%	10%	2%	
Millstone 2	3.4E-05	4.3E-07	1.3E-06	2.5E-05	8.01E-06	5.22E-07	6.80E-08	2.00E-07	1%	4%	74%	18%	2%	0%	1%	
Palisades	5.1E-05	9.02E-06	4.00E-06	2.00E-05	1.57E-05	2.64E-06	3E-07	3E-07	18%	8%	39%	31%	5%	0%	0%	

PLANT IPE CORE DAMAGE FREQUENCY INFORMATION

Plant IPE	Plant CDF	Core Damage Frequency Per Accident Class							Percent of Core Damage Frequency Per Accident Class						
		SBO	ATWS	Trans	LOCA	SGTR	ISLOCA	Int Flood	SBO	ATWS	Transients	LOCA	SGTR	ISLOCA	Int Flood
Palo Verde 1/2/3	9.0E-05	1.91E-05	3.08E-06	5.80E-05	6.57E-06	1.81E-06	1.80E-07	negligible	21%	3%	64%	7%	2%	0%	0%
San Onofre 2/3	3.0E-05	2.10E-06	2.70E-06	1.17E-05	1.17E-05	1.20E-06	6.00E-07	negligible	7%	9%	39%	39%	4%	2%	0%
Waterford 3	1.7E-05	6.24E-06	1.30E-07	2.40E-06	6.62E-06	8.26E-07	5.10E-07	negligible	37%	1%	14%	39%	5%	3%	0%
Maine Yankee (3 Loop)	7.4E-05	1.11E-05	3.88E-07	3.10E-05	3.00E-05	6.77E-07	2.67E-07	deferred	15%	0%	42%	41%	1%	0%	deferred
<i>Westinghouse PWR 2-Loop</i>															
Ginns	6.7E-05	1.00E-06	1.60E-07	2.40E-05	2.30E-05	2.70E-05	7.70E-06	5.00E-06	1%	0%	27%	26%	31%	9%	6%
Kewaunee	6.7E-05	2.64E-05	6.85E-08	1.04E-05	2.37E-05	5.29E-06	1.40E-06	2.42E-07	40%	0%	16%	36%	8%	2%	0%
Point Beach 1/2	1.2E-04	1.51E-05	2.72E-07	4.33E-05	3.85E-05	6.25E-06	7.20E-06	1.08E-05	13%	0%	38%	33%	5%	0%	9%
Prairie Island 1/2	5.1E-05	3.10E-06	3.20E-07	2.00E-05	1.20E-05	6.80E-06	2.30E-07	1.00E-05	6%	1%	40%	24%	13%	0%	20%
<i>Westinghouse PWR 3-Loop</i>															
Beaver Valley 1	2.1E-04	6.51E-05	4.30E-05	6.85E-05	1.80E-05	7.28E-06	7.28E-06	3.00E-06	30%	20%	32%	8%	3%	3%	1%
Beaver Valley 2	1.9E-04	4.86E-05	8.06E-06	7.68E-05	4.20E-05	7.10E-06	2.11E-06	7.30E-06	25%	4%	40%	22%	4%	1%	4%
Fairley 1/2	1.3E-04	1.22E-05	7.30E-08	6.18E-05	2.47E-05	2.60E-07	1.30E-07	1.17E-05	9%	0%	63%	19%	0%	0%	9%
H.B. Robinson 2	3.2E-04	2.60E-05	5.70E-06	1.38E-04	7.50E-05	5.70E-06	4.00E-06	6.80E-05	8%	2%	43%	23%	2%	1%	21%
North Anna 1/2	7.2E-05	8.00E-06	4.20E-07	3.00E-05	2.10E-05	7.00E-06	1.60E-06	3.60E-06	11%	1%	42%	29%	10%	2%	5%
Shearon Harris 1	7.0E-05	1.71E-05	5.00E-06	1.15E-05	3.03E-05	2.13E-06	5.00E-07	4.98E-06	24%	7%	16%	43%	3%	1%	7%
Summer	2.0E-04	4.90E-05	2.03E-06	1.10E-04	3.80E-05	1.00E-06	1.78E-07	1.51E-06	25%	1%	55%	19%	1%	0%	1%
Surry 1/2 (see Note (2))	1.3E-04	8.09E-06	3.20E-07	3.26E-05	2.10E-05	1.00E-05	1.60E-06	5.10E-05	6%	0%	26%	17%	8%	1%	41%
Turkey Point 3/4 (see Note	3.7E-04	4.70E-06	4.40E-06	3.10E-04	3.93E-05	5.60E-06	6.20E-06	negligible	1%	1%	83%	11%	2%	2%	0%

PLANT IPE CORE DAMAGE FREQUENCY INFORMATION

Plant IPE	Plant CDF	Core Damage Frequency Per Accident Class							Percent of Core Damage Frequency Per Accident Class						
		SBO	ATWS	Trans	LOCA	SGTR	ISLOCA	Int Flood	SBO	ATWS	Transients	LOCA	SGTR	ISLOCA	Int Flood
Westinghouse PWR 4-Loop															
Bridwood 1/2	2.7E-05	6.20E-06	3.70E-07	2.00E-05	1.10E-06	2.80E-08	1.50E-09	3.90E-09	23%	1%	73%	4%	0%	0%	0%
Byron 1/2	3.1E-05	4.30E-06	4.20E-07	2.60E-05	1.30E-06	3.50E-08	2.20E-09	4.80E-09	14%	1%	84%	4%	0%	0%	0%
Cellaway	5.9E-05	1.80E-05	4.80E-07	1.10E-05	1.10E-05	8.50E-07	1.70E-07	1.80E-05	31%	1%	19%	19%	1%	0%	31%
Comanche Peak 1/2	5.7E-05	1.50E-05	5.00E-06	1.10E-05	9.50E-06	3.50E-06	1.60E-07	1.30E-05	26%	9%	19%	17%	6%	0%	23%
Diablo Canyon 1/2	8.8E-05	5.00E-06	7.00E-07	8.95E-05	7.94E-06	1.80E-06	8.40E-08	3.20E-06	6%	1%	79%	9%	2%	0%	4%
Haddam Neck	1.9E-04	8.70E-06	1.70E-06	1.00E-04	5.99E-05	8.06E-06	3.59E-06	9.78E-06	5%	1%	53%	32%	4%	2%	5%
Indian Point 2	3.1E-05	4.47E-06	1.81E-06	1.30E-05	1.01E-05	1.80E-06	2.70E-06	deferred	14%	6%	42%	32%	5%	0%	deferred
Indian Point 3	4.4E-05	4.80E-06	8.70E-06	1.28E-05	8.89E-06	2.40E-06	2.50E-07	6.50E-06	11%	20%	29%	20%	5%	1%	15%
Millstone 3	5.6E-05	5.10E-06	3.40E-06	2.50E-05	2.10E-05	1.20E-06	2.20E-07	8.50E-07	9%	6%	45%	37%	2%	0%	2%
Salem 1 (see Note (4))	5.2E-05	2.10E-05	1.40E-06	1.30E-05	7.40E-06	3.20E-07	5.80E-07	7.30E-06	40%	3%	25%	14%	1%	1%	14%
Salem 2 (see Note (4))	5.5E-05	1.70E-05	1.30E-06	1.99E-05	8.80E-06	1.90E-07	5.60E-07	7.30E-06	31%	2%	36%	16%	0%	1%	13%
Seabrook	6.6E-05	1.40E-05	6.83E-06	3.20E-05	6.16E-06	1.34E-06	3.35E-08	5.83E-06	21%	10%	48%	9%	2%	0%	9%
South Texas 1/2	4.3E-05	1.50E-05	3.00E-07	2.10E-05	3.35E-06	2.06E-06	1.14E-06	5.00E-07	35%	1%	49%	8%	5%	3%	1%
Vogtle 1/2	4.9E-05	2.97E-05	1.13E-07	7.78E-06	9.31E-06	1.76E-06	4.90E-08	negligible	61%	0%	16%	19%	4%	0%	0%
Wolf Creek	4.2E-05	1.88E-05	3.10E-08	1.08E-05	3.89E-06	8.26E-07	6.11E-08	7.57E-08	45%	0%	25%	9%	1%	0%	18%
Zion 1/2	4.0E-06	4.40E-07	9.60E-09	5.30E-07	1.80E-06	1.20E-06	4.50E-09	negligible	11%	0%	13%	45%	30%	0%	0%
Westinghouse PWR 4-Loop Ice Condensers															
Catswells 1/2	5.8E-05	6.00E-07	1.00E-06	3.50E-05	7.50E-06	negligible	6.90E-08	1.40E-05	1%	2%	60%	13%	0%	0%	24%
D.C. Cook 1/2	6.3E-05	1.13E-06	2.85E-06	1.62E-05	3.50E-05	7.07E-06	5.38E-08	2.00E-07	2%	5%	26%	56%	11%	0%	0%
McGuire 1/2	4.0E-05	9.32E-06	1.50E-06	1.32E-05	1.50E-05	8.80E-06	8.10E-09	negligible	23%	4%	33%	38%	0%	0%	0%
Savannah 1/2	1.7E-04	5.32E-06	7.10E-06	1.19E-04	3.10E-05	8.80E-06	9.80E-09	8.80E-06	3%	4%	68%	18%	4%	0%	4%
Watts Bar 1 (see Note (5))	8.0E-05	1.73E-05	3.80E-06	2.18E-05	2.40E-05	4.00E-06	5.00E-08	9.10E-06	22%	5%	27%	30%	5%	0%	11%

PLANT IPE CORE DAMAGE FREQUENCY INFORMATION

Plant IPE	Plant CDF	Core Damage Frequency Per Accident Class						Percent of Core Damage Frequency Per Accident Class							
		SBO	ATWS	Trans	LOCA	SGTR	ISLOCA	Int Flood	SBO	ATWS	Transients	LOCA	SGTR	ISLOCA	Int Flood
Notes on CDF values:															
** For Davis Besse, Calvert Cliffs, & Fort Calhoun, separate SBO CDF was unavailable, so Transient CDF and % CDF includes SBO contribution								(3) For Turkey Point, the CDF listed in the exec summary of the submittal, which corresponds to "all layers of recovery," was used							
(1) The database values for Oyster Creek do not appear to include the CDF for internal floods; the values listed here include the CDF for internal flood								(4) For Salem 1 & 2, the revised flood and plant CDFs listed in the submittal letter for the IPE were used							
(2) The Surry internal flood CDF is from page 9 of 4/21/92 NRR letter which lists a revised value from 11/26/91 Surry reanalysis submittal								(5) For Watts Bar, the CDFs from the revised submittal were used							
Deferred means that licensee included Internal flood analysis in their IPEEE															

PLANT IPE CONTAINMENT FAILURE FREQUENCY INFORMATION

Plant IPE	Plant CDF	Core Damage Frequency By Containment Failure Mode				Percent of Core Damage Frequency Per Containment Failure Mode			
		Bypass	EF	LF	NCF	Bypass	EF	LF	NCF
General Electric - Large Dry									
BIG ROCK POINT	5.4E-05	7.56E-07	2.32E-06	negligible	5.09E-05	1%	4%	0%	94%
General Electric - Mark I									
BROWNS FERRY 2	4.8E-05	4.46E-07	2.18E-05	1.25E-05	1.33E-05	1%	45%	26%	28%
BRUNSWICK 1&2	2.7E-05	6.21E-08	2.38E-06	1.63E-05	6.33E-06	1%	9%	60%	31%
COOPER	8.0E-05	negligible	1.29E-05	5.77E-05	9.13E-06	0%	16%	72%	11%
DRESDEN 2&3	1.9E-05	negligible	5.55E-07	1.59E-05	2.04E-06	0%	3%	86%	11%
DUANE ARNOLD	7.8E-06	negligible	3.67E-06	2.49E-06	1.68E-06	0%	47%	32%	21%
FERMI 2	5.7E-06	2.00E-07	1.71E-06	2.22E-06	1.57E-06	4%	30%	39%	28%
FITZPATRICK	1.9E-06	negligible	1.20E-06	4.16E-07	3.03E-07	0%	63%	22%	16%
HATCH 1	2.2E-05	1.85E-07	5.47E-06	5.70E-06	1.10E-05	1%	25%	26%	49%
HATCH 2	2.4E-05	1.94E-07	5.00E-06	5.91E-06	1.25E-05	1%	21%	25%	53%
HOPE CREEK	4.6E-05	negligible	2.87E-05	1.20E-05	5.56E-06	0%	62%	26%	12%
MILLSTONE 1	1.1E-05	1.25E-07	3.74E-06	3.27E-06	3.87E-06	1%	34%	30%	35%
MONTICELLO	2.6E-05	5.20E-09	4.15E-06	6.24E-06	1.56E-05	1%	16%	24%	60%
NINE MILE POINT 1	5.5E-06	7.48E-08	1.31E-06	3.40E-06	7.12E-07	1%	24%	62%	13%
OYSTER CREEK	3.7E-06	2.70E-07	5.87E-07	9.69E-07	1.86E-06	7%	16%	26%	51%
PEACH BOTTOM 2&3	5.5E-06	6.64E-09	1.55E-06	1.40E-06	2.57E-06	1%	28%	25%	46%
PILGRIM 1	5.8E-05	2.32E-07	1.25E-05	3.54E-05	9.86E-06	1%	22%	61%	17%
QUAD CITIES 1&2	1.2E-06	6.00E-10	2.84E-07	6.62E-07	2.53E-07	1%	24%	55%	21%
VERMONT YANKEE	4.3E-06	4.30E-08	2.11E-06	9.89E-07	1.16E-06	1%	49%	23%	27%

PLANT IFE CONTAINMENT FAILURE FREQUENCY INFORMATION

Plant IFE	Plant CDF	Core Damage Frequency By Containment Failure Mode				Percent of Core Damage Frequency Per Containment Failure Mode			
		Bypass	EF	LF	NCF	Bypass	EF	LF	NCF
General Electric - Mark II									
LA SALLE 1&2 - 5305	4.7E-05	negligible	1.66E-05	2.42E-05	8.64E-06	0%	35%	51%	14%
LIMERICK 1&2	4.3E-06	negligible	3.96E-07	1.16E-06	2.75E-06	0%	9%	27%	64%
NINE MILE POINT 2	3.1E-05	2.79E-08	2.32E-06	2.04E-05	8.30E-06	1%	7%	66%	27%
WNP 2	1.8E-05	2.98E-08	5.34E-06	5.30E-06	6.83E-06	1%	31%	30%	39%
General Electric - Mark III									
CLINTON	2.6E-05	negligible	8.27E-07	4.84E-07	2.47E-05	0%	3%	2%	95%
GRAND GULF 1	1.7E-05	negligible	8.05E-06	5.66E-06	3.51E-06	0%	47%	33%	20%
PERRY 1	1.3E-05	negligible	3.14E-06	4.76E-06	5.30E-06	0%	24%	36%	40%
RIVER BEND	1.6E-05	negligible	4.38E-06	2.14E-06	8.98E-06	0%	28%	14%	58%
PWR - Ice Condenser									
CATAWBA 1&2	4.3E-05	7.71E-08	2.31E-07	2.02E-05	2.27E-05	1%	1%	47%	53%
D.C. COOK 1&2	6.3E-05	7.11E-06	9.26E-07	1.13E-06	5.40E-05	11%	1%	2%	86%
MCGUIRE 1&2	4.0E-05	9.60E-07	9.50E-07	1.64E-05	2.20E-05	2%	2%	40%	54%
SEQUOYAH 1&2	1.7E-04	7.99E-06	2.81E-06	8.32E-05	7.60E-05	5%	2%	49%	45%
WATTS BAR 1&2	8.0E-05	5.95E-06	4.03E-06	1.72E-05	5.27E-05	7%	5%	22%	66%
PWR - Subatmospheric									
BEAVER VALLEY 1	2.1E-04	1.02E-05	4.73E-05	9.15E-05	6.17E-05	5%	23%	44%	29%
BEAVER VALLEY 2	1.9E-04	9.94E-06	4.74E-05	8.54E-05	4.69E-05	5%	25%	45%	25%
NORTH ANNA 1&2	6.8E-05	8.98E-06	1.05E-06	7.68E-06	5.03E-05	13%	2%	11%	74%
SURRY 1&2
MILLSTONE 3	5.6E-05	3.98E-07	2.24E-08	1.10E-05	4.47E-05	1%	1%	20%	80%

PLANT IPE CONTAINMENT FAILURE FREQUENCY INFORMATION

Plant IPE	Plant CDF	Core Damage Frequency By Containment Failure Mode				Percent of Core Damage Frequency Per Containment Failure Mode			
		Bypass	EF	LF	NCF	Bypass	EF	LF	NCF
PWR - Large Dry									
ARKANSAS NUCLEAR ONE 1	4.9E-05	2.08E-07	3.03E-08	5.95E-08	3.96E-05	1%	6%	12%	81%
ARKANSAS NUCLEAR ONE 2	3.7E-05	4.07E-07	4.51E-06	5.14E-06	2.69E-05	1%	12%	14%	73%
BRAIDWOOD 1&2	2.7E-05	1.10E-08	5.48E-08	2.54E-06	2.48E-05	1%	1%	9%	90%
BYRON 1&2	3.1E-05	1.24E-08	2.13E-07	2.50E-06	2.82E-05	1%	1%	8%	91%
CALLAWAY	5.8E-05	1.17E-06	1.17E-07	3.09E-05	2.63E-05	2%	1%	53%	45%
CALVERT CLIFFS 1&2	2.4E-04	7.44E-06	2.11E-05	9.53E-05	1.16E-04	3%	9%	40%	48%
COMANCHE PEAK 1&2	5.7E-05	4.67E-06	6.75E-07	2.93E-05	2.26E-05	8%	1%	51%	39%
CRYSTAL RIVER 3	1.5E-05	7.39E-07	5.53E-07	9.56E-08	4.42E-06	5%	4%	83%	29%
DAVIS BESSE	6.6E-05	1.72E-06	4.16E-06	4.95E-06	5.52E-05	3%	6%		84%
DIABLO CANYON 1&2	8.8E-05	1.63E-06	1.01E-05	3.98E-05	3.65E-05	2%	11%		41%
FARLEY 1&2	1.2E-04	4.47E-07	7.19E-08	3.90E-06	1.20E-04	1%	1%	3%	96%
FORT CALHOUN 1	1.4E-05	1.44E-06	2.23E-07	3.80E-08	8.13E-06	11%	2%	28%	60%
GINNA	8.7E-05	3.71E-05	2.67E-06	1.27E-05	3.50E-05	42%	3%	15%	40%
H.B. ROBINSON 2	3.2E-04	6.37E-06	4.19E-05	3.20E-05	2.40E-04	2%	13%	10%	75%
HADDAM NECK	1.8E-04	1.16E-05	1.21E-06	9.70E-05	7.01E-05	8%	1%	54%	39%
INDIAN POINT 2	3.1E-05	1.94E-06	5.61E-08	2.82E-08	2.65E-05	6%	1%	9%	85%
INDIAN POINT 3	4.4E-05	2.44E-06	3.12E-07	1.07E-05	3.05E-05	6%	1%	24%	69%
KEWAUNEE	6.6E-05	5.28E-06	1.48E-08	3.22E-05	2.86E-05	1%	1%	49%	43%
MAINE YANKEE	7.4E-05	1.21E-06	5.79E-06	3.54E-05	3.16E-05	2%	8%	48%	42%
MILLSTONE 2	3.4E-05	7.66E-07	3.22E-06	1.11E-05	1.91E-05	2%	9%	32%	56%
OCONEE 1,2,&3	2.3E-05	4.80E-10	2.61E-07	1.71E-05	5.61E-06	0%	1%	74%	24%
PALISADES	5.1E-05	2.89E-06	1.67E-05	7.66E-06	2.35E-05	8%	33%	16%	46%
PALO VERDE 1,2,&3	9.0E-05	3.26E-08	9.41E-08	1.21E-05	8.53E-05	4%	10%	13%	73%
POINT BEACH 1&2	1.0E-04	8.32E-08	3.24E-08	1.81E-05	7.97E-05	8%	1%	17%	77%
PRAIRIE ISLAND 1&2	4.9E-05	2.19E-05	4.15E-07	1.11E-05	1.58E-05	44%	1%	22%	31%

PLANT IPE CONTAINMENT FAILURE FREQUENCY INFORMATION

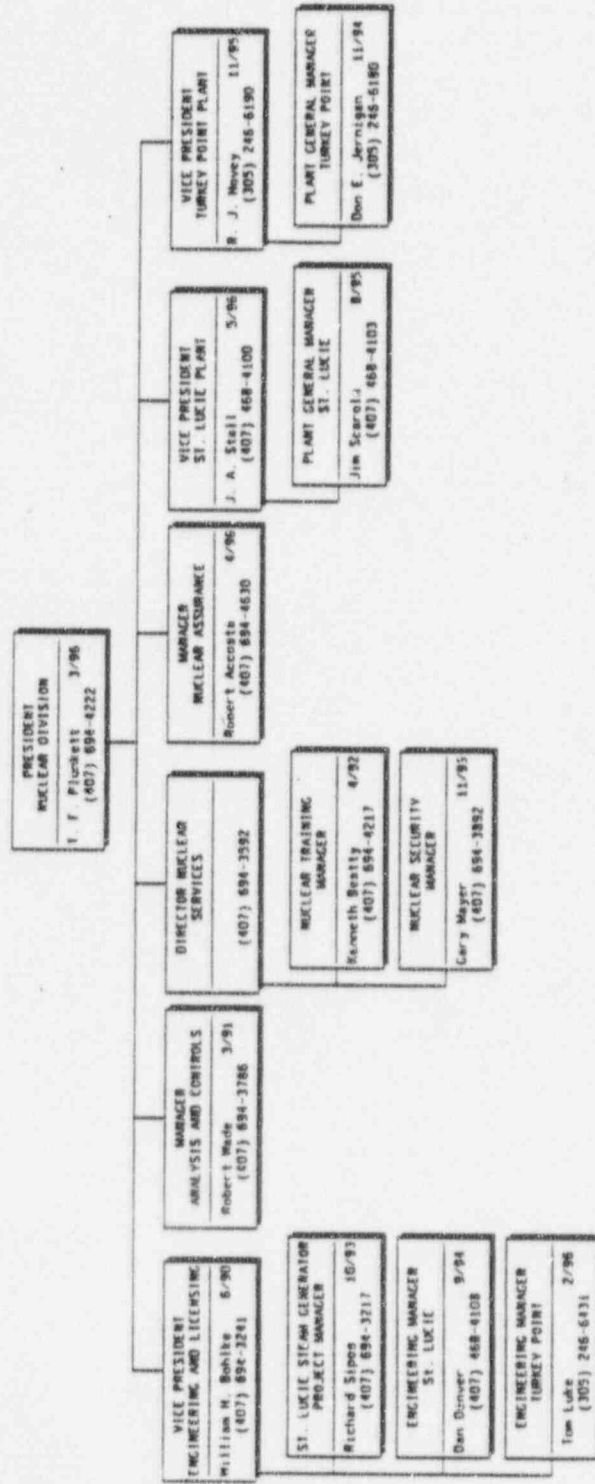
Plant IPE	Plant CDF	Core Damage Frequency By Containment Failure Mode				Percent of Core Damage Frequency Per Containment Failure Mode			
		Bypass	EF	LF	NCF	Bypass	EF	LF	NCF
SALEM 1	5.9E-05	9.39E-07	3.48E-06	2.16E-05	3.29E-05	2%	8%	37%	56%
SALEM 2	8.3E-05	8.08E-07	4.89E-06	2.76E-05	2.94E-05	1%	8%	44%	47%
SAN ONOFRE 2&3	3.0E-05	2.02E-06	2.00E-08	2.84E-06	2.52E-05	7%	1%	9%	84%
SEABROOK	8.7E-05	1.54E-07	9.52E-06	4.38E-05	1.35E-05	1%	14%	65%	20%
SHEARON HARRIS 1	7.0E-05	7.16E-06	4.38E-07	3.15E-06	5.92E-05	10%	1%	5%	85%
SOUTH TEXAS PROJECT 1&2	4.3E-05	1.66E-06	5.86E-06	1.08E-05	2.44E-05	4%	14%	25%	57%
ST. LUCIE 1	2.3E-05	2.76E-06	2.30E-07	3.45E-06	1.66E-05	12%	1%	15%	72%
ST. LUCIE 2	2.6E-05	3.90E-06	2.80E-07	3.38E-06	1.85E-05	15%	1%	13%	71%
SUMMER	2.0E-04	8.40E-07	5.80E-07	4.10E-05	1.53E-04	1%	1%	21%	77%
TMI 1	4.5E-05	1.57E-06	1.40E-06	2.83E-05	1.36E-05	4%	3%	63%	30%
TURKEY POINT 3&4	4.6E-04	1.30E-05	6.10E-06	2.99E-04	1.44E-04	3%	1%	65%	31%
VOGTLE 1&2	4.7E-05	1.61E-06	1.68E-07	negligible	4.50E-05	3%	1%	0%	96%
WATERFORD 3	1.7E-05	1.36E-06	4.42E-06	3.40E-06	7.82E-06	8%	26%	20%	46%
WOLF CREEK	3.6E-05	8.51E-08	4.95E-08	1.41E-06	3.40E-05	1%	1%	4%	94%
ZION 1&2	4.0E-06	1.15E-06	8.24E-08	2.13E-07	2.55E-06	29%	2%	5%	64%

NOTES:

- Bypass - Containment bypass
- EF - Early failure, including isolation failure
- LF - Late failure
- NCF - No containment failure

*Data for Surry are not entered, waiting for updated results

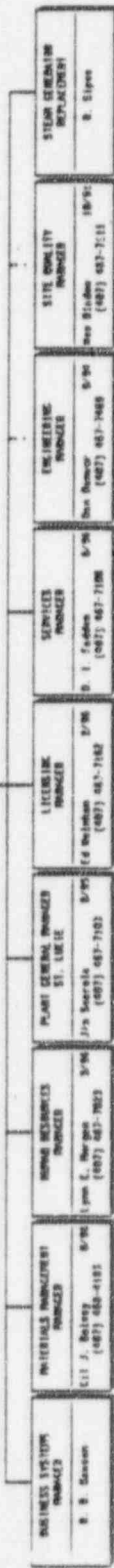
FLORIDA POWER AND LIGHT
MANAGEMENT OVERVIEW



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ENFORCEMENT HISTORY

EA 95-026 - Weaknesses in the control of maintenance and testing that resulted in inoperability of both of the U1 PORVs during periods that the PORVs were relied upon to provide low temperature overpressure protection (CP issued on 11/13/95; SL III: \$50,000)

EA 96-003 - Overdilution event occurred when a licensed operator left the controls without informing his relief that a dilution was in progress (CP issued on 3/18/96; SL III: \$50,000)

ST LUCIE MAJOR ASSESSMENTS

DATE	TYPE OF ASSESSMENT
JULY 1995	INPO ASSESSMENT - CATEGORY 1
AUGUST 1995	<p>DR. CHOU ANALYSIS BY REGION II TO IDENTIFY ROOT CAUSES OF THE RECENT DECLINE IN PERFORMANCE AND MULTIPLE EVENTS</p> <p>The team concluded that the predominant root cause for the events observed at St Lucie was <u>insufficient detail and scope in site programs and procedures</u>. This causal factor was found to result in recent events which demonstrated deficiencies in the following areas:</p> <ul style="list-style-type: none"> ● job skills, work practices, and decision making; ● interface among organizations as evidenced by a lack of interface formality; ● organizational authority for program implementation as evidenced by instances of unclear responsibility and accountability.
AUGUST 1995	<p>LICENSEE SELF-ASSESSMENT: A SPECIAL TEAM PERFORMED AN ASSESSMENT OF OPERATIONAL PROBLEMS AND IDENTIFIED ROOT CAUSES: MANAGEMENT AND STAFF COMPLACENCY - POOR PERFORMANCE, ACCEPTING LONGSTANDING EQUIPMENT PROBLEMS, AND NOT KEEPING UP WITH INDUSTRY IMPROVEMENTS.</p>

ST. LUCIE

ISSUE	STATUS
<p>GL 95-07 - Pressure Locking and Thermal Binding of SR Power Operated Gate Valves</p>	<p>The licensee has completed the assessment and evaluation of both Unit 1 and Unit 2 power operated valves (POVs) susceptible to PL/TB.</p> <ul style="list-style-type: none"> • GL response, dated February 13, 1996 <p>The licensee has outstanding commitments to GL 92-07 in the following areas:</p> <p style="padding-left: 40px;"><u>Unit 2</u></p> <ul style="list-style-type: none"> • Schedule submitted including justification for modification to shutdown cooling valves V-3480, V-3652 and V-3651 during Spring 1997 refueling outage (SL2-10)
<p>Boraflex</p>	<p>Boraflex installed on Unit 1 in 1988. Two successful blackness testing campaigns completed (5 year surveillance). Upper 15 inches of one panel discovered missing. Engineering Evaluation (JPN-PSL-SEPJ-95-023, Rev. 3) completed March 5, 1996. Licensee reviewed manufacturer's fabrication records and concluded that the missing boraflex in PSL1 spent fuel pool was an isolated incident and did not affect SPF criticality.</p> <p>Boraflex not installed on Unit 2.</p>

ST. LUCIE

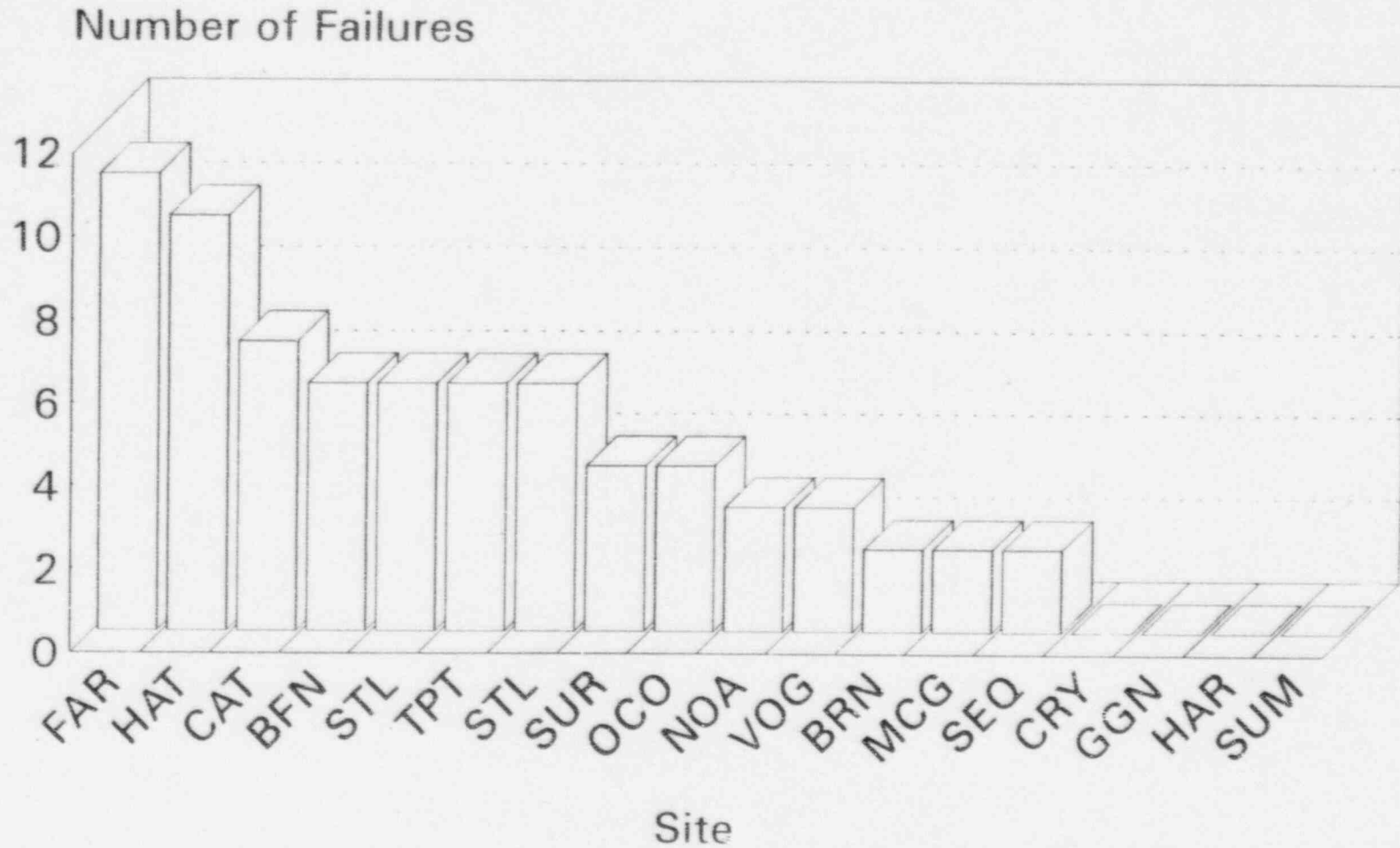
ISSUE	STATUS
Spent Fuel Full Offload Permitted	<p>From the UFSAR:</p> <p><u>Unit 1</u></p> <p>Two thermal analyses were performed; the Normal Batch Discharge and the Full Core Discharge.</p> <p>In the case of the Normal Batch Discharge, the analysis assumes 80 assemblies each have been discharged from the core in 18 month intervals. A refueling batch of 80 assemblies is added 150 hours after reactor shutdown. This analysis shows a maximum pool bulk temperature of 133.3 degrees F with the fuel pool cooling system in service.</p> <p>For the Full Core Discharge, assuming that 73 of the assemblies have 90 days of irradiation, 72 have 21 months of irradiation and the remaining 72 assemblies have 39 months of irradiation (217 assemblies total), the analysis shows a maximum pool bulk temperature of 150.8 degrees F with the fuel pool cooling system in service.</p> <p><u>Unit 2</u></p> <p>Two thermal analyses have been performed; the Normal and the Accident Case Assumptions. The Normal Case assumes;</p> <ul style="list-style-type: none"> a. 11 batches (each 1/3 core) discharged b. Most recent batch cooling for five days after shutdown c. Adiabatic heat up of the pool <p>The analysis shows a maximum pool bulk temperature of 131 degrees F with the fuel pool cooling system in service.</p> <p>The Accident Case assumes;</p> <ul style="list-style-type: none"> a. 11 batches plus one full core discharged b. One (1) core cools for 7 days c. Most recent 1/3 core batch cools for 90 days <p>This analysis shows a maximum pool bulk temperature of 148 degrees F with the fuel pool cooling system in service.</p> <p>The licensee has furnished a tabulated SFP Storage Data on both Units for PM on site inspection the week of March 25, 1996.</p>
Improved Standardized Technical Specifications	No Licensee commitment

ST. LUCIE

ISSUE	STATUS
<p>Steam Generator Issues</p> <p>NRC Bulletin 89-01 - Westinghouse Alloy 600 Steam Generator Mechanical Tube Plugs</p>	<p>The licensee has addressed the predicted service life of thermally treated (TT) Alloy 600 Mechanical Tube Plugs identified by Westinghouse.</p> <p style="text-align: center;"><u>Unit 1</u></p> <ul style="list-style-type: none"> • Tube plug repair plan formulated for April 1996 refueling outage. All plugs will be visually inspected and repaired or replaced, if leaking. • Both SGs scheduled for replacement 1st quarter 1998. <p style="text-align: center;"><u>Unit 2</u></p> <ul style="list-style-type: none"> • No installed Westinghouse mechanical plugs.
<p>GL 95-03 - Circumferential Cracking of Steam Generator Tubes</p>	<p>The licensee has addressed the detection and sizing of circumferential indications to determine applicability including the requested RAI dated September 26, 1995. No tube leaks have occurred on either unit due to circumferential cracks.</p> <p>The licensee has outstanding commitments to GL 95-03 in the following areas:</p> <p style="text-align: center;"><u>Unit 1</u></p> <ul style="list-style-type: none"> • 100% tube inspection of all active tubes using both full length bobbin coil and conventional motorized rotating pancake coil (MRPC) technique for selected bobbin indications, i.e. 100% Hot Leg and 3% Cold Leg, during Spring 1996 outage.
<p>Maintenance Rule</p>	<p>Program defined and implemented. Resident Inspectors confirmed. A Maintenance Rule Team inspection completed on 9/20/96. Although the licensee's maintenance rule implementation program found to be satisfactory three apparent violations were identified in the areas of program design issues, system scoping issues, and procedure implementation.</p>
<p>IPEEE Submitted</p>	<p>PSL-IPEEE Rev. 0, submitted December 1994 which met the objectives of GL 88-20, Supplement 4.</p> <p>The licensee has one outstanding commitment to GL 88-20, supplement 4, in response to RAI dated January 9, 1996.</p> <ul style="list-style-type: none"> • Action 1 <p>The Engineering evaluation has been completed to allow use of the station blackout cross tie between the units to mitigate an IPEEE fire and plant operating procedure changes are scheduled to be completed by August 1996.</p>

TOTAL ELECTRICAL COMPONENT FAILURES

1994 - 1995

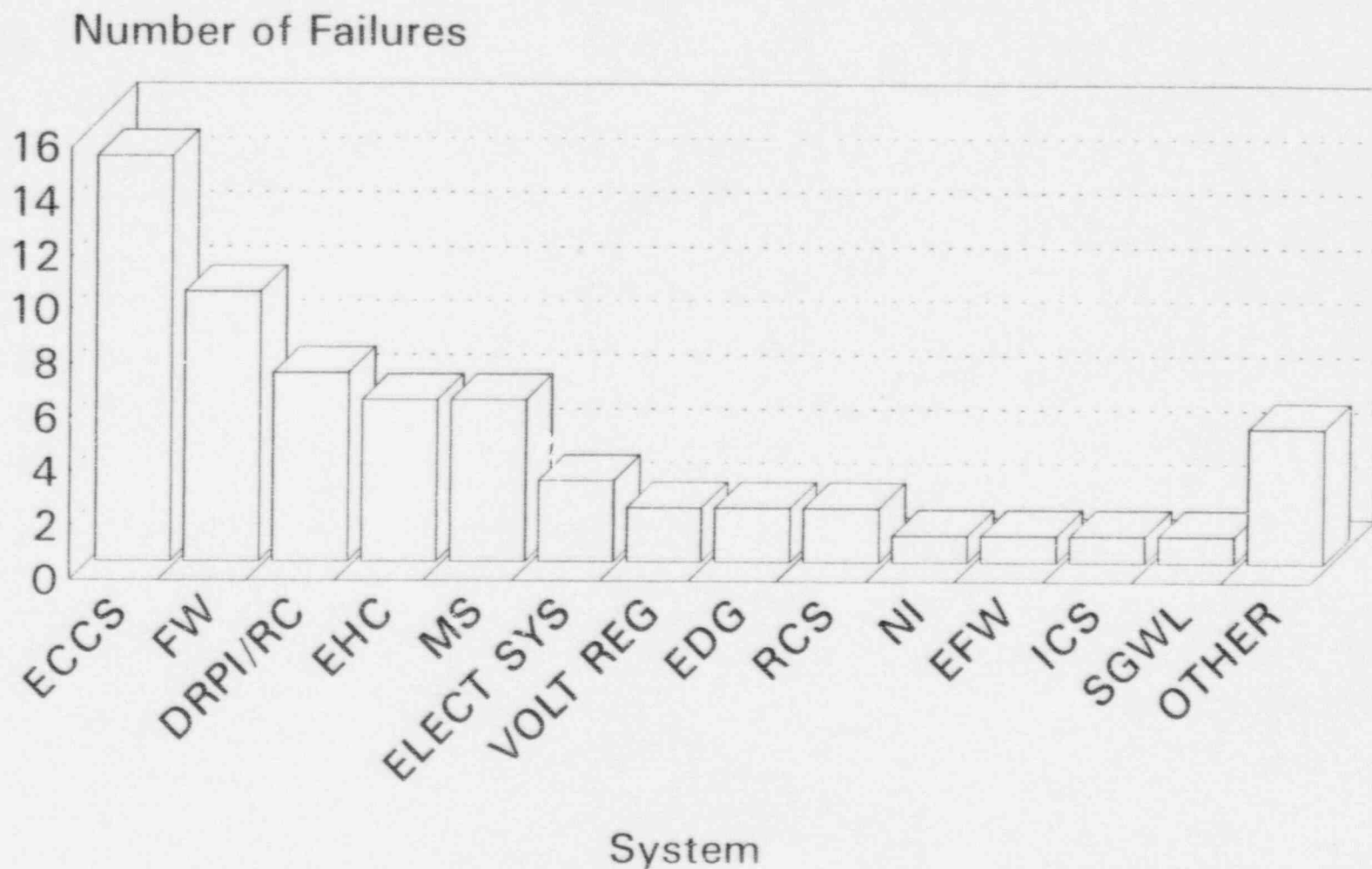


Based on Site Issues Matrix/LEAs
Does not include Personnel Errors

12/2/95

TOTAL ELECTRICAL COMPONENT FAILURES BY SYSTEM

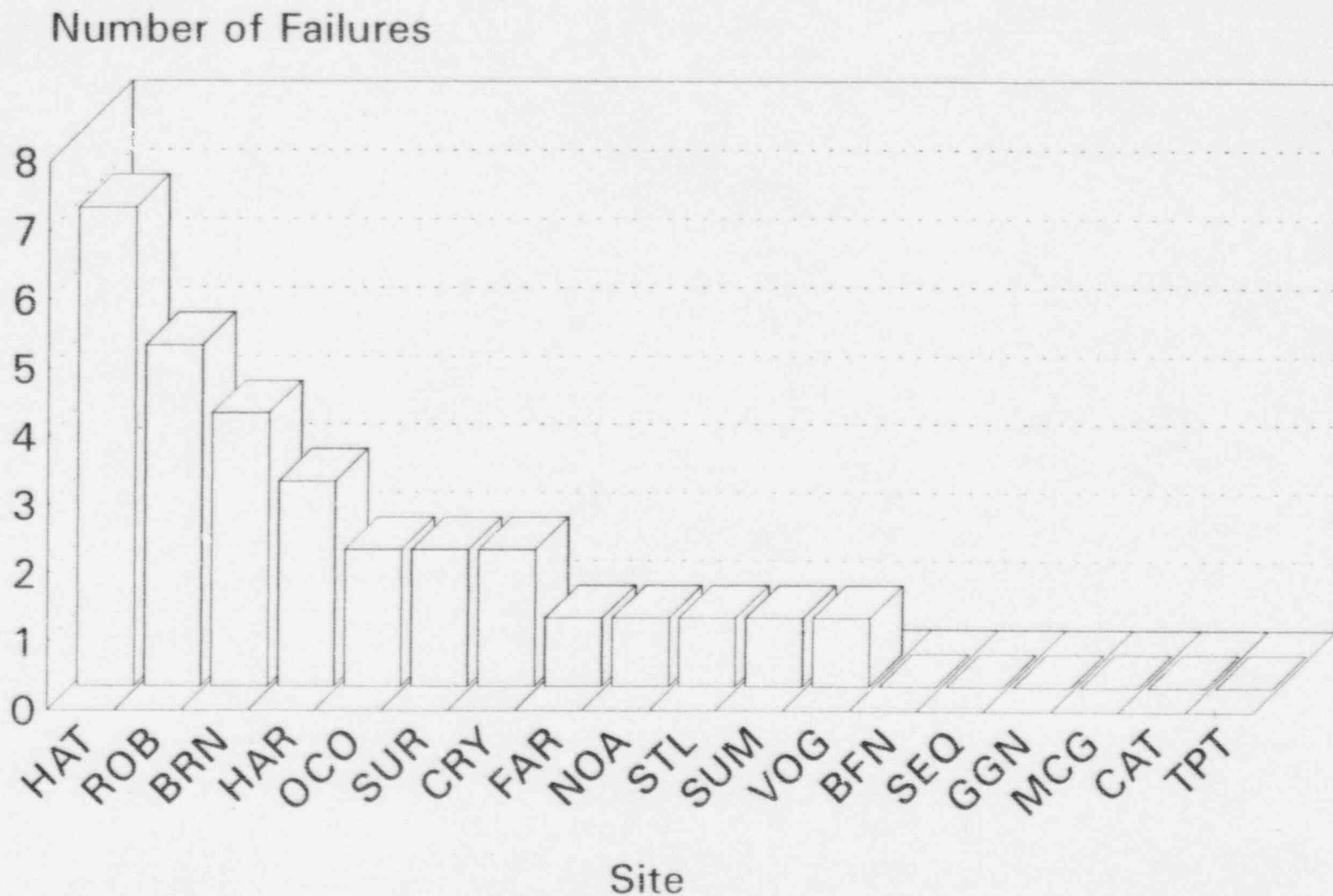
1994 - 1995



Based on Site Issues Matrix/LERs
Does not include personnel errors

TOTAL COMPONENT PERSONNEL ERRORS - ELECTRICAL SYSTEMS

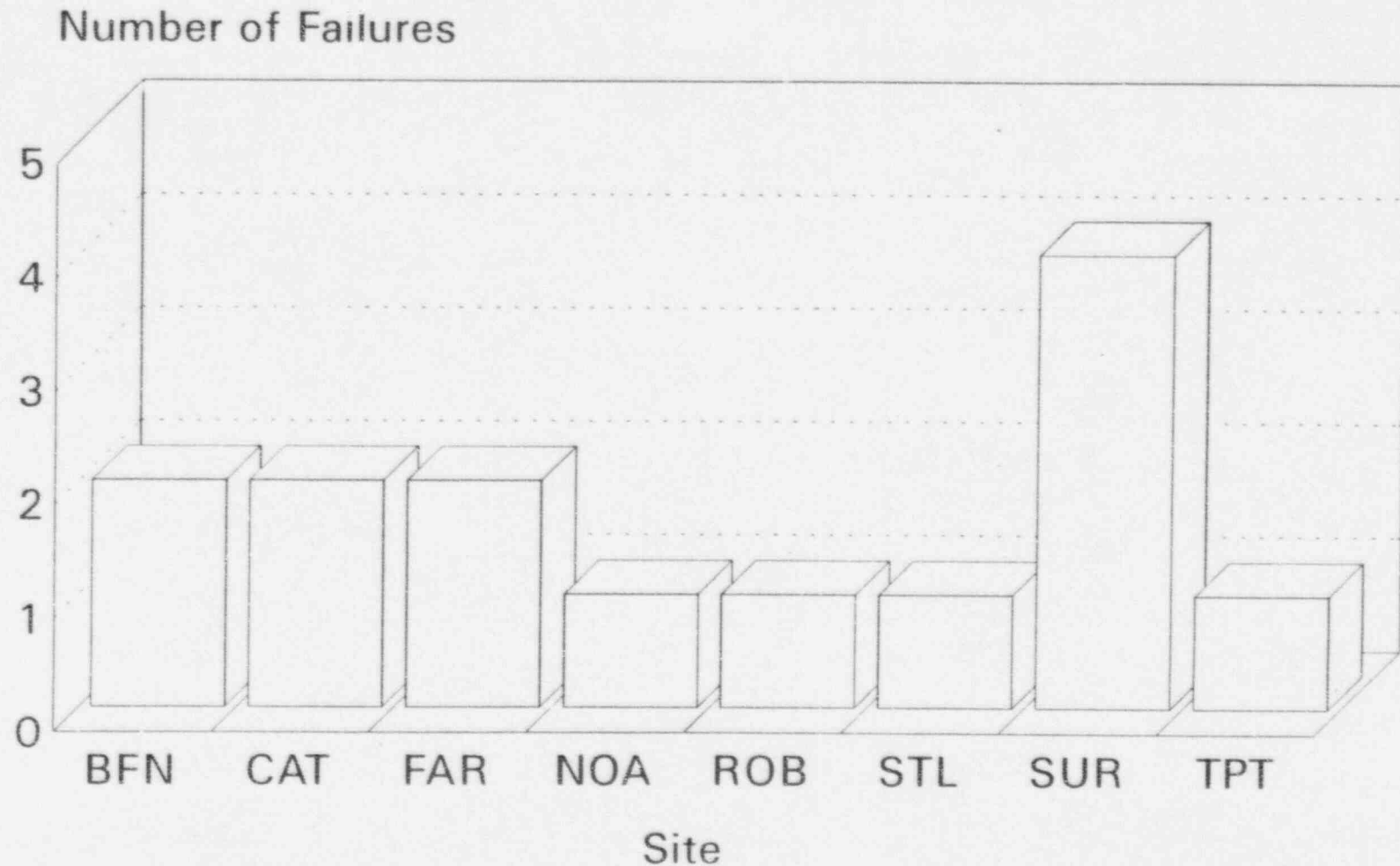
1994 - 1995



Based on Site Issues Matrix/LEAs

SIGNIFICANT CIRCUIT CARD FAILURES

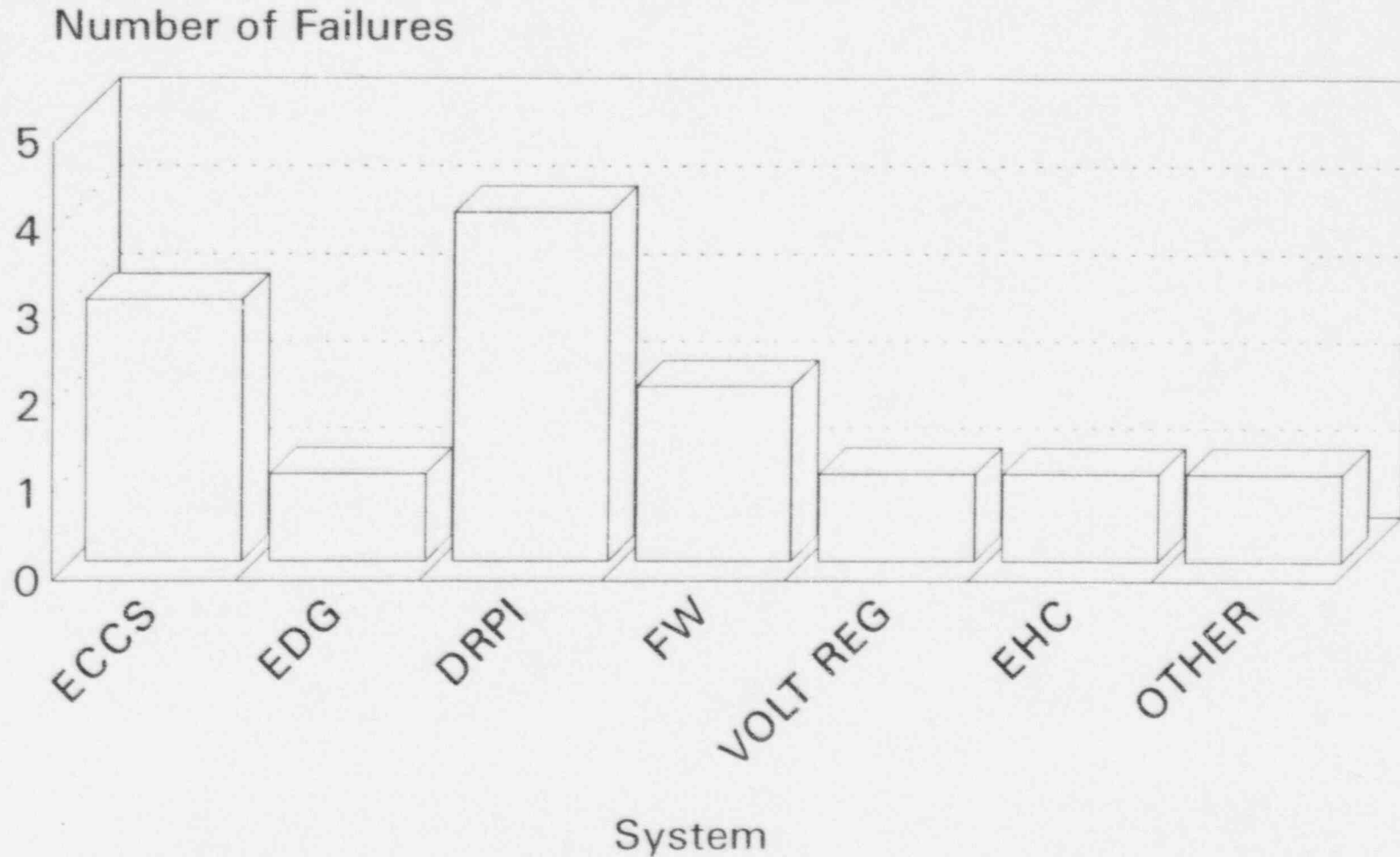
1994 - 1995



Based on Site Issues Matrix/LERs

CIRCUIT CARD FAILURE BY SYSTEM

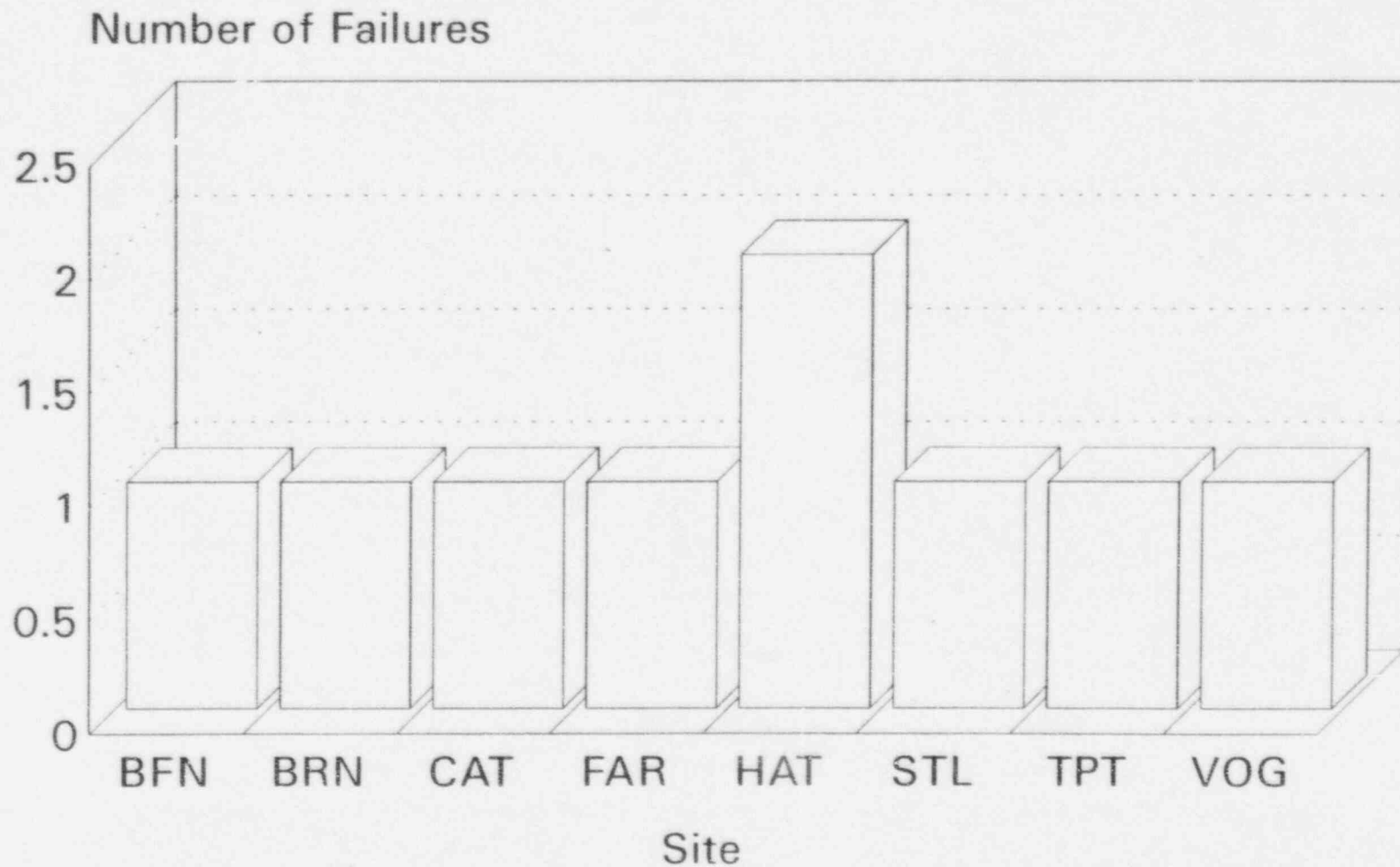
1994 - 1995



Based on Site Issues Matrix/LERs

SIGNIFICANT CONTROLLER FAILURES

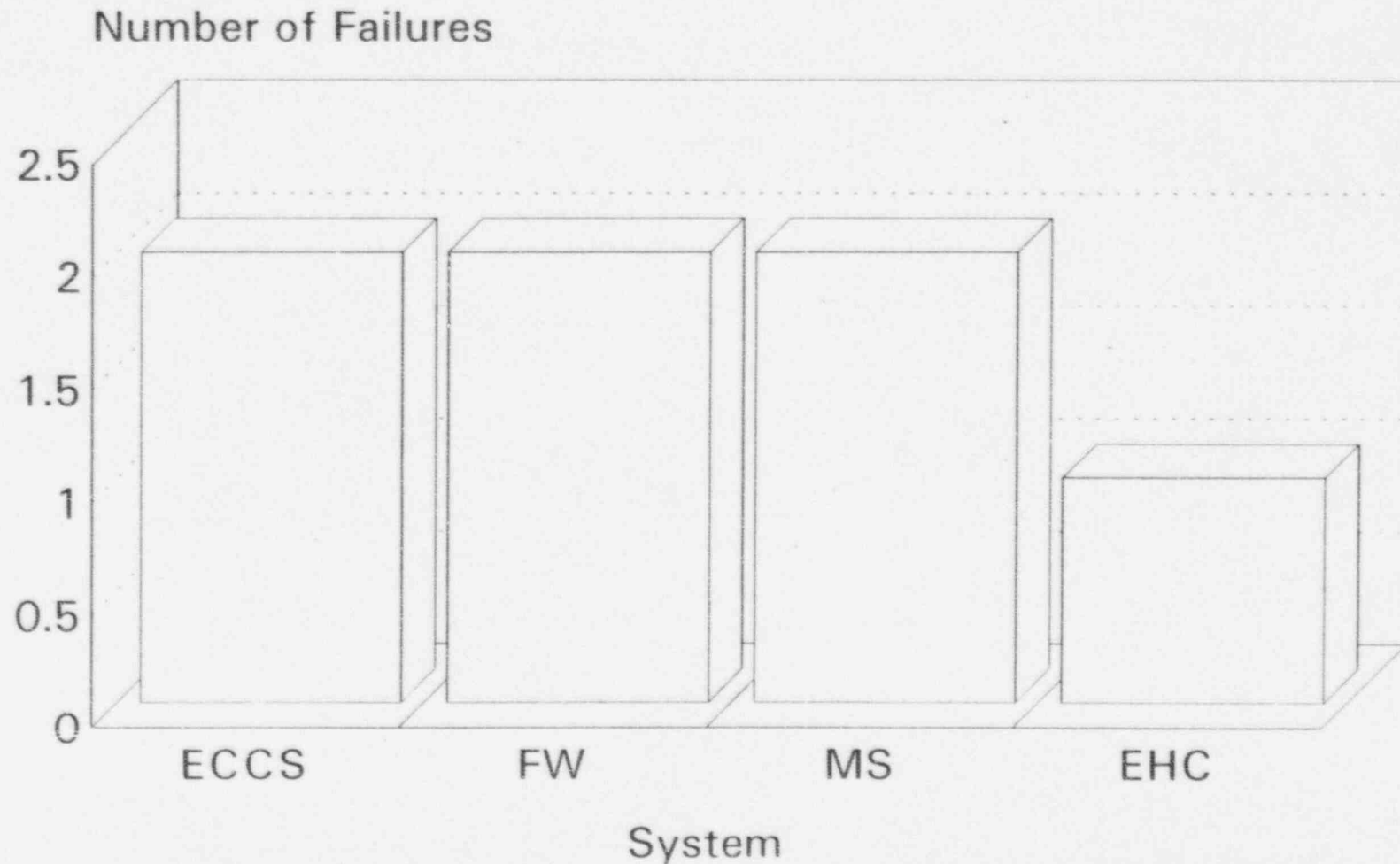
1994 - 1995



Based on Site Issues Matrix/LERs

CONTROLLER FAILURES BY SYSTEM

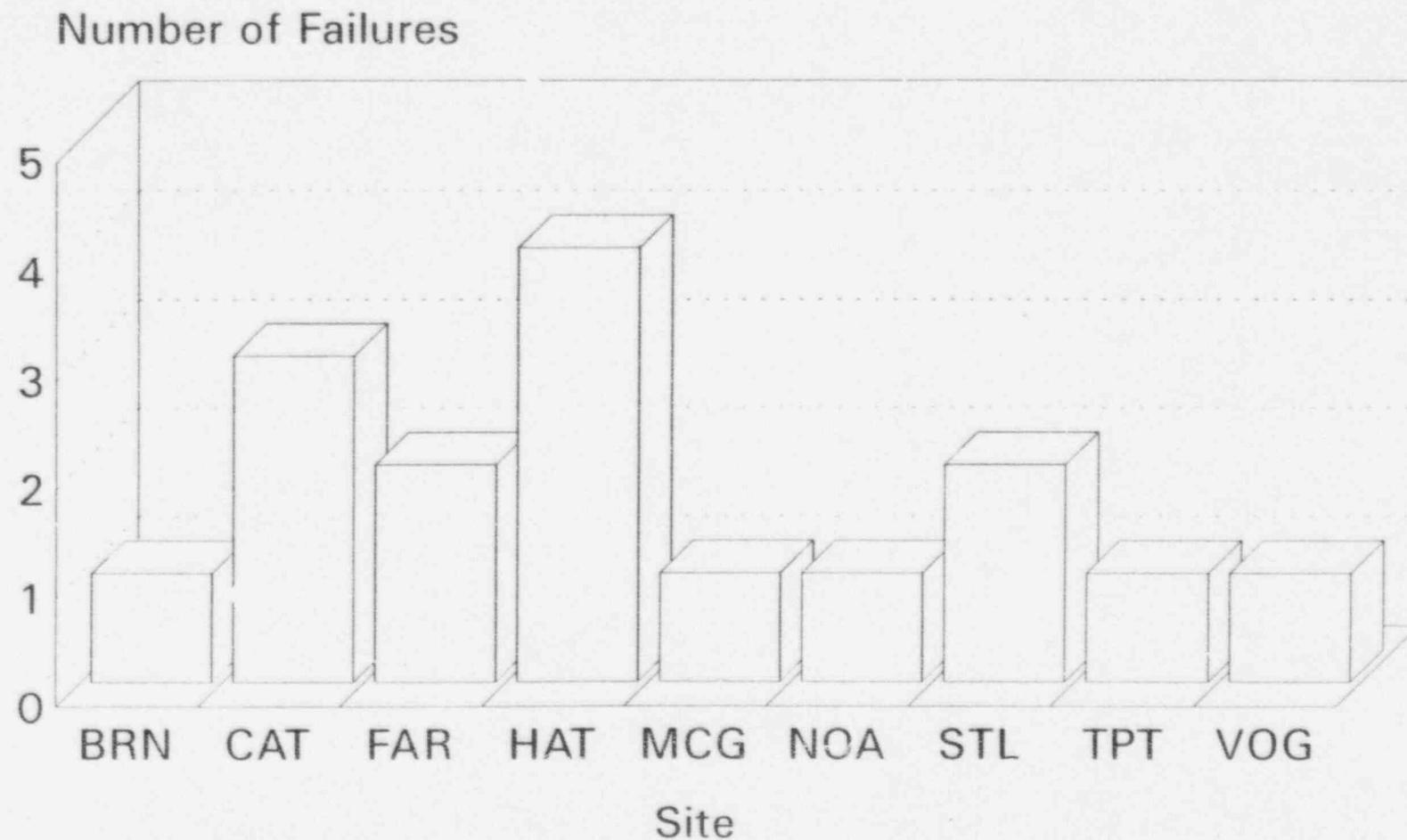
1994 - 1995



Based on Site Issues Matrix/LERs

SIGNIFICANT RELAY FAILURES

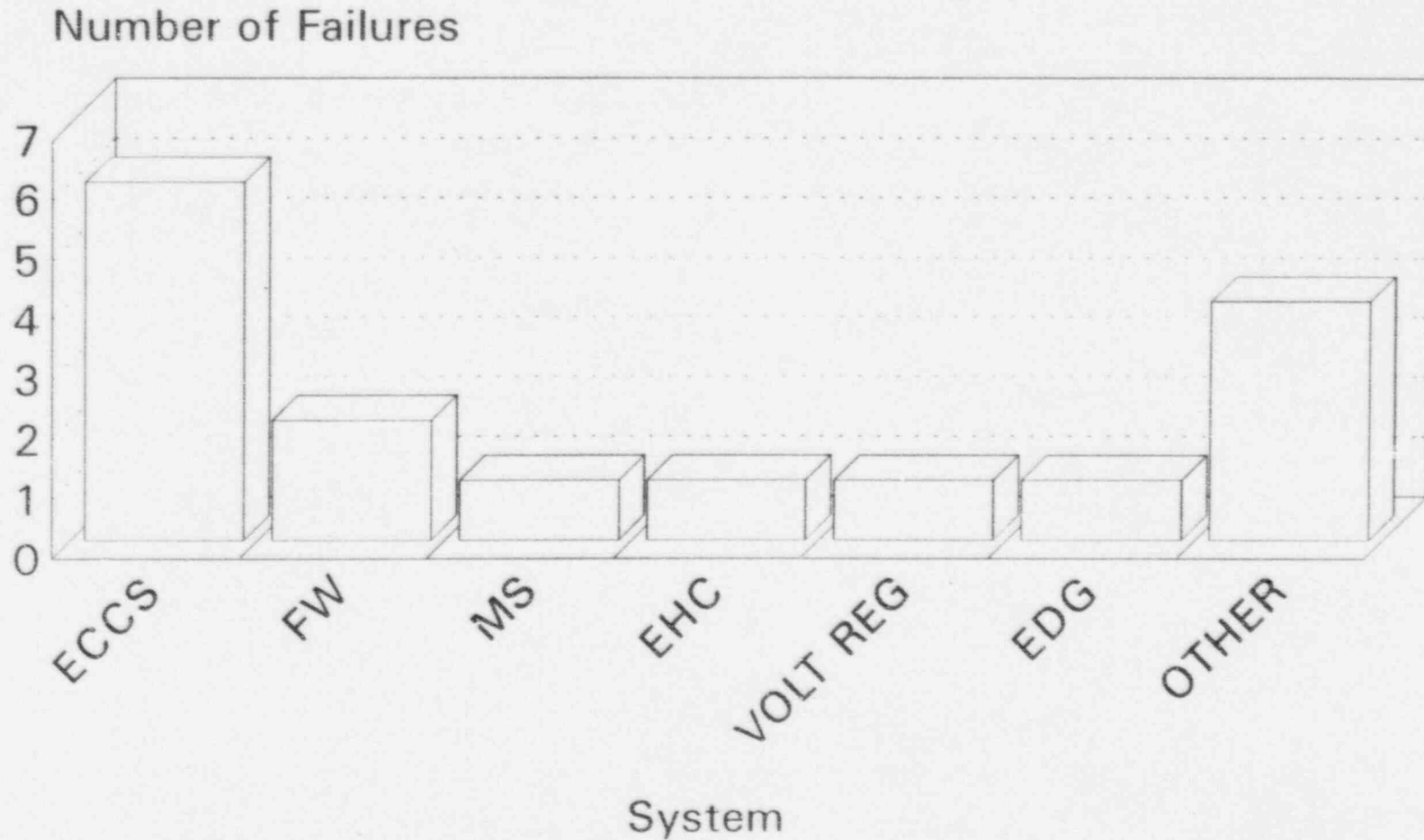
1994 - 1995



Based on Site Issues Matrix/LERs

RELAY FAILURES BY SYSTEM

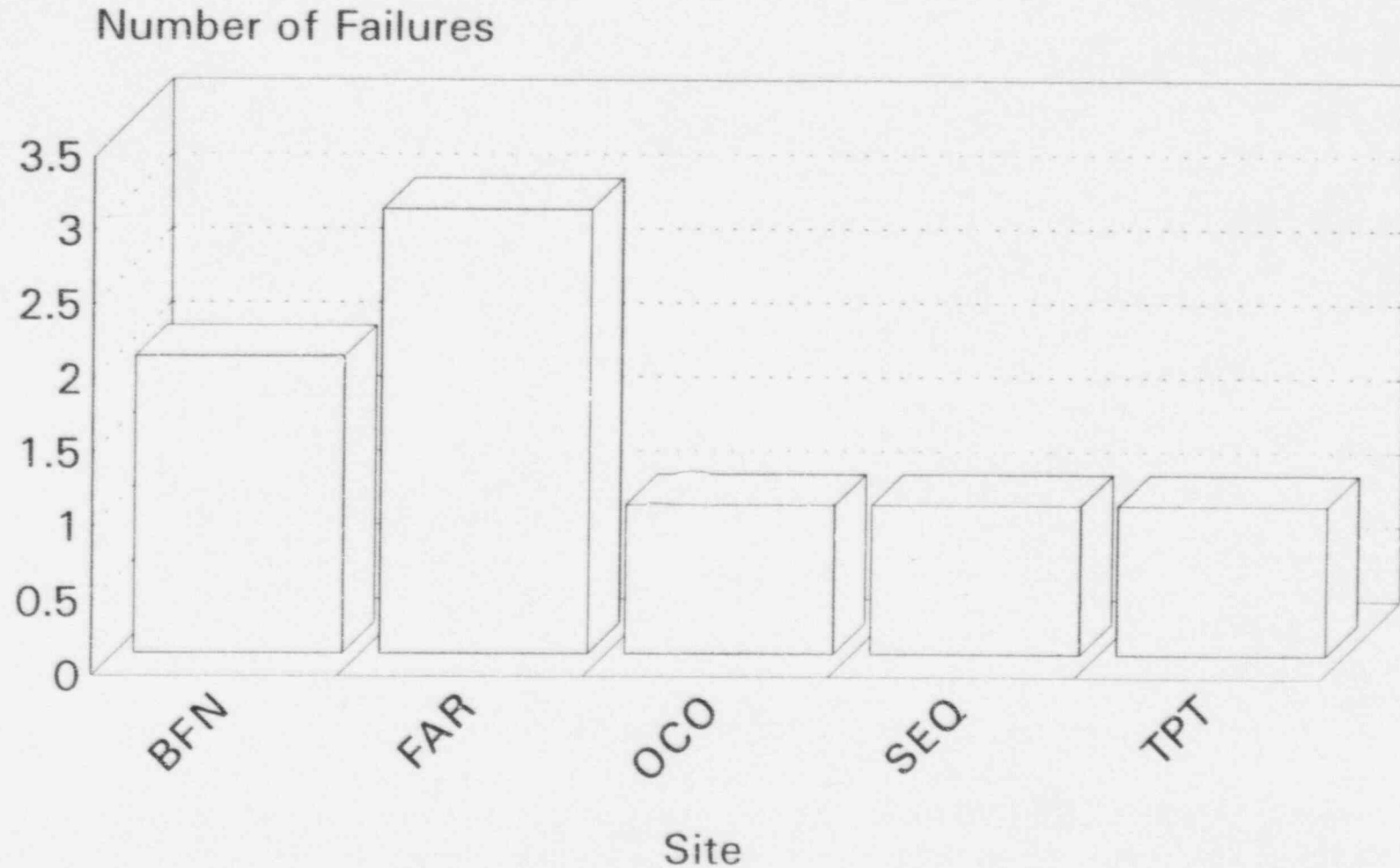
1994 - 1995



Based on Site Issues Matrix/LERs

SIGNIFICANT POWER SUPPLY FAILURES

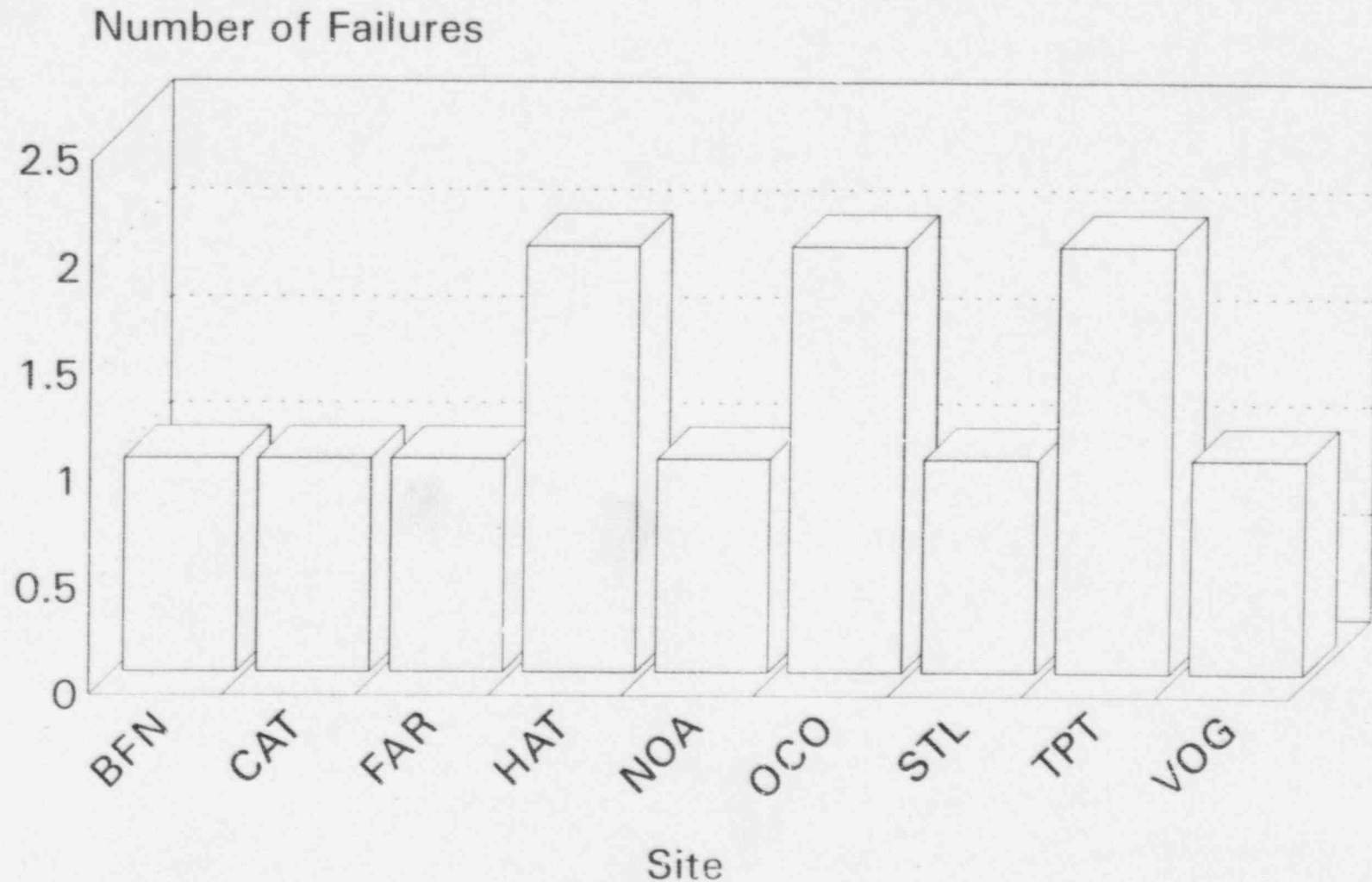
1994 - 1995



Based on Site Issues Matrix/LERs

SIGNIFICANT SENSOR/LOOP/MODULE FAILURES

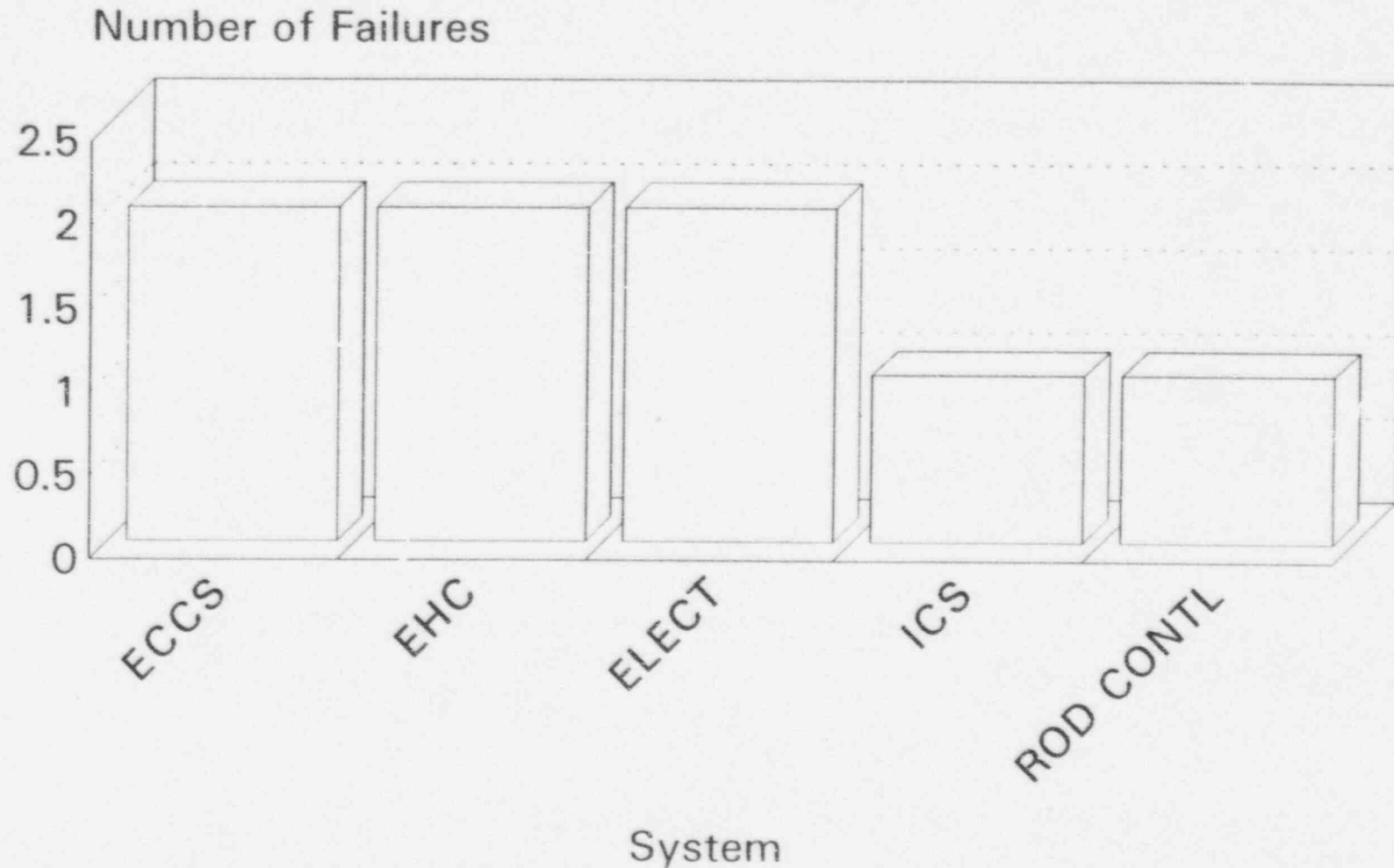
1994 - 1995



Based on Site Issues Matrix/LERs

POWER SUPPLY FAILURES BY SYSTEM

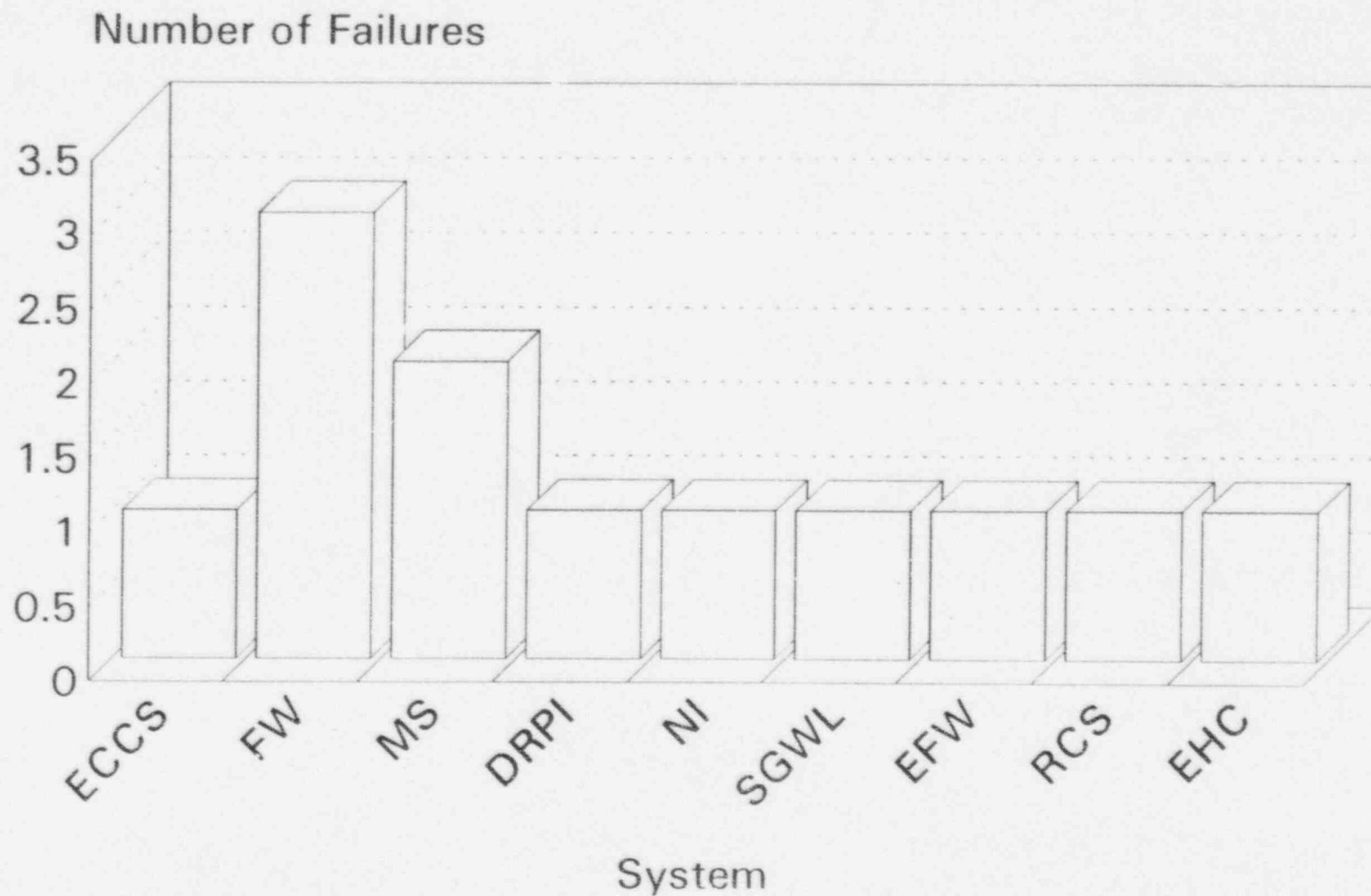
1994 - 1995



Based on Site Issues Matrix/LERs

SENSOR/LOOP/MODULE FAILURES BY SYSTEM

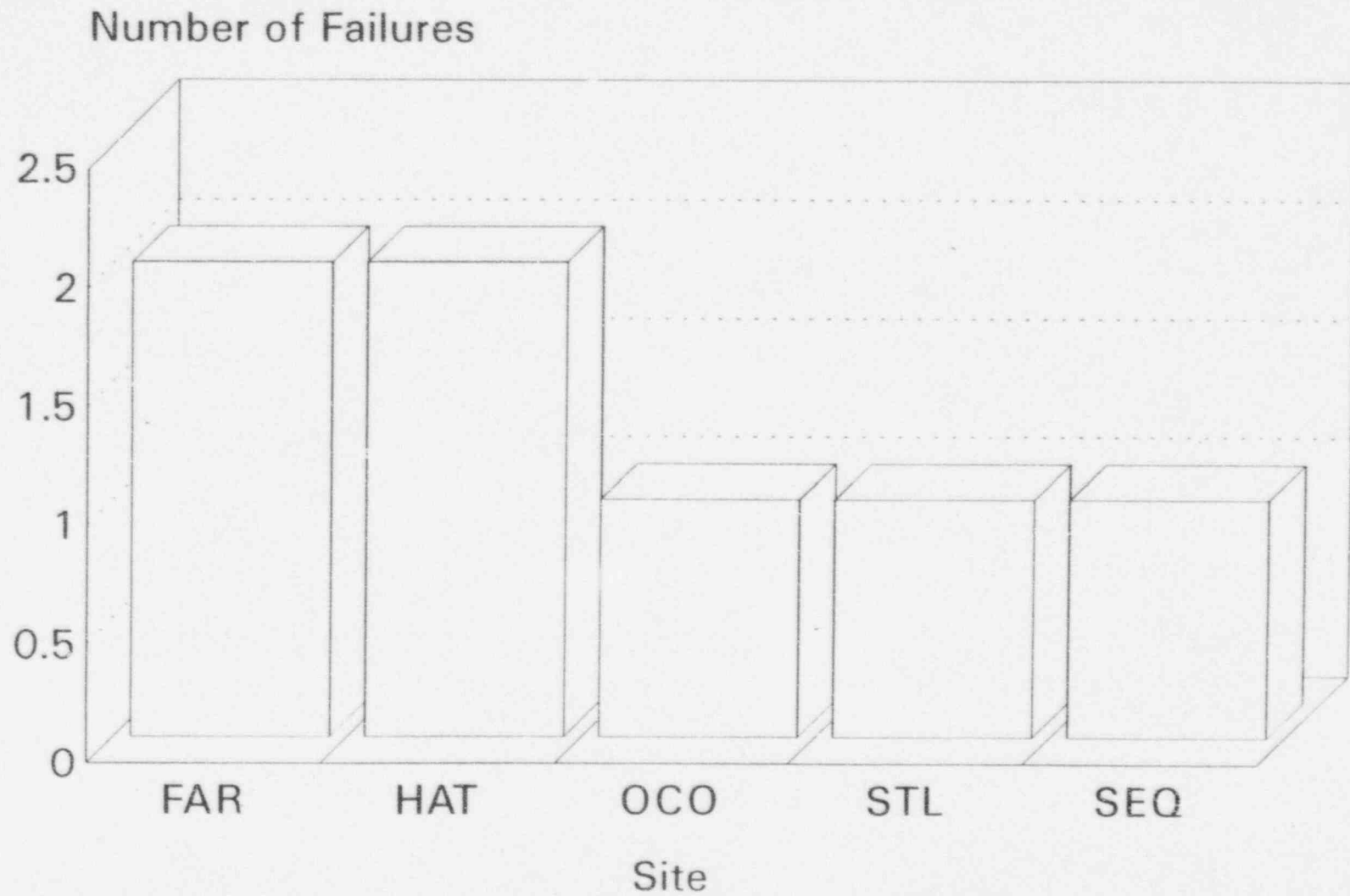
1994 - 1995



Based on Site Issues Matrix/LERs

SIGNIFICANT SETPOINT AND INSTRUMENT INACCURACIES

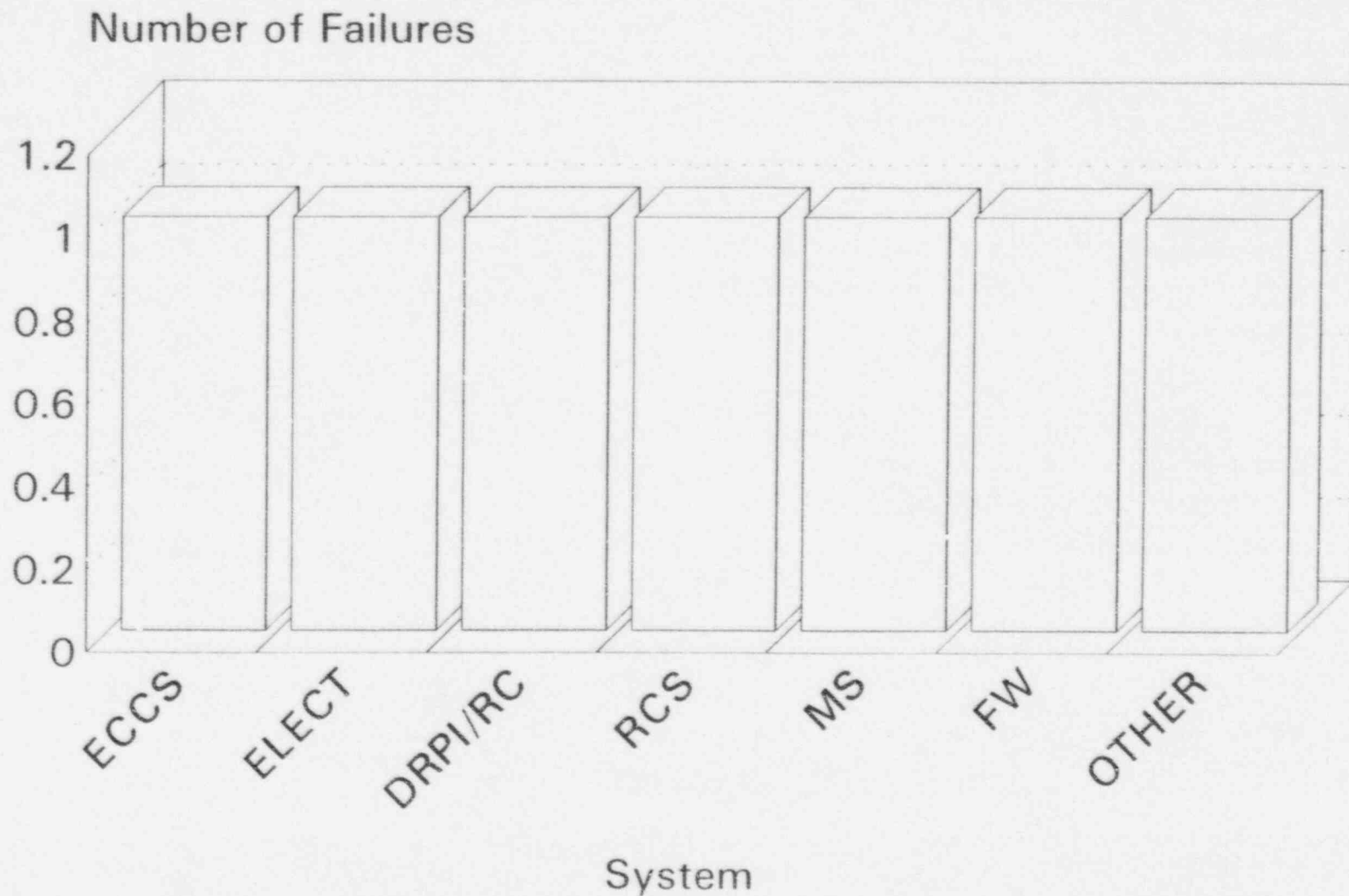
1994 - 1995



Based on Site Issues Matrix/LERs

SETPOINT DRIFT/INSTRUMENT INACCURACIES BY SYSTEM

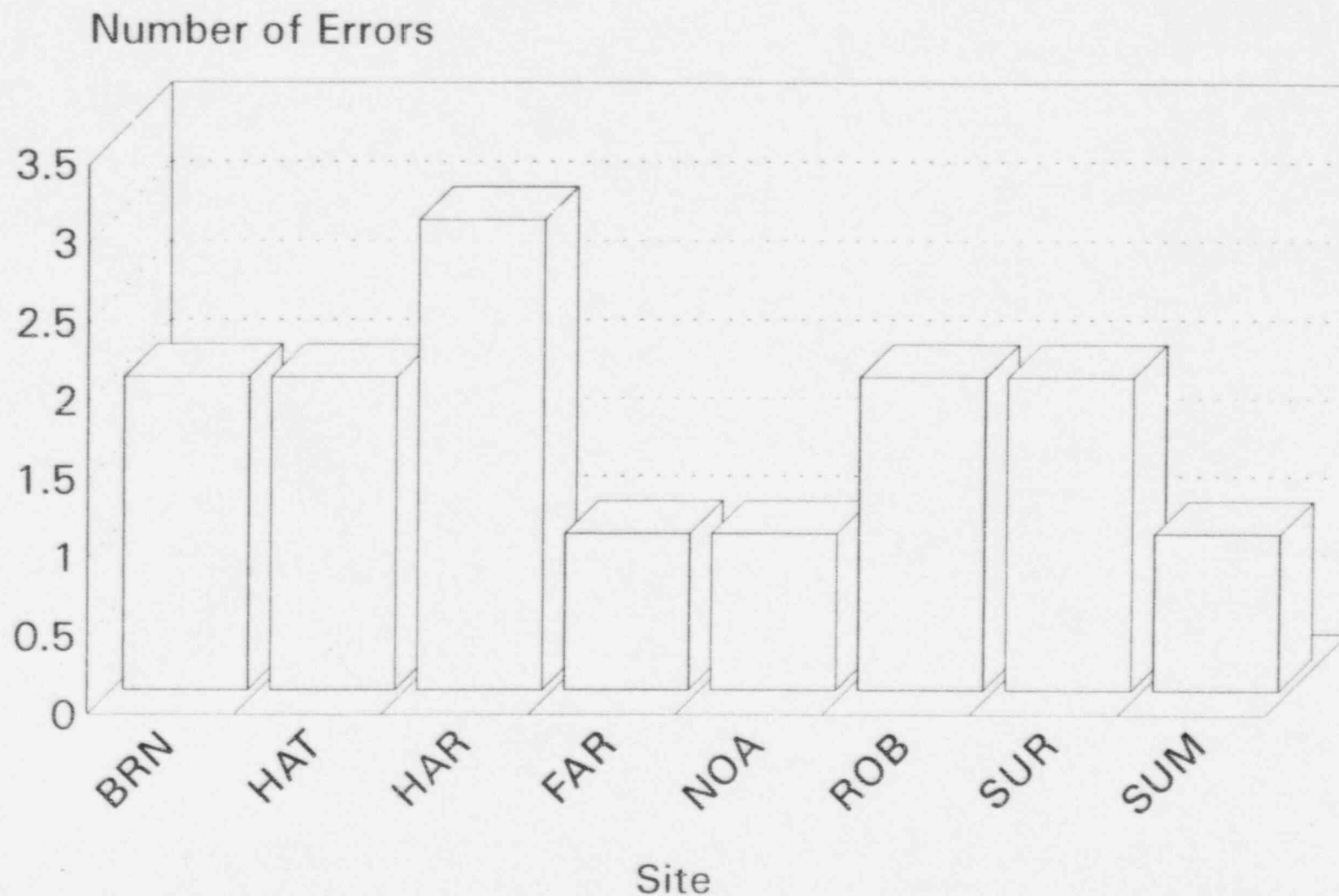
1994 - 1995



Based on Site Issues Matrix/LERs

SIGNIFICANT PERSONNEL ERRORS - INSTRUMENT CALIBRATION

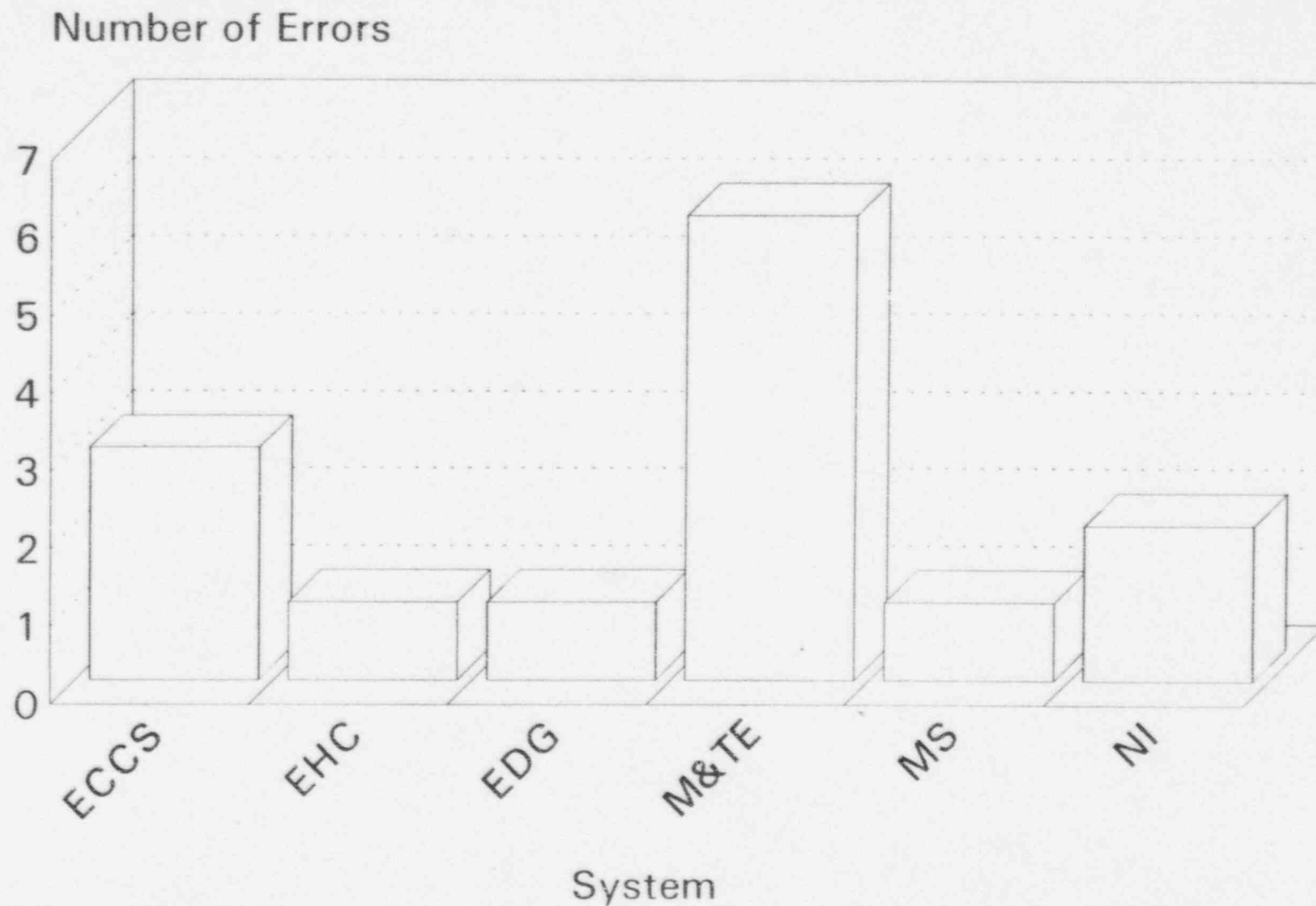
1994 - 1995



Based on Site Issues Matrix/LERs

SIGNIFICANT PERSONNEL ERRORS - INSTRUMENT CALIBRATION - BY SYSTEM

1994 - 1995

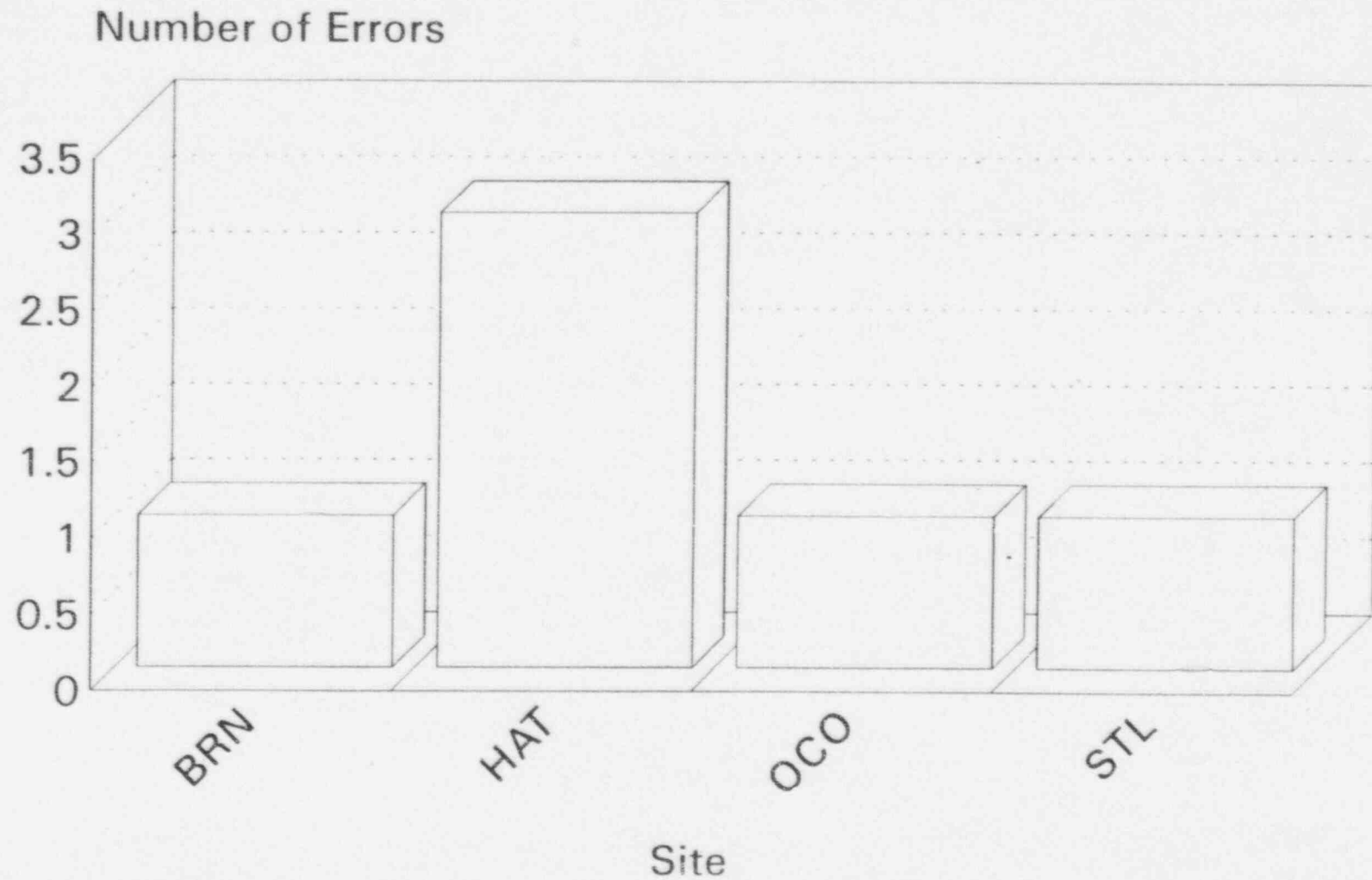


Based on Site Issues Matrix/LERs

SIGNIFICANT PERSONNEL ERRORS - ELECTRICAL SYSTEMS

CAUSING TRIPS/RUNBACKS

1994 - 1995

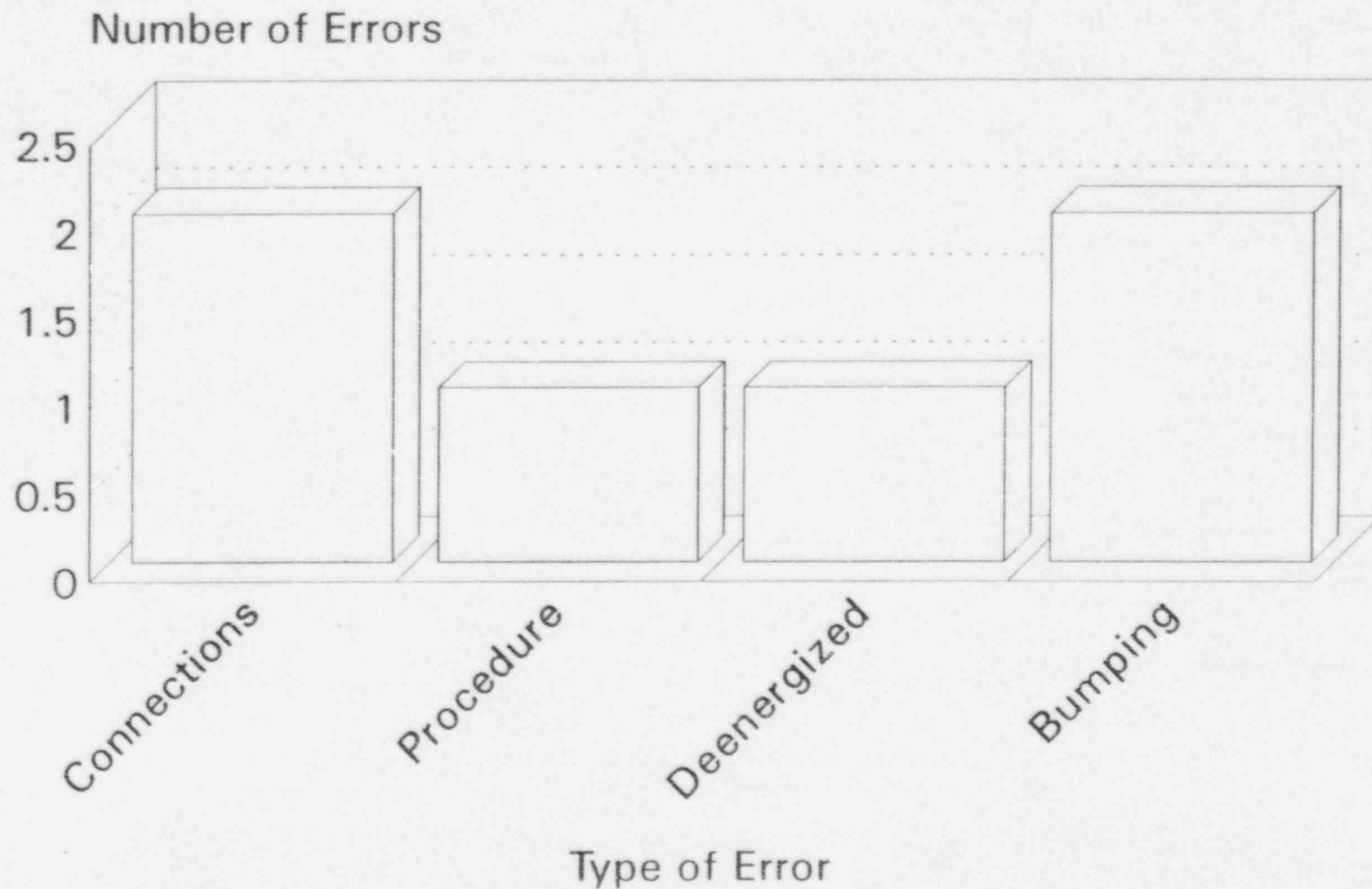


Based on Site Issues Matrix/LEAs

SIGNIFICANT PERSONNEL ERRORS - ELECTRICAL SYSTEMS

CAUSING TRIPS/RUNBACKS - BY SYSTEM

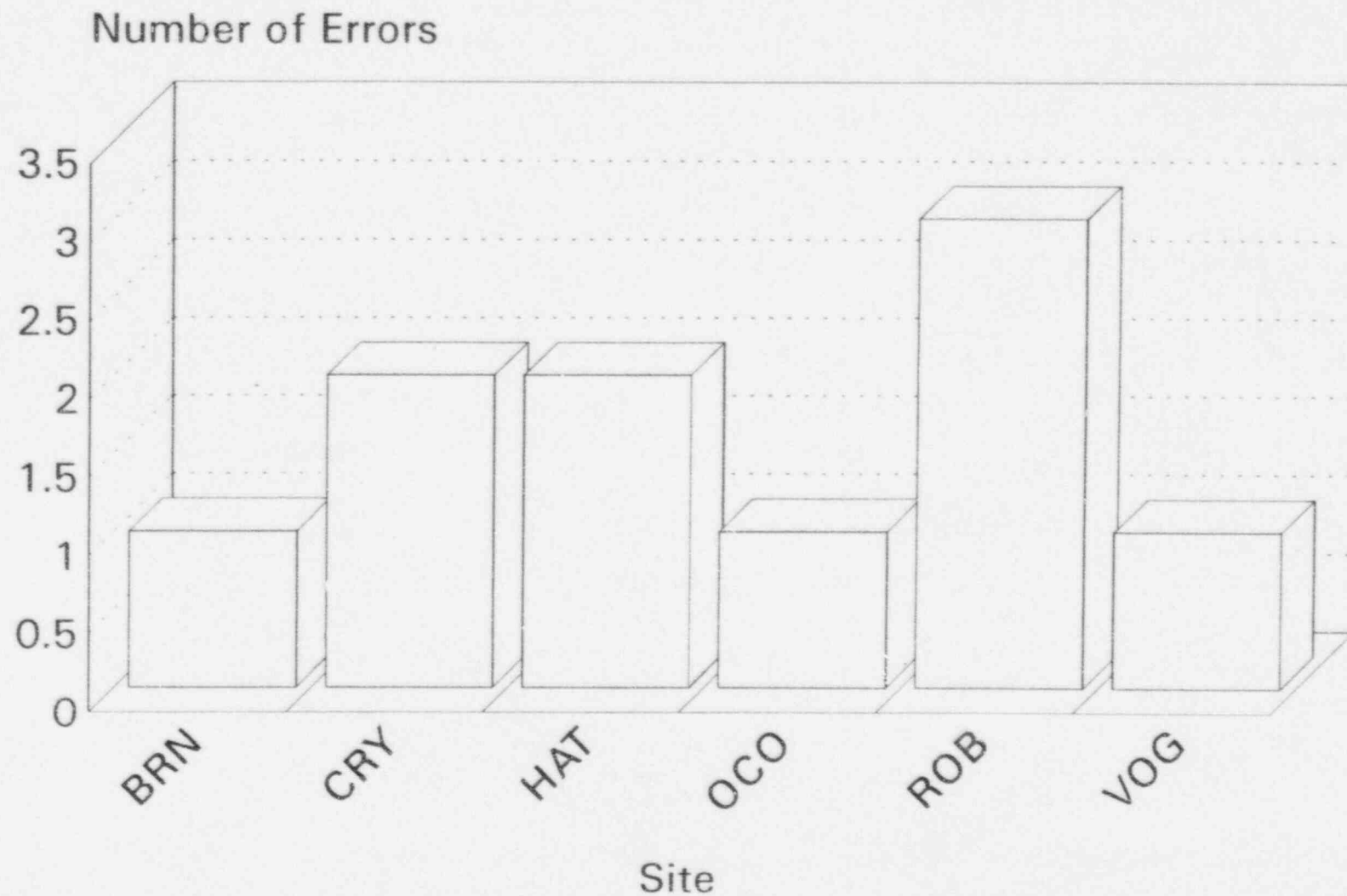
1994 - 1995



Based on Site Issues Matrix/LERs

SIGNIFICANT ERRORS IN CONTROL OF SETPOINTS AND LIMITS

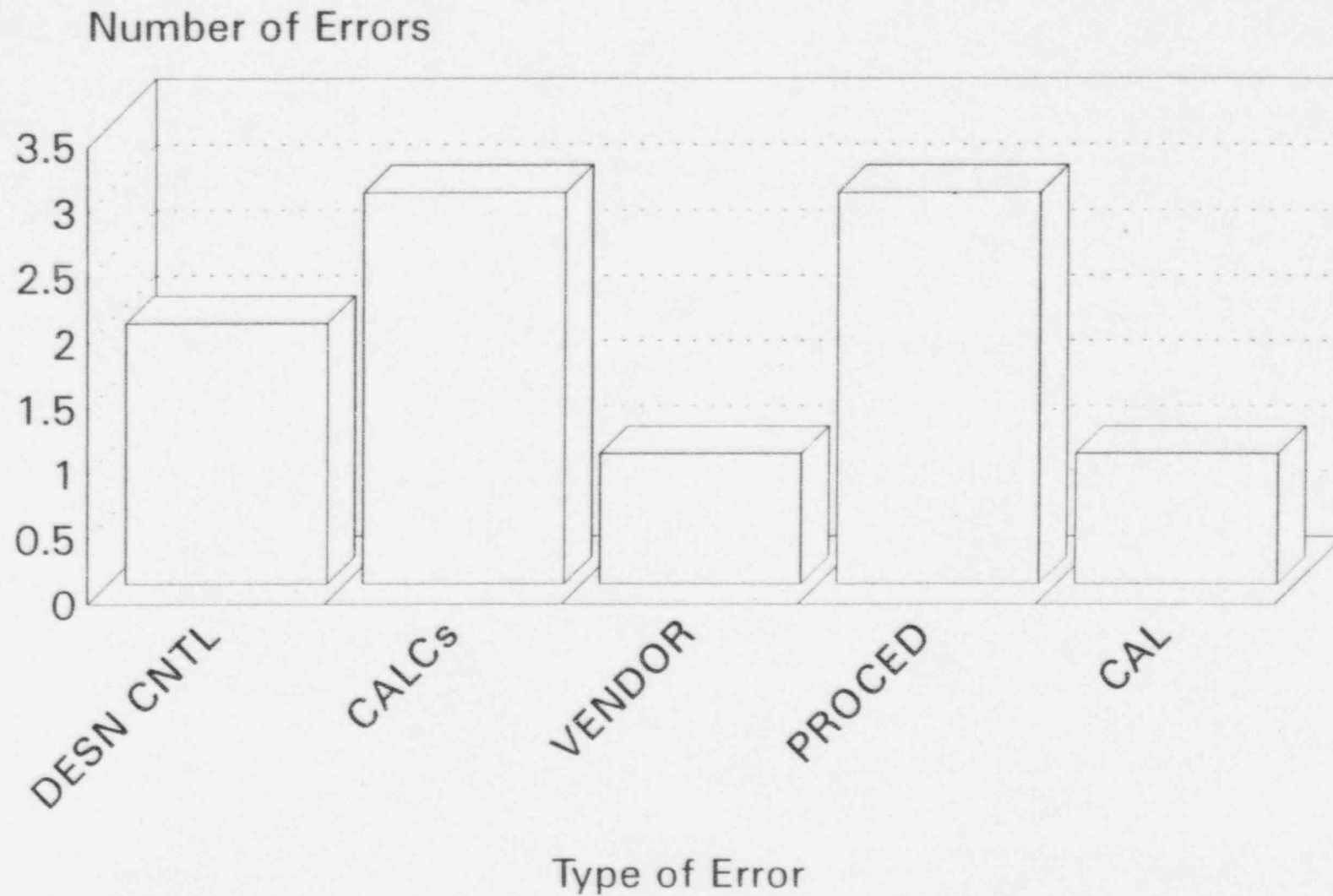
1994 - 1995



Based on Site Issues Matrix/LERs

SIGNIFICANT ERRORS IN CONTROL OF SETPOINTS AND LIMITS

1994 - 1995



Based on Site Issues Matrix/LERs

October 19, 1995

ST LUCIE

Site Integration Matrix

Date	Salp F.A.	Ref.	Cause	Identified	Description
9/28/95	MS	IR 95-18	Equipment Failure	Self Identifying	Leaking PZR SVs extended forced outage - problems with tailpipe alignment.
9/20/95	MS	IR 95-18	Equipment Failure	Self Identifying	Grounds in EDG 1A/1B governor control wiring resulted in load oscillations.
9/15/95	OPS/ MS	IR 95-18	Failure to Follow Procedures	Self Identifying	Maint/Ops did not provide clearance for work on condenser waterbox cover. Vacuum severed worker's finger.
9/14/95	PS	IR 95-18	Failure to Follow Procedure	Licensee	Security failed to take correct compensatory action on computer failure.
9/10/95	OPS	IR 95-18	Failure to Use Correct Procedure	Self Identifying	SG blowdown sent to incorrect system on RAB roof. Operator used wrong procedure. When identified did not back out of procedure correctly.
9/9/95	MS	IR 95-15	Weakness in Work Screening and Planning	Self Identifying	Leak on SV 1201 flange extended outage, identified one month earlier but not worked.
7/95	OPS	IR 95-15	Personnel Error/ Inoperable Equipment/OWA	Licensee	Unit 2 Main Generator overpressurized while filling with H2. Inattention by operators.
9/2/95	OPS	IR 95-15 VIO 95-15	Personnel Error	NRC	Weaknesses identified in logs relating to abnormal equipment conditions and out of service equipment not logged (multiple examples).
8/31/95	MS	IR 95-15	Personnel Error	Self Identifying	Damaged cylinder and head on 1B EDG due to loose lash adjustment.
8/30/95	PS	IR 95-15	Management and QC weaknesses	NRC	Containment closure walkdowns by management were inadequate and depended heavily on QC involvement to identify deficiencies.
8/30/95	MS	IR 95-15	Supervisory oversight and worker attitude	NRC	Maintenance personnel not using procedures for work in progress.
8/29/95	OPS	IR 95-15 VIO 95-15	Personnel Error	Licensee	Started 1B LPSI pump with suction valve closed. (No damage to pump)
8/29/95	MS	IR 95-15	Procedure Use	NRC	Maintenance journeyman not signing off procedure steps as work completed (previously identified as a weakness in May 1995).
8/23/95	MS	IR 95-15	Equipment Failure/ Inadequate Corrective Action	Self Identifying	2A HDP trip due to relay failure. Eight HDP trips in past year. Engineering solution available but not implemented.
8/22/95	PS	IR 95-15	Personnel Error	NRC	QA failed to document a deficiency on containment spray valve surveillance identified in an audit.
8/19/95	OPS	IR 95-15	Operator Error/ Operator Workaround	Self Identifying	Overfill of PWT. Spilled approx. 10K gallons on ground inside RCA. Operator work around on level control system and inattention to filling process by operator caused error.

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8/18/95	MS	IR 95-15	Procedural Weakness	NRC	Procedural weakness involving supervisory oversight and journeyman qualification.
9/17/95	OPS	LER U1 95-007 VIO 95-15	Procedural Inadequacy and Weakness/ Operator-Work-Around	Self Identifying	Spraydown of Unit 1 containment. STAR process did not assign accountability for corrective action. Valve surveillance prelude not documented on STAR.
8/9/95	MS	LER U1 95-005	Maintenance/ Testing errors	Licensee	Inoperable Unit 1 PORVs due to maintenance error/testing inadequacy. (Valves assembled incorrectly) (Used acoustic data only)
8/6/95	ENG	LER U1 95-006 VIO 95-15	Corrective Action/Procedural Weakness	Self Identifying	Lifting of Unit 1 SDC thermal relief due to procedural revision from previous corrective action. Inoperable equipment not logged.
8/2/95	OPS	LER U1 95-004 VIO 95-15	Procedural Weakness/Failure to Follow Procedures	Licensee	1A2 RCP seal failure due to "restaging" at high temperature.
8/2/95	OPS	LER U1 95-04 VIO 95-15	Operator Error	Self-Identifying	Operator failed to block MSIS actuation during cooldown.
7/29/95	MS	IR 95-14	Procedural Weakness	Self identifying	I&C personnel attempt to test a level switch circuit which could not actuate given system conditions.
7/29/95	OPS	IR 95-14	Operator Error/Procedural Weakness	Self Identifying	Turbine/Reactor Trip due to test error.
7/29/95	MS	IR 94-14	Root Cause Pending	Self identifying	Catastrophic failure of Unit 2 B train CEDM cooling fan.
3/95	PS	IR 95-14	Security Weakness	Self Identifying	Automobile passed through normally closed security gate to plant intake/discharge canals at beach. Subsequent accident resulted in vehicle lodged in discharge canal piping.
7/1/95	OPS	IR 95-12	Weak Log Keeping	NRC	Weaknesses identified in logs relating to battery jumper installation and out-of-service equipment.
7/1/95	MS	IR 95-12	Maintenance	Self Identifying	Corrosion in transformer fire protection deluge system results in multiple failures.
7/1/95	PS	IR 95-12 NCV 95-12-02	Personnel Error	NRC	Three pieces of SNM found improperly tagged.
7/1/95	PS	IR 95-12	Program Weaknesses	NRC	Fire Protection program weaknesses identified in fire-fighting techniques and respirator qualification program.
7/1/95	MS	IR 95-12 NCV 95-12-01	Personnel Error	NRC	M&TE found installed across battery cell without J/LL authorization.
6/3/95	MS	IR 95-10	Procedural Adequacy/ Adherence	NRC	Several examples of weak adherence to procedures, including step signoffs and independent verification, identified.
6/3/95	MS	IR 95-10	Poor Communication	Licensee	Poor communication/lack of detailed instruction leads to improper 1B EDG governor installation.
6/3/95	MS	IR 95-10	Poor Maintenance/Procedures	NRC	HVAC systems for both units poorly maintained/Operating procedures contained numerous deficiencies.
3/95	MS	IR 95-10 NCV 95-10-01	Poor Surveillance Tracking System	Licensee	Missed several surveillances (7 day) on EDG.
4/29/95	MS	IR 95-09 NCV 95-09-01	Personnel Error	Licensee	Failure to perform personnel air lock testing on time.

4/28/95	OPS	IR 95-05	Corrective Action Program Weakness	NRC	STAR/NCR program did not address evaluating past operability
28/95	MS	IR 95-05	Maintenance Error	Licensee	Incore Instruments at ICI Flange 8 miswired - ICI output signals directed to wrong computer points.
4/28/95	OPS	IR 95-05	Weakness in Temp Mod Procedure	NRC	Weakness in addressing how mods would affect control room drawings.
4/28/95	ENG	IR 95-05 NCV 95-05-04	Failure to Implement Corrective Action Program	NRC	Failure to document nonconformance regarding ICI flange 8 conditions.
4/28/95	MS	IR 95-05 VIO 95-05-01	Design Implementation Discrepancy	NRC	Installation of wrong overload heater models in switchgear.
4/1/95	OPS	IR 95-07 NCV 95-07-02	Apparent Personnel Error	Licensee	Unit 1 experienced an approximate 14 minute loss of shutdown cooling while shifting from one shutdown cooling loop to the other. The root cause was the closing of the wrong SDC suction isolation valve (the valve for the operating, vice idle, pump) on the part of the operator.
4/1/95	MS	IR 95-07 NCV 95-07-02	Poor Adherence to J/LL and Maintenance Procedures	Licensee	Jumper left installed in ECCS ventilation damper after work complete.
4/1/95	OPS	IR 95-07	Weak Annunciator Response	NRC	Weak annunciator response by ROs contributed to loss of shutdown cooling event.
7/26/95	MS	IR 94-09	Procedural Weakness	NRC	LPSI mechanical seal housing outer cap misinstalled.
3/26/95	OFS	IR 94-09	Operator Error/Procedural Weakness	NRC	Operator failure to recognize out-of-sight high indication on EDG cooling water tank. Failure of procedure to include instructions on draining tank.
3/04/95	ENG	IR 95-04	Design	Licensee	SDC suction relief valve lift due to water hammer.
3/04/95	OPS	IR 95-04	House-keeping	NRC	Loose plastic debris found in Unit 2 fuel pool area.
2/27/95	MS	IR 95-04	Equipment Failure	Self Identifying	Unit 1 was shut down for the replacement of 3 pressurizer code safety valves. The valves were leaking by the seat.
2/21/95	OPS	IR 95-04	Equipment Failure	Self Identifying	Unit 2 trip due to failure of a SGWL control level transmitter. Transmitter failed high, resulting in closure of the FRV and a subsequent trip on low SGWL. (95-04)
2/20/95	OPS	IR 95-04	Equipment Anomaly	Self Identifying	25 LPSI pump found air-bound during surveillance testing. The licensee has theorized that the migration of air in the system resulted in the condition as a result of previous surveillance testing. The pumps are not self-venting.
2/17/95	MS	IR 95-02	Physical Condition	NRC	Numerous areas of corrosion identified in Unit 1/2 CCW areas.
2/17/95	PS	IR 95-03	Personnel Error / Training Weakness	NRC	In two observed exercises, ECs failed to notify states within 15 minutes.
16/95	MS	IR 95-04	Maintenance Error / Procedural Weakness	Self Identifying	Load shed of the 1A3 1E 4160 bus due to inadvertent jumper contact while replacing a degraded voltage relay.

2/4/95	OPS	IR 95-01 VIO 95-01-01	Operator Error/Com- munications	Licensee	Failure to sample SIT within TS required time frame following volume addition. Second occurrence in 2 years.
4/95	OPS	IR 95-01	Poor Communications	NRC	Failure to identify and analyze Unit 1 hot leg flow stratification
2/4/95	MS	IR 95-01 VIO 95-01-02	Personnel Error/ Program Weakness	Self Identifying	Inadequate independent verification resulted in CVCS letdown control valve failing to respond due to reversed leads. Resulted in a cessation of letdown flow.
12/31/94	ENG	IR 94-25 NCV 94-25-01	Engineering Design Error	Self Identifying	Inadequate design control of NaOH cross-connection between ECCS trains.
12/3/94	PS	IR 94-24 NCV 94-24-01	Procedure Review Inadequacy	Licensee	Failure to perform TS-required periodic procedure reviews.
12/3/94	MS	IR 94-24 VIO 94-24-02	Maintenance Procedures Inadequacy	NRC	Inadequate process for changes to vendor technical manuals.
11/25/94	MS	IR 94-22	Program weakness	Licensee	The licensee's QA organization identified numerous weaknesses in the implementation of the site's welding program. As a result, the Maintenance Manager placed a stop work order on welding activities. The stoppage lasted one week.
11/24/94	MS	IR 94-24	Procedure weakness	Self-Identifying	Unit 1 B side SIAS actuation due to a bistable module which had not been adequately withdrawn from the ESFAS cabinet during maintenance.
11/23/94	MS	IR 94-24	Equipment Failure	Self Identifying	Unit 1 SIAS with unit in mode 5 due to common mode failure of Rosemount transmitters used for pressurizer pressure channels.
/5/94	OPS	IR 94-22 NCV 94-22-03	Operations, Maintenance Errors	Licensee	Waste gas release on Sept. 10, 1993, with meteorological instruments out of service.
10/26/94	MS	IR 94-22 LER	Weather-Related/ Maintenance	Self-identifying	Unit 1 automatically tripped due to arc-over from a potential transformer due to salt buildup on switchyard insulators.
9/30/94	OPS MS	IR 94-20	Inconsistent Expectations	NRC	Local valve position indicators not maintained accurate. Procedures/training provided to operators on verifying valve position found weak.
9/30/94	OPS	IR 94-20	Operations, Maintenance Deficiency	NRC	Plant personnel not trained on IPE and not using it for work planning and scheduling.
9/30/94	OPS	IR 94-19	Operations Weakness	NRC	During requal exam, a licensed operator exhibited an apparent disregard for EOPs.
9/30/94	MS	IR 94-20	Personnel Error	Licensee	Maintenance personnel begin to work the wrong RWT isolation valve, threatening the operability of both trains of ECCS.
9/30/94	OPS	IR 94-19 NCV 94-19-01	Operations Error	Licensee	Failure to notify the NRC of changes in status of licensed operators' medical conditions.
8/29/94	OPS	IR 94-20 VIO 94-22-01 VIO 94-22-02	Operations Errors	NRC	Operators placed 1A EDG in an electrical lineup for which TS-required surveillance tests had not been performed (with the safety-related swing bus powered from it). Also, related control room log entries appeared to be inaccurate.
28/94	OPS	IR 94-20	Equipment Failure	Licensee	Unit 1 was taken off line (Mode 2) to repair a DEH leak. The unit was returned on line later the same day.

8/12/94	OPS	IR 94-18	Operations/ Maintenance Error and Lack of Engineering Drawings/In- spection Criteria	NRC	The licensee was unloading new fuel for Unit 1 with a hoist grapple that was missing the safety latch sleeve locating pin. The safety sleeve functioned by friction only.
7/14/94	MS	IR 94-15 LER U-2 94- 06 VIO 94-15-01	Equipment Failure/Poor Management Decision	Licensee/NRC	During surveillance test, TCB 5 failed to open due to mechanical binding (licensee). The licensee failed to recognize the condition as requiring a shutdown per TS (NRC).
7/9/94	OPS	IR 94-15	Equipment Failure	Licensee	Unit 2 turbine was shut down and reactor power reduced to Mode 2 because the 2B1 RCP lower oil level indication showed a leak. The indication was later shown to be erroneous.
7/8/94	OPS	IR 94-15 LER U2 94-05	Operator Error	Licensee	TS 3.0.3 entry due to placing 2A1 LPSi pump and 2B charging pump OOS at the same time.
6/28/94	MS	IR 94-14 NCV 94-14-01 LER U-2 94- 04	Personnel Error/ Procedural Weakness	Licensee	Inoperable Unit 2 RAB ventilation exhaust WRGM due to failure to connect sample lines.
6/6/94	OPS	IR 94-14	Weather	Licensee	Unit 1 trip from 100% power during a severe thunderstorm due to debris blown across two main transformer output terminals.
5/28/94	PS	IR 94-13 DEV 94-13-01	Poor Corrective Action	NRC	Emergency supplies in control room less than stated in FSAR.
5/6/94	ENG	IR 94-11 VIO 94-11-01	Engineering Error	NRC	Inadequate corrective action for MOVs which stalled during surveillances.
4/23/94	OPS	IR 94-12 LER U-2 94- 03	Mfg. Error	Self Identifying	Unit 2 auto reactor trip from 30% power caused by RPS cabinet wiring error for trip bypass circuit, from original unit construction.
4/23/94	MS	IR 94-12	Equipment Failure	Self-Identifying	Following unit 2 trip, steam bypass system operated unexpectedly and dropped RCS temp by seven degrees F, pressurizer heaters turned off.
4/21/94	OPS	IR 94-12	Operator Inattentiveness	Licensee	Unit 2 reactor power increased from 26 to 31% due to positive MTC.
4/7/94	MS	IR 94-10 VIO 94-10-01	Maintenance Error	NRC	Contractor personnel made and contractor QC accepted pressurizer nozzle weld prep that did not meet procedural requirements for bevel angle. Licensee engineering had specified overly tight tolerances.
4/3/94	OPS	IR 94-12 LER U1 94-04	Operations Procedure Error (Lack of sufficient depth in review)	Self-Identifying	Unit 1 auto reactor trip due to unusual electrical lineup (isochronous EDG paralleled with offsite power through TCBs).
4/3/94	ENG	IR 94-12 VIO 94-12-01	Surveillance Error	Licensee	Licensee discovered that the 4160 V [AB Bus] swing bus components [C ICW Pump and C CCW Pump] would not strip from the bus upon undervoltage if the bus were aligned to the B bus due to a missing wire.
3/28/94	MS	IR 94-09 LER U1 94-03	Personnel Error	Self Identifying	Unit 1 auto reactor trip. Maintenance foreman opened generator exciter breaker on wrong unit.
3/16/94	ENG	IR 94-08 VIO 94-08-01 VIO 94-08-02	Engineering Corrective Action	NRC	Regional inspector had two Unit 2 SL4 violations: 1) corrective action for an 11/24/92 water hammer event was done without documented instructions or procedures, resulting in operating until 3/94 with five snubbers on the SRV and PORV tailpipes inoperable. 2) Failure to write a nonconformance report for a damaged pipe support in March 1994.

