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50-389 St. Lucie Plant, Unit 2, Florida Power & Light Co. 05000389
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RECIP. NAME RECIPIENT AFFILIATION
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SUBJECT: Forwards matl reviewed during 960216 FP&L mgt review meeting including key performance indicators for plant.

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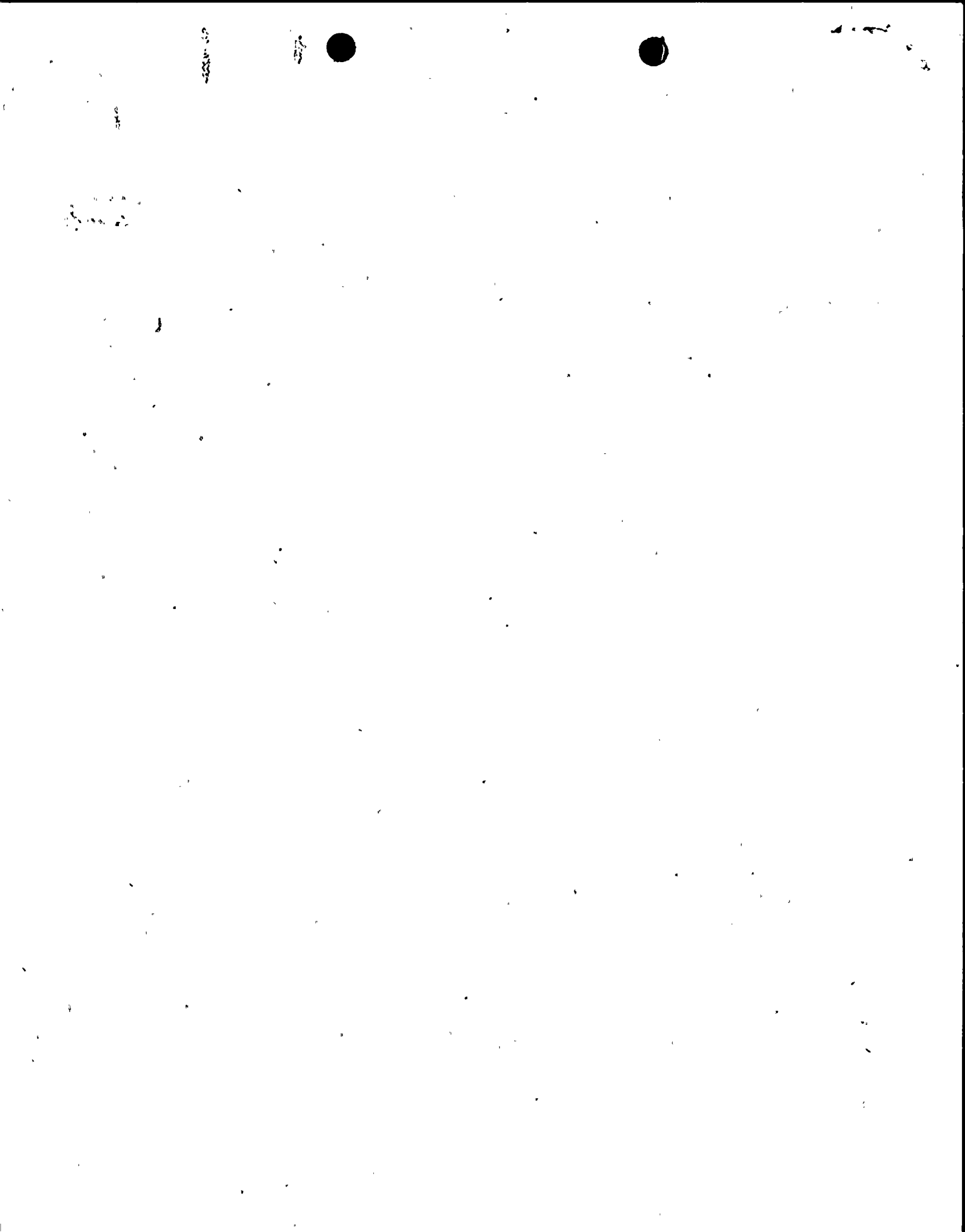
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P.O. Box 128, Ft. Pierce, FL 34954-0128

March 1, 1996

L-96-54
10 CFR 50.4

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

RE: St. Lucie Units 1 and 2
Docket Nos. 50-335 and 50-389
Management Review Meeting - February 1996

During a November 1995 meeting with the NRC, Florida Power and Light Company (FPL) reviewed the progress made in completing activities outlined in the St. Lucie Plan to Improve Operational Performance. FPL stated that meetings to review performance would be held monthly and would include a detailed review of the plant's key performance indicators. In the November meeting, FPL committed to provide the monthly review materials to the NRC.

Attached is a copy of the materials reviewed during the February 16, 1996, FPL Management Review Meeting including the key performance indicators for St. Lucie Plant.

We look forward to NRC presence and feedback at these monthly meetings. If you have any questions on this material, please contact us.

Very truly yours,

W. H. Bohlke
Vice President
St. Lucie Plant

WHB/GRM

cc:

Stewart D. Ebnetter, Regional Administrator, USNRC, Region II
Ellis W. Merschhoff, Director, DRP, USNRC, Region II
Kerry D. Landis, Branch Chief, USNRC, Region II
Senior Resident Inspector, USNRC, St. Lucie Plant
Jan Norris, Senior Project Manager, USNRC, NRR

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P PDR

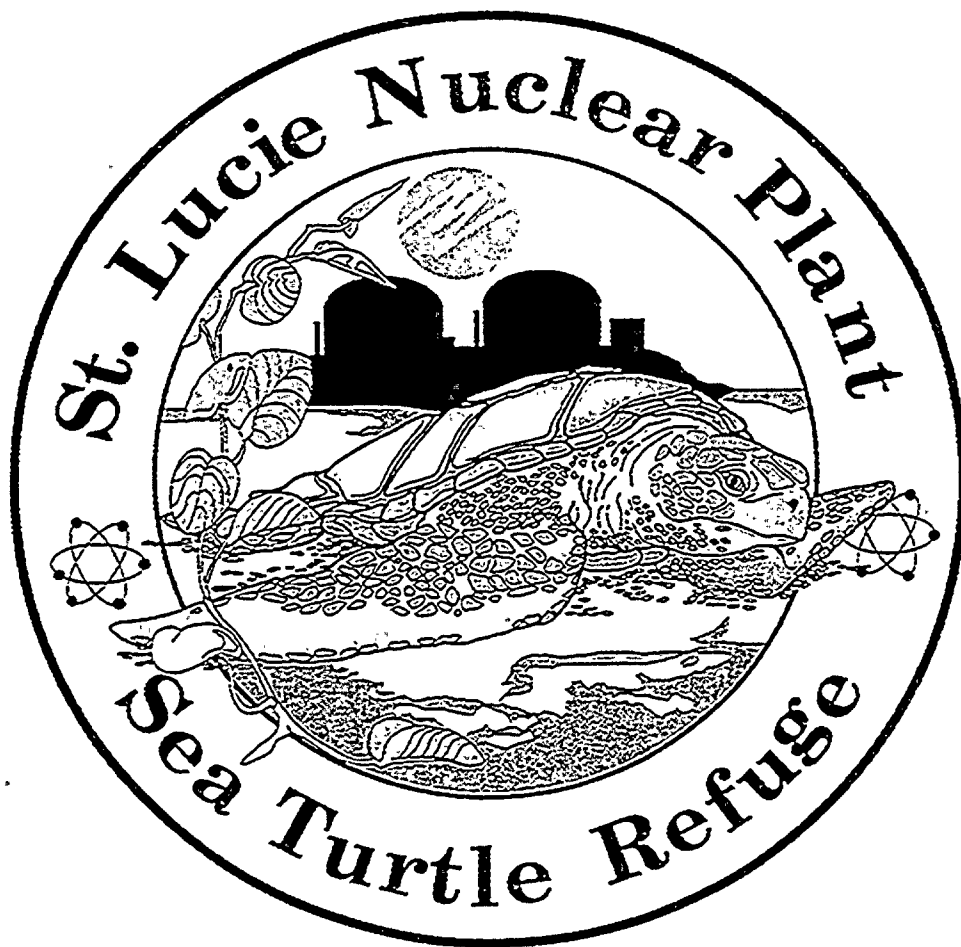
an FPL Group company

ADD 1

020020

ST. LUCIE

Status Meeting



2/16/96

.9603050394



ST. LUCIE STATUS MEETING AGENDA
FOR FEBRUARY 16, 1996
9:00 AM, SSB ROOM 2200

<u>OPENING REMARKS</u>	B. Bohlke
<u>OPERATING-REPORT</u>	J. Scarola
AFW VALVE FOP STATUS/FW CHECK VALVES	B. Green
EXCESS DILUTION - STATUS OF ACTIONS	M. Snyder
LETDOWN SYSTEM	J. Porter
<u>1996 OPERATING PLAN PROJECTS</u>	
RPS MODIFICATIONS	R. Olson
<u>DEPARTMENT REPORTS</u>	
OUTAGE MANAGEMENT	A. Pell
OPERATIONS	J. West
MAINTENANCE	J. Marchese
SYSTEMS/COMPONENTS	L. Rogers
ENGINEERING	D. Denver
QUALITY ASSURANCE	W. Bladow
CORRECTIVE ACTION PROGRAM	B. Dawson
NUCLEAR MATERIALS MANAGEMENT	T. Kreinberg
SERVICES	K. Heffelfinger
LICENSING	E. Weinkam
HUMAN RESOURCES	A. DeSoiza
<u>LUNCH</u>	
PRESENTATION ON SCOPE CONTROL	J. Hartzog



OPERATING REPORT



ST. LUCIE UNIT STATUS

AVAILABILITY SUMMARY

UNIT 1

100% Power

74 Days On-line 11/18/95 thru 1/31/96

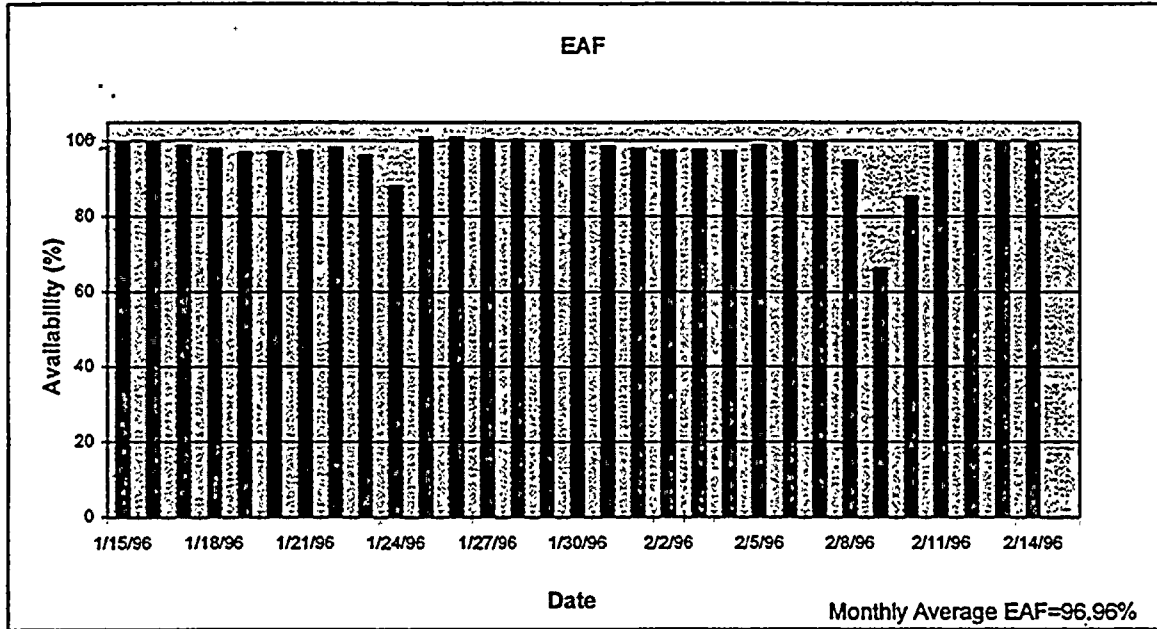
UNIT 2

100% Power

24 Days On-line 1/7/96 thru 1/31/96



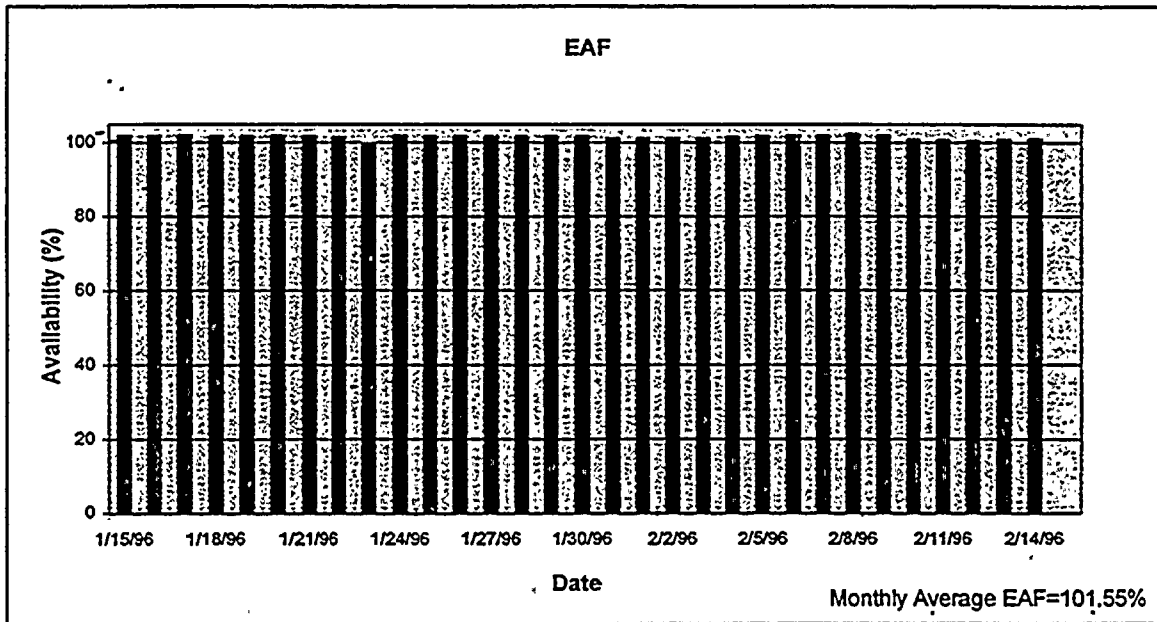
Unit 1 Daily EAF



Lost Generation

Date	MWH Loss	Reason
1/17/96	-185	Increasing backpressure.
1/18/96	-403	Increasing backpressure.
1/19/96	-594	Feedwater valve.
1/20/96	-580	High backpressure.
1/21/96	-511	RCS dilution.
1/22/96	-377	High backpressure.
1/23/96	-787	Waterbox cleaning.
1/24/96	-2404	Waterbox cleaning.
1/31/96	-252	High backpressure.
2/1/96	-423	High backpressure/water temp.
2/2/96	-423	High backpressure.
2/3/96	-522	High backpressure.
2/4/96	-532	High backpressure.
2/5/96	-183	High backpressure.
2/8/96	-1057	Waterbox Cleaning
2/9/96	-6770	Waterbox Cleaning
2/10/96	-2980	Waterbox Cleaning
2/11/96	-109	Limitation not to exceed 549 Tc.
2/12/96	-109	Limitation not to exceed 549 Tc.
2/14/96	-133	Limitation not to exceed 549 Tc.

Unit 2 Daily EAF

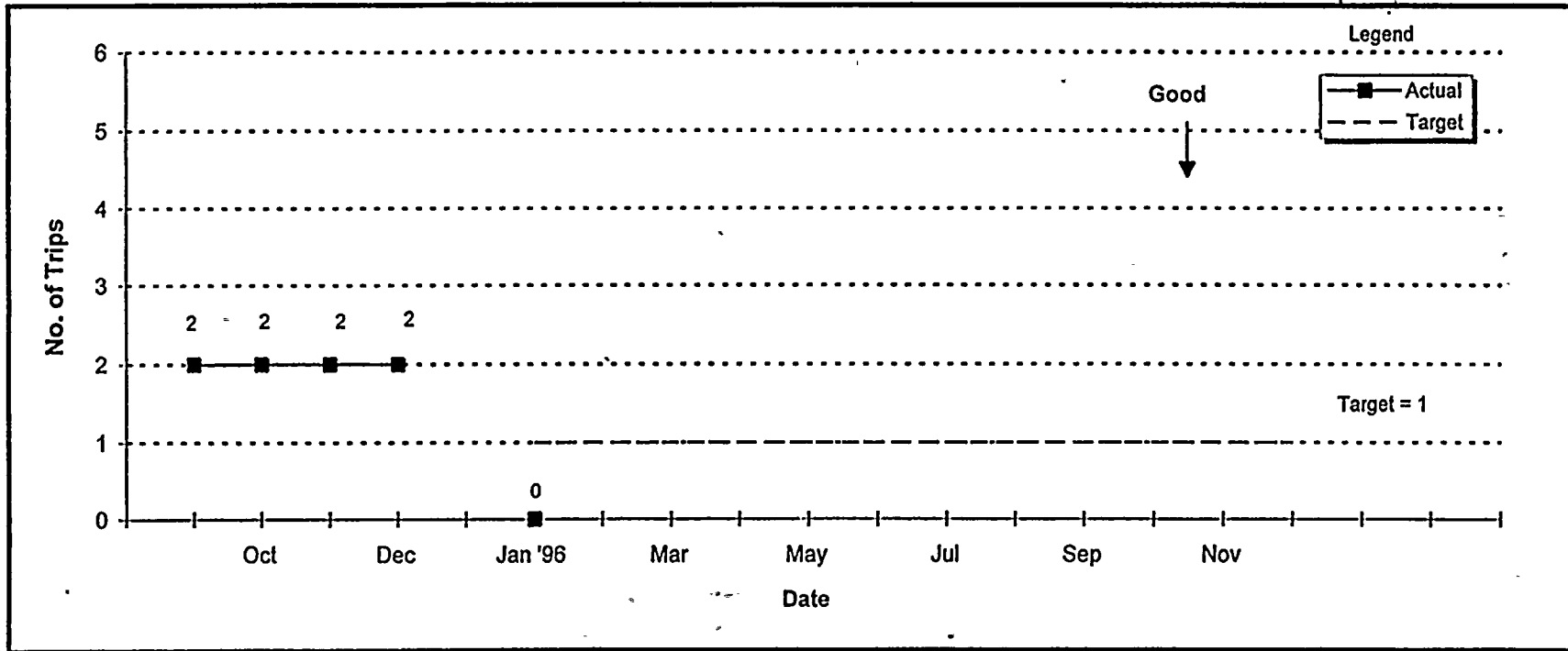


Lost Generation

Date	MWHLoss	Reason
1/23/96	-407	Turbine valve test.
1/31/96	-141	Increasing backpressure.
2/1/96	-115	Increasing backpressure/high water temp.
2/2/96	-117	Backpressure higher than normal.
2/3/96	-123	Backpressure higher than normal.
2/10/96	-161	Limitation not to exceed 549 Tc.
2/11/96	-197	Limitation not to exceed 549 Tc.
2/12/96	-226	Limitation not to exceed 549 Tc.
2/13/96	-171	Limitation not to exceed 549 Tc.
2/14/96	-151	Limitation not to exceed 549 Tc.

AUTOMATIC REACTOR TRIPS

Jeff West - Operations



Data Source: Jeff West

ST. LUCIE PLANT
AFW GOVERNOR VALVE STEM BINDING
DISPOSITION

I DISCUSSION

- * Several plants have experienced overspeed trips due to Governor Valve Stem Binding from corrosion product build up.

- * INPO Ser 4-95, IN 94-66, and IN 94-66 S1

II EVALUATION/ROOT CAUSE

- * AFW Turbine Governor Valve Stem Binding

- * Numerous plants in industry have experienced this problem.
- * Corrosion products form, expand, and accumulate causing the stem to bind.
- * Corrosion mechanism is galvanic corrosion.
- * The galvanic potential between carbon spacers and 410 SS valve stem with moisture.

- * Inspections of both of the St. Lucie Units AFW governor valves have been performed.

- * No indication of corrosion products on either Units governor valve stem.
- * Minor pitting on the Unit #1 stem, it was replaced and sent to JPN for analysis.
- * No indication of pitting on the Unit #2 valve stem.

III CORRECTIVE ACTIONS

- * Recommended corrective actions in response to SER 4-95, IN 94-66, and IN 94 -S1 to prevent similar occurrence at St Lucie.

- * Steam Admission Valves

Unit #1 are a globe type with warm up lines around these valves to keep moisture from accumulating.

Unit #2 are a gate (wedge) type with warm up needle valves and lines around these valves to keep moisture from accumulating. REA 95-046 to relocate lines to the bottom side of the steam line during 1997 refueling outage.

- * Turbine and Governor Drain Lines

Drains from the governor valve packing area and other associated areas of the turbine have separate routes to floor drain.

ST. LUCIE PLANT
AFW GOVERNOR VALVE STEM BINDING
DISPOSITION

III CORRECTIVE ACTIONS (Continued)

* Turbine Operation

Surveillance time is 15 minutes to elevate temperatures and provide effective drying of packing area and exhaust contaminants through turbine.

* Packing Carbon Spacers

Ordered low sulphur content carbon spacers. New part number is 800714-001.

* Packing Washers

Ordered 400 series SS packing washers. The new part number is 800738-001.

* Governor Valve Stem Material

Dresser-Rand letter of 1/15/96 recommends not to change material. This is felt unacceptable with magnitude of industry problem. Many recommendations in industry (Chrome and Nickel plated, 422 SS with Aluminum, Inconel 718). Not enough operational time to determine if successful. Dresser-Rand will provide Inconel with Chrome carbide coating. JPN evaluating pitted Unit #1 stem and will recommend stem material. No change to governor valve stem material has been made until Dresser-Rand makes new stem material available or JPN provides alternative.

* Periodic Monitoring

Surveillance for the AFW turbines are performed once a month. Monitor for smooth operation during surveillance runs. Inspect governor valve stem at each refueling until resolved.

DILUTION EVENT - CORRECTIVE ACTION STATUS UPDATE

INTERIM CORRECTIVE ACTIONS HAVE BEEN COMPLETED.

LONGER TERM CORRECTIVE ACTIONS ARE BEING TRACKED VIA PMAIs.

NRC ENFORCEMENT CONFERENCE SCHEDULED FOR MID-MARCH.

St. Lucie Unit 2 Letdown Isolation

Problem: Loss of Letdown due to spurious closure of PCV-2201 on January 24 and February 2. Key issues:

- Operator work-around to maintain pressurizer level.
- Thermal cycling of charging piping nozzles.

Investigation:

- Root Cause team formed, fault tree constructed
- Event data showed signal loss to PCV for approximately five minutes, then full recovery.
- Control loop check for PCVs - SAT.
- PT/power supply tested - SAT.
- Terminal/wiring checks - SAT.

Suspected power supply failure, however, output showed no ripple.

Root cause:

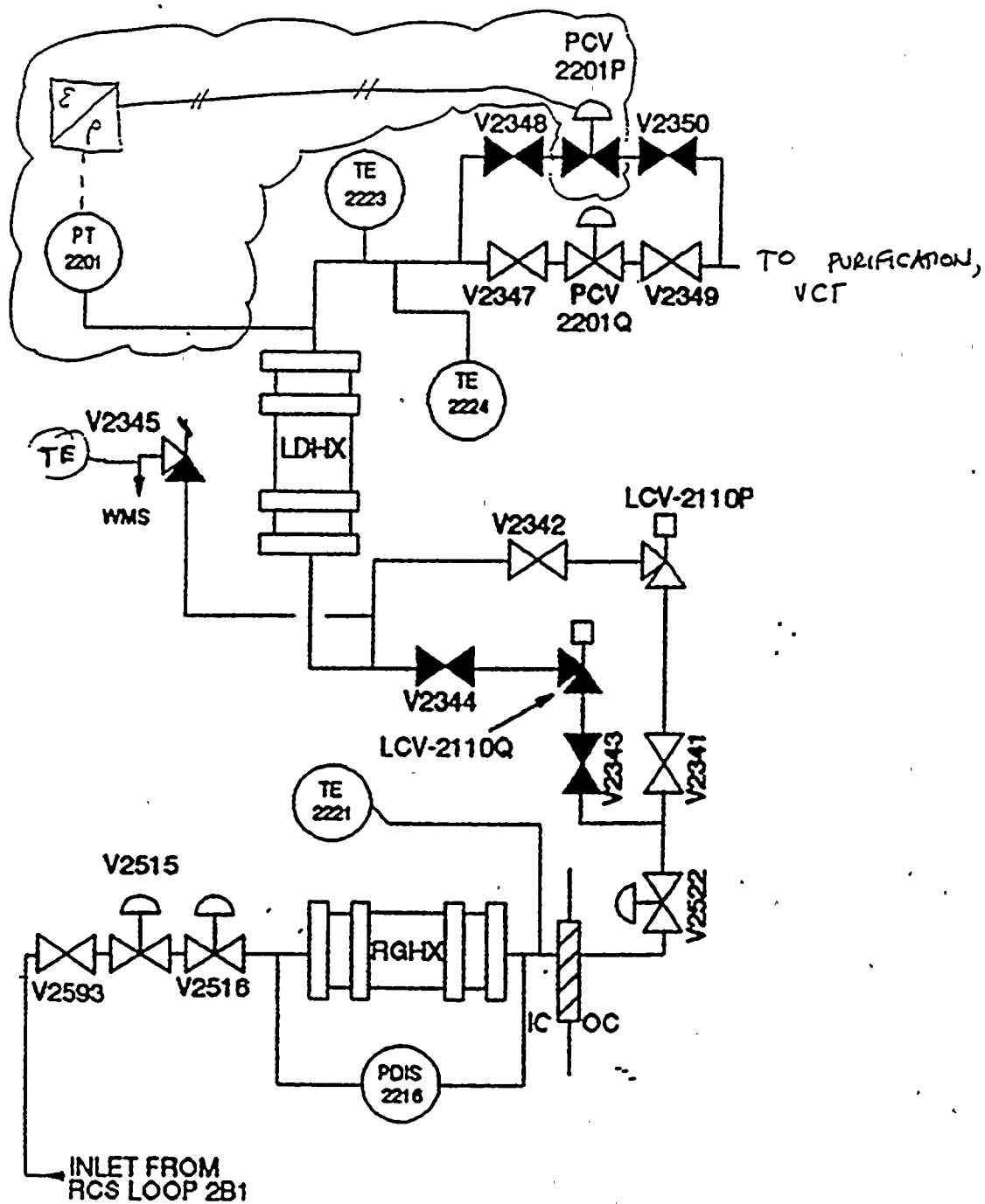
- Failed capacitor in power supply.
- Fault in paper-oil insulator due to aging.

Film capacitors subject to "self healing", cause intermittent failures.

Resolution:

- Capacitor replaced and power supply returned to service.
- Recorder Paper
- Task team to address power supply aging.

UNIT 2



CVCS - LETDOWN

**OPERATING
PLAN PROJECTS**

Unit 1 Reactor Protection System Nuclear Instrumentation Safety Channel Replacement

DESCRIPTION

The Unit 1 RPS Nuclear Instrumentation Upgrade consists of replacement of the WIDE and LINEAR POWER RANGE Excore Nuclear Instrumentation drawers within the RPS Cabinets.

PROBLEM STATEMENT

The Nuclear Instrumentation System was targeted for replacement for the following reasons:

- Increased Equipment Obsolescence
- NI System Signal Attenuation and Calibration Difficulties
- Undesirable Increase in Corrective Maintenance Work Orders

CORRECTIVE ACTIONS

- RPS Obsolescence Team Organized to Evaluate Most Cost-Effective Solution
- Engineering Design Packages Issued to Implement Replacement

ADVANTAGES OF THE MODIFICATION

- Standardization of the Nuclear Instrumentation System for Both Control Rooms
- Enhancement in NUREG 0700 Human Factors Requirements
- Consolidation of Parts Resulting in Reduced Inventory Costs

CURRENT PROJECT STATUS

- The Unit 1 project is on schedule and budget. The factory acceptance test will be conducted on February 23, 1996. Actual delivery of the drawers to the site is scheduled for March 1, 1996.
- The Unit 2 NI system was installed during the recent Cycle 9 refueling outage without incident and has been operational for 42 days.



OUTAGE MANAGEMENT



IMPROVEMENTS/ACTIONS

OUTAGE MANAGEMENT

Major Improvement Areas

Complete Unit 2 Refueling Outage Self-Assessment/Critique and identify additional improvement actions.	Complete
Establish contingency plans for significant outage activities:	4/23/96
<ul style="list-style-type: none">• Core Barrel Examination• Westinghouse SG Tube Plugs• Pressurizer Code Safety Valves• Reactor Vessel O-Ring Replacements	
Issue Operations and Maintenance procedure upgrades.	3/29/96
Improve Outage Management:	
<ul style="list-style-type: none">• Complete the addition of Schedulers for future outage planning• Re-Establish use of Critical Maintenance Management Process (on-line maintenance)• Institute outage work scope controls for Unit 1 1996 outage• Assess other plants' O processes• Upgrade site-wide scheduling system	Complete 2/26/96 2/28/96 4/20/96 8/30/96

ST. LUCIE 1996 SPRING REFUELING
PRE-OUTAGE MILESTONES

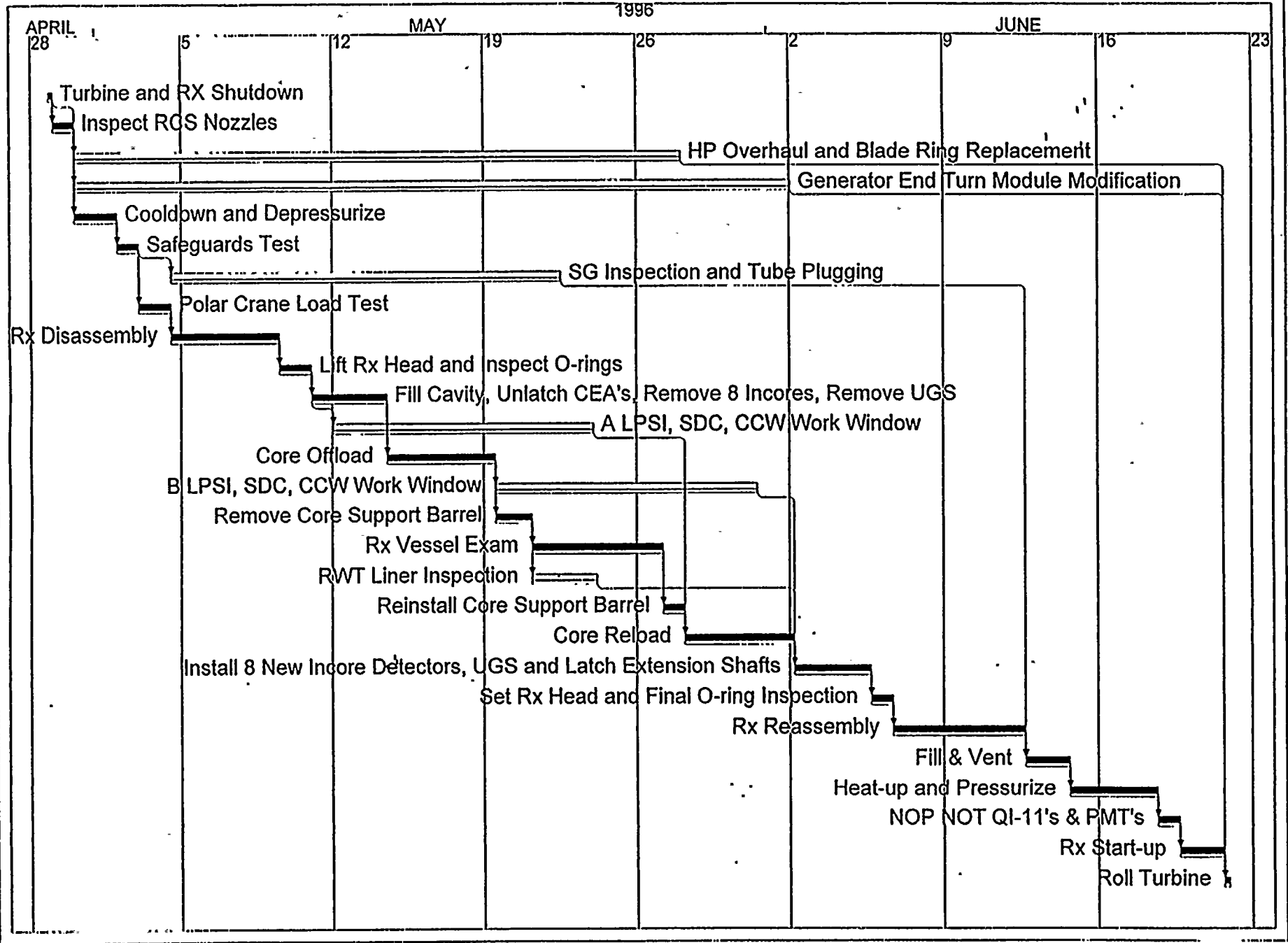
Complete	Basic Work Scope Identified
Complete	Plant Reorganization Initiated
Complete	Unit 2 Outage Critique Complete
2/16/96	Project Leads Assignments Fixed
2/26/96	Manager/Department Head Approval of Outage Work
2/28/96	Non-Emergent Work Engineering Packages Delivered
	Surveillance, Inspections & Testing Scope Identified
	Resource & Crew Sizes Finalized
	Parts Identified (Original Scope PWO's)
	Work Scope Frozen/Emergent Work Controls Implemented
03/29/96	Original Scope PWO Planning Complete
	Materials Delivered On Site - Original Scope
	Clearance Requests Submitted to OPS- Originals Scope
	Outage Procedure Revisions Reviewed by FRG
	Original Scope Activities Submitted/Schedule Freeze
4/29/96	Unit 1 Outage Begins

15FEB96

Draft Outline PSL Unit 1 Refueling Outage 1996

54 Days

1



14

ST. LUCIE NUCLEAR ENGINEERING

UNIT 1 1996 OUTAGE SCHEDULE

BASELINE SCHEDULE JAN. 2, 1996

ENGINEERING DELIVERABLES NOT SCHEDULED: UPDATE AS OF FEB 13, 1996

LEGEND:

xxx-xxx-xxxx-xx xxxxxxxxxxxxxxxx xx-xx-xx xx-xx-xx	▶ REA Number ▶ Description ▶ Date Due ▶ Resp. Disc.
Future Item ▲	▶ Engr'd Mails. Ordered
△	▶ Engr'd Mails. Required
□	▶ Original Plant List
▨	▶ Emergent Packages
▩	▶ By Outage Start/During Outage
◆	▶ PC/M Not Required
C	▶ Capital
	▶ Shaded Box Represents Completed Package

STAR 94110432
FCV 07-1A & 1B
2-28-96
SITE MEC

STAR 94120538
CODE SFTY WK
2-28-96
SITE MEC/CIV

SLN 94-025-11
RPS NI REPL
2-28-96
SITE I&C

SLN 94-011-10
COND FOULING
2-28-96
PEG MEC

SLN 94-012-10
LP TURBERNG
2-28-96
SITE MEC

STAR 951515
FUEL FAILURES
2-28-96
FUELS

SLN 93-101-10
RX HD VENTS
2-28-96
SITE MEC

SPEL 95-043-10
40 PIN CONCTR
2-28-96
SITE I&C

SPEL 94-050-10
CONT SPRY RNG
2-28-96
PEG CIV

SLN 91-266-12
FW LVL GLASS
3-1-96
PEG MEC

GESL 88-010-10
SWYRD BKR
3-1-96
PEG ELE

STAR 951005
S8X1165
3-1-96
SITE MEC

STAR 950721
CVG/HE ALRM
3-1-96
SITE I&C

STAR 950884
#2 GOV VLV
3-1-96
SITE MEC

SE 02-1
FAILED ST TIME
3-22-96
SITE MEC

STAR 950590/453
CCW TUNNEL
3-15-96
SITE CIV

STAR 951392
RXHD T MANUAL
3-12-96
SITE CIV

SLN 94-045-10
BEACON CORE
3-8-96
SITE I&C

STAR 952197
S/D RELIEF STGS
3-8-96
PEG MEC

SLN 88-058-1A
S/G PLUGGING
3-1-96
PEG MEC

STAR 951197
1A1 RCP CCW
3-1-96
SITE MEC

STAR 950925
TURN GEAR
3-28-96
PEG I&C

STAR 950970
POLAR CRANE
3-28-96
SITE CIV

STAR 952202
ED/G RELAYS
3-28-96
PEG ELE

SLN 95-008-10
STM BY PASS
3-28-96
SITE MEC

SPEL 95-014-10
CME PG-57
3-28-96
PEG ELE

SLN 94-012-10
AOV DESIGN
3-28-96
PEG MEC

SPEL 95-048-10
MAIN XFMR CAB
3-28-96
SITE ELE

STAR 94110376
HCV 06-2A&B
3-28-96
SITE MEC

SLN 95-003-10
DEH FILTER
3-28-96
SITE MEC

SLN 95-048-11
CONT PRG VLV
3-28-96
SITE MEC

SLN 94-048-10
CONT PRG VLV
3-28-96
SITE MEC

STAR 94100260
RCS LOW NOISE
3-28-96
SITE I&C

SLN 94-029-10
GRAF GASKETS
3-28-96
SITE MEC

STAR 951783
HPS/LPSI IND
3-28-96
SITE I&C

SPEL 94-042-10
AIR LOCK JLL
3-28-96
JUNO LIC

STAR 950321
C AUX FEED PP
3-28-96
SITE MEC

SPEL 95-042-10
RX ALRM 74-1
3-28-96
SITE ELE

STAR 950725
INSP S/G PLUGS
3-28-96
CSI

STAR 952162
TUBE PLUG 89-0
3-28-96
CSI

STAR 951815
RX VES EXAM
3-28-96
CSI

SLN 93-088-10
CEA MG SET
3-28-96
SITE ELE

STAR 950961
MFRV
3-28-96
SITE I&C

STAR 950565
1B2 ANN A-13
5-30-96
SITE ELE

STAR 950428
MV 09-13 ST NUT
5-30-96
PEG MEC

STAR 950882
EXCORE POS
5-30-96
SITE MEC

U1 RELOAD
4-8-96
PEG FUELS

FEB

MAR

APR

WEEK BEGINNING

OPERATIONS



IMPROVEMENTS/ACTIONS

OPERATIONS

Major Improvement Areas

Reduce the Number of Operator Work Arouns:

- Reduce the number of OWAs that existed on August 1, 1995, to less than 42 by December 31, 1995

Status: Complete. Number was reduced to 40.

- Establish and implement criteria to distinguish OWAs from Operator inconveniences.

Status: Complete. All existing OWAs were reviewed against the definition of an OWA and 45 were identified as true OWAs. Operator inconveniences are also tracked and worked on a priority basis.

- Reduce the number of Operator Work Arouns to less than 15 by December 31, 1996.

Status: OWA work down curve has been established for 1996.

Improve Operator Log Keeping:

- Improve the content and consistency in the Operator Chronological Log.

Status:

- RCO Chronological Log was computerized with access to this log by site management available by remote access.
- Expectations in content and consistency of log was communicated and reinforced by Operations Manager.
- Site Management reviews log on a routine basis.

IMPROVEMENTS/ACTIONS

OPERATIONS

(continued)

Major Improvement Areas

Improve Operator Log Keeping: (continued)

- Improve administration of routine operator log keeping.

Status:

- Review of routine administrative operator logs is now conducted on a periodic basis by shift supervision and the Shift Technical Advisor.
- Heighten expectations have been given to shift supervision on attention to detail in operator logs.
- Operations management conducts reviews of operator logs and communicates expectations based on deficiencies.
- All operator administrative logs are under review to ensure they are necessary and to strengthen logs where required. Due: February 28, 1996.

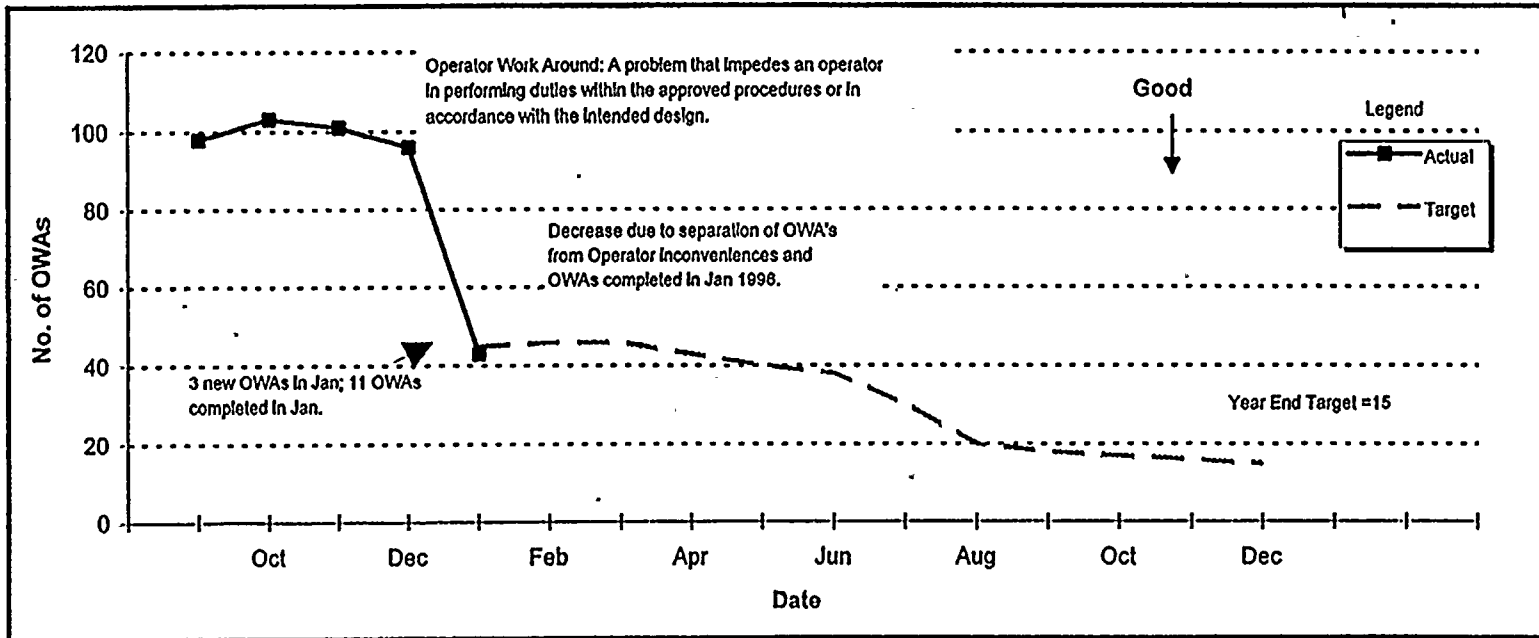
Improve Operating Procedures to ensure technical accuracy and ensure they can support operation under verbatim procedural compliance:

Status:

- Procedures for upgrade process have been identified based on their criticality to plant operations and frequency of use.
- Schedule has been developed in two phases for completion of project.
- Phase I of project (16 procedures) due: May 1, 1996
- Phase II of project due: March 17, 1997

OPERATOR WORK AROUNDS

Jeff West - Operations



Data Source: Jeff West

ST. LUCIE NUCLEAR PLANT OPERATOR WORKAROUNDS - EVALUATIONS

19

STAR 2-950210 IV3:1D No alarm 1/13/98 JPN SCE		STAR 2-951799 D/G pyrometers 3/1/98 JPN		STAR 2-951340 Rad Mon PC-11 4/30/98 I&C		STAR 1-94120538 Pzr Code Salties 12/15/95 NMM		STAR 1-950925 Turb Turning Gr 5/31/98 I&C		STAR 1-94090149 Gland Stm Rg Vlv 6/30/98 SCE		STAR 1-950978 Cont Spray Isol 8/1/98 SCE		STAR 1-950123 IACond Pp Oil Lk 8/1/98 SCE		STAR 1-950927 L/D Press Contol 7/31/98 I&C	
STAR 2-950712 2B D/G Fuel Tk 1/1/98 CHEM		STAR 2-951282 2A/2B DG Tach 2/28/98 JPN		STAR 1-951884 Pp starts-vkg spk 3/1/98 JPN		STAR 1-951107 AFAS Cab Byps 4/30/95 OPS		STAR0-94110487 RHGVS Vlvs 5/24/98 CS		STAR1-94120513 HP Stub Shaft Bw 6/1/98 MM		STAR 1-951080 Grnd Det Schme 7/30/98 I&C		STAR 1-951784 CEA ADS Indicat 8/31/98 I&C		STAR 2-960181 Cntrl rm pr cntrl 9/7/98 IC	
JANUARY	FEBRUARY	MARCH	APRIL	MAY	JUNE	JULY	AUGUST	SEPTEMBER	OCTOBER	NOVEMBER	DECEMBER						

ST. LUCIE NUCLEAR PLANT OPERATOR WORKAROUNDS - EVALUATIONS

WORKAROUNDS NOT SCHEDULED:

STAR 1-952142 Eberline	STAR 2-950325 ECCS Pp Akr	STAR 0-950579 Pzr Prop Htrs
SCE <input type="checkbox"/> E <input type="checkbox"/>	SCE <input type="checkbox"/>	OST <input type="checkbox"/>
STAR 1-951889 CST loop seal	STAR 2-931945 MV21-1A1 pos ind	STAR 0-960091 LCV pos. indicator
SCE <input type="checkbox"/> E <input type="checkbox"/>	EM <input type="checkbox"/> E <input type="checkbox"/>	PM <input type="checkbox"/> E <input type="checkbox"/>
STAR 1-951988 Fire Pp - Annun	STAR 2-950252B Rotate LCV11-24	
SCE <input type="checkbox"/> E <input type="checkbox"/>	JPN <input type="checkbox"/> E <input type="checkbox"/>	
STAR 1-952143 Rad Mntr pwr fall	STAR 2-950685 ASI Swings 9/11/95	
SCE <input type="checkbox"/> E <input type="checkbox"/>	OPS <input type="checkbox"/>	
STAR 1-952221 Gland stm press swings	STAR 2-960081 Gland seal reg.	
SCE <input type="checkbox"/> E <input type="checkbox"/>	JPN <input type="checkbox"/> E <input type="checkbox"/>	
	STAR 2-960077 PCV-08-879	
	SCE <input type="checkbox"/> E <input type="checkbox"/>	
	STAR 2-960179 Etr Stm trap byps vlv	
	SCE <input type="checkbox"/> E <input type="checkbox"/>	
	STAR 2-960238 TIC-2223 L/D lcv	
	SCE <input type="checkbox"/> E <input type="checkbox"/>	

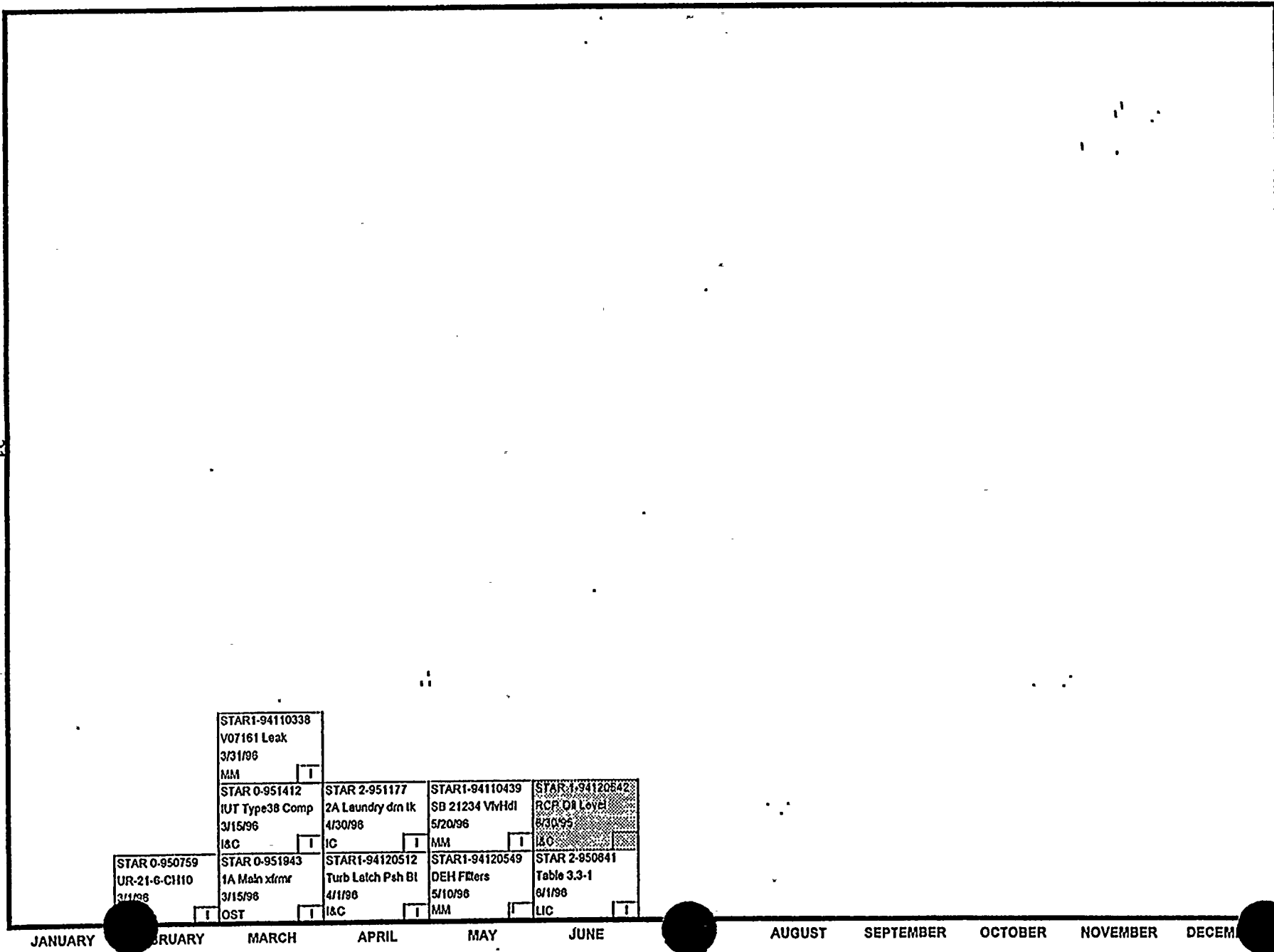
WORKAROUNDS NEEDING MRB APPROVAL:

STAR 1-950252A Rotate LCV11-29	Star 1-951604 SB13308 Vib
JPN <input type="checkbox"/> E <input type="checkbox"/>	JPN <input type="checkbox"/> E <input type="checkbox"/>
STAR 1-950789 LD ReRel Open	
JPN <input type="checkbox"/> E <input type="checkbox"/>	

ST. LUCIE NUCLEAR PLANT

OPERATOR WORKAROUNDS - IMPLEMENTATION COMPLETE

21



JANUARY

FEBRUARY

MARCH

APRIL

MAY

JUNE

AUGUST

SEPTEMBER

OCTOBER

NOVEMBER

DECEMBER

ST. LUCIE NUCLEAR PLANT
OPERATOR WORKAROUNDS - IMPLEMENTATION COMPLETE

WORKAROUNDS NOT SCHEDULED:

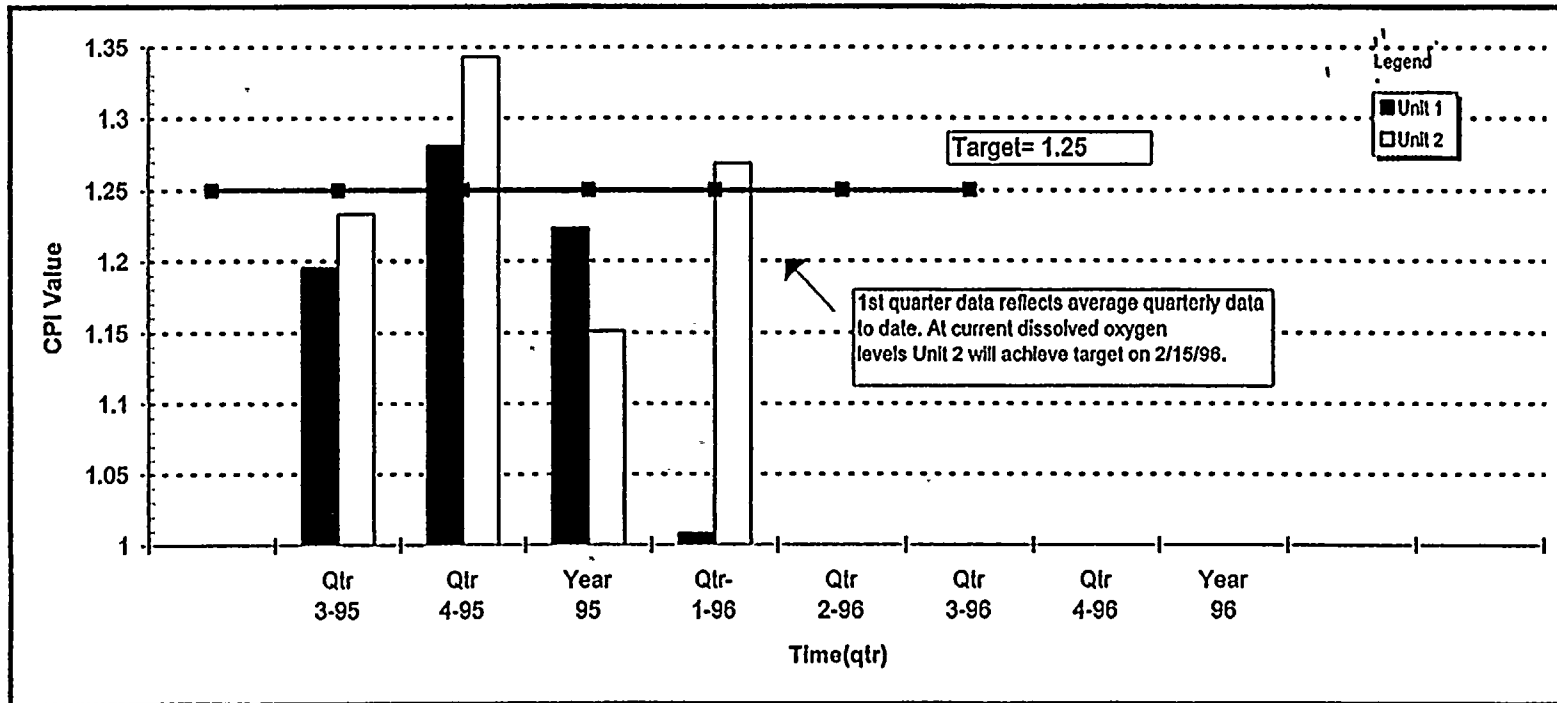
STAR 0-951005 SB21165/21211	STAR 1-950301 DDPS Alarm	STAR 2-951779 V4111 fuel trans lb
MM <input type="checkbox"/>	I&C OPS <input type="checkbox"/>	MM <input type="checkbox"/>
STAR 1-951265 PCV 12-50	STAR 1-950690 TCV 13-15	
MM <input type="checkbox"/>	I&C <input type="checkbox"/>	

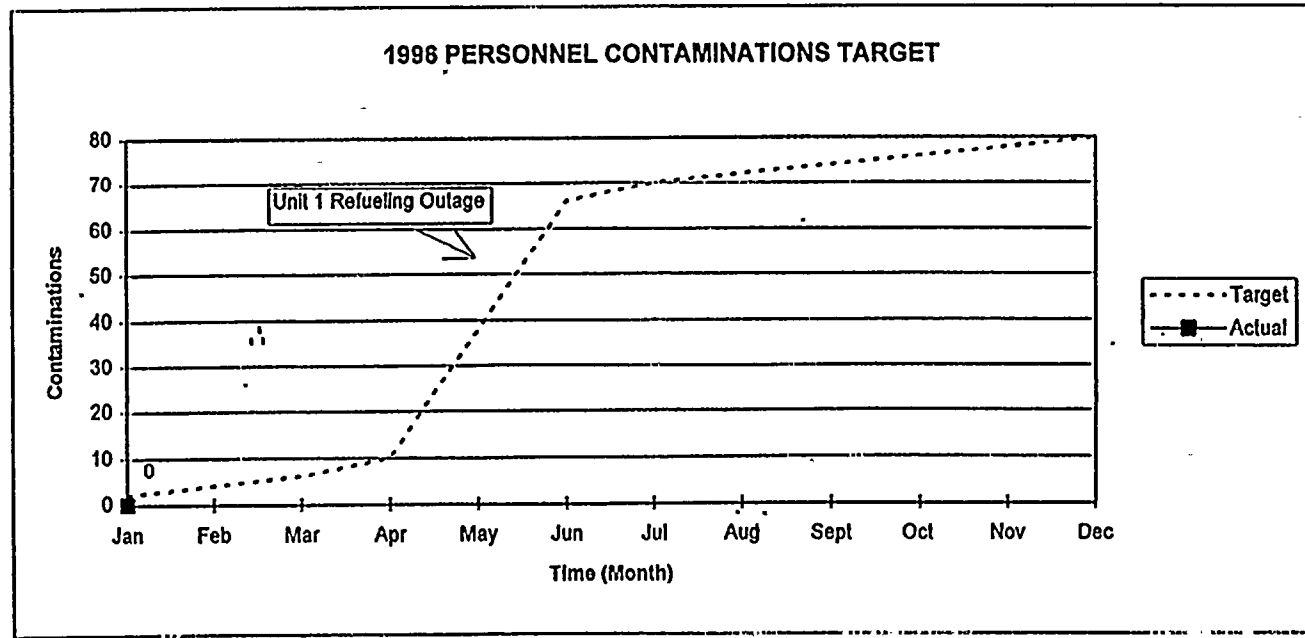
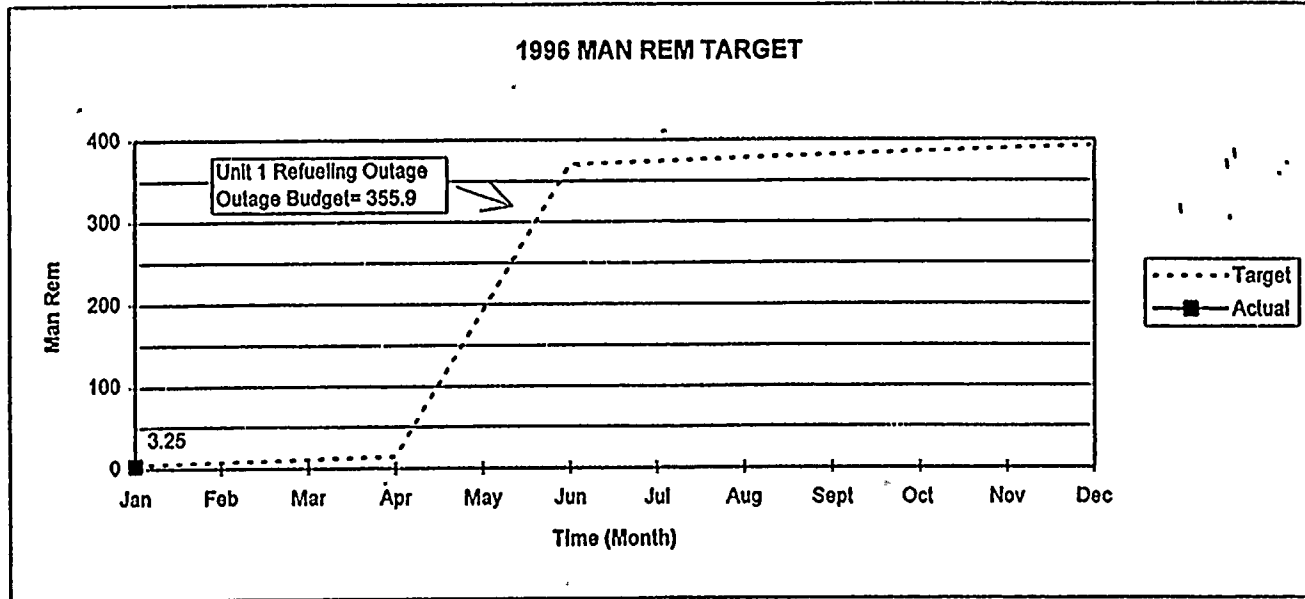
St. Lucie Plant
Procedure Upgrade Project

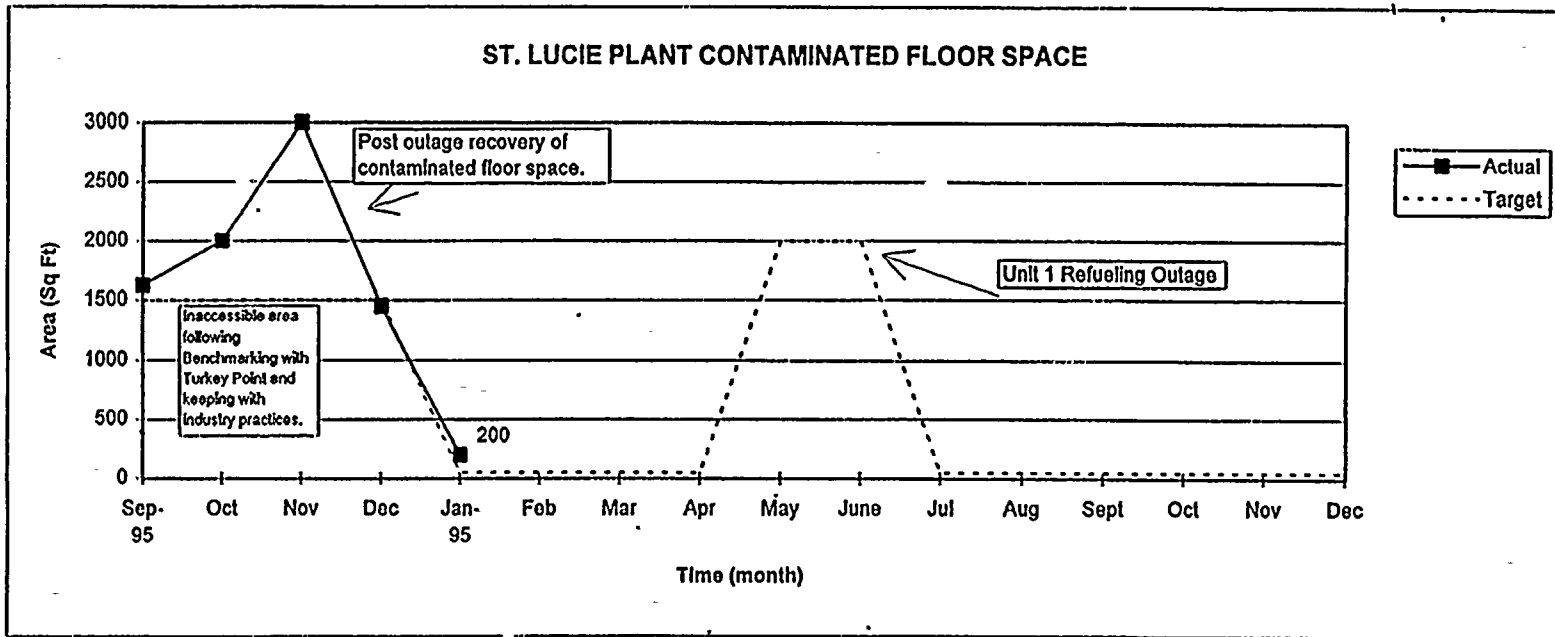
Procedure Title	Unit	Procedure Status				
		Draft	Operations Subcommittee	Cross Functional Review	FRG	Distribution
Reactor Startup	1	Complete	In Progress			
Reactor Startup	2	Complete	In Progress			
Reactor Shutdown	1	Complete	Complete	In Progress		
Reactor Shutdown	2	Complete	Complete	In Progress		
Reactor Plant Heatup	1	Complete	In Progress			
Reactor Plant Heatup	2	Complete	In Progress			
Reactor Plant Cooldown	1	Complete	In Progress			
Reactor Plant Cooldown	2	Complete	In Progress			
Turbine Startup	1	Complete	In Progress			
Turbine Startup	2	Complete	In Progress			
Turbine Shutdown	1	Complete	In Progress			
Turbine Shutdown	2	Complete	In Progress			
Pre-Start Checkoff	1	Complete	In Progress			
Pre-Start Checkoff	2	Complete	In Progress			
Reactor Operating Guidelines	1	Complete	Complete	In Progress		
Reactor Operating Guidelines	2	Complete	Complete	In Progress		

1. Completion Date for Phase I of project is **17 May 1996**.
2. Project highlights:
 - Procedure enhancements for Unit 2 startup
 - Additional outside resources are being sought to supplement this project
3. Competing for resources:
 - Procedure to Departmental Guideline project
 - Procedure 3 year reviews
 - Conversion of large number of temporary changes to procedures
 - Unit 1 procedure enhancements to support Unit 1 outage
 - Procedure support emerging issues

CHEMISTRY PERFORMANCE INDEX







Inaccessible area following Benchmarking with Turkey Point and keeping with industry practices.

Post outage recovery of contaminated floor space.

Unit 1 Refueling Outage

200



MAINTENANCE



IMPROVEMENTS/ACTIONS

MAINTENANCE

Major Improvement Areas

Program/Procedures:

- Maintenance Procedure Upgrade Project
- Programs/Procedures Group
- Work Process Team

Plant Material Condition (Key Performance Indicator):

- PWO Backlog
- Control Room Green Tags (C-Tags)
- Aged PWOs (>12 months - Golden Oldies)
- Leaks (Primary/Secondary)
- Temporary Leak Repairs

Recent Accomplishments:

- Reorganization
- NRC Maintenance Audit

Future Items:

- Insulation Program (4/1/96)
- Consolidation of Tool Rooms (7/1/96)
- MT&E Consolidation (9/30/96)

On Going Issues:

- Boards/Indicators in Shops
- Trailers out of Plant (Develop Project Schedule)
- EDG 2A, 2B Coating Restoration
- Unit 2 AFW Coating Restoration

**ST. LUCIE PLANT
MAINTENANCE PROCEDURE UPGRADE PROJECT**

TASK #1: DEVELOP PROCEDURES/GUIDELINES FOR FREQUENTLY PERFORMED MAINTENANCE ACTIVITIES WHICH CURRENTLY EMPLOY THE USE OF VENDOR TECHNICAL MANUALS

Month	Activity	Department	Activity	Department	Activity	Department	Activity	Department	Activity	Department	Activity	Department					
December	U-1 AFAS GATT PM	I&C	U-1 AFAS GATT PM	I&C	U-2 AFAS GATT RM	I&C	U-1 Laidown Control Calc	I&C	U-1 Cond Air Effect	MECH	U-1 Liq Waste Disc Rad Monit Cal	MECH	U-1 Fisher Control Valves	MECH	U-1 Crosby Relief Valves	MECH	U-1 Process Flow Valves
January	Rebuilding FW Recirc Valves	I&C	Rebuilding FCV.9011 & 9021	I&C	U1 Gasoseous Rad-waste Monit Cal	I&C	U1 Liq Waste Disc Rad Monit Cal	I&C	U1 Fisher Control Valves	MECH	U1 Liq Waste Disc Rad Monit Cal	MECH	U1 Fisher Control Valves	MECH	U1 WKM Control Valves	MECH	U1 WKM Control Valves
February	U1 EDG Comp	I&C	U1 Cal of CHMT Process Monit	I&C	U1 Cal of CCW Rad Monitors	I&C	U1 Cal of CHMT Process Monit	I&C	U1 Cal of CCW Rad Monitors	I&C	U1 Cal of CHMT Process Monit	I&C	U1 Cal of CCW Rad Monitors	I&C	U1 Cal of CHMT Process Monit	I&C	U1 Cal of CCW Rad Monitors
March	Foxboro Press Controllers	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit
April	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit
May	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit
June	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit
July	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit
August	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit
September	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit
October	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit
November	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit
December	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit
January	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit
February	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit	I&C	U2 Gen. Atomic WRM Monit	I&C	U2 Gen. Atomic SSG Proc Monit

**ST. LUCIE PLANT
MAINTENANCE PROCEDURE UPGRADE PROJECT**

**TASK #2: REVISE AND ENHANCE EXISTING MAINTENANCE PROGRAM AND
EQUIPMENT PROCEDUREs KNOWN TO REQUIRE IMPROVEMENTS**

		Revise Control of Welding	Revise Sensitive System Procedures					
		ELECT Unit 1 - 020087 Temp Pwr/Jumper 1/31/98	Revise Jumper and Lifted Lead Procedure					
		ELECT Unit 2 - 020087 Temp Pwr/Jumper 1/31/98	Develop WIN Team Guideline	Revise NPWO Procedure AP-00100432				
		ELECT 0920070 480V Ld Cir Bkr 1/31/98	ELECT 0930080 6.9KV Swgr Bkr 2/29/98	ELECT 990080 Metering Equip 3/31/98				
	Revise Maint Self Assessment	ELECT 0920088 4160V Swgr Bkr 1/31/98	ELECT 0940074 Molded Case Bkr 2/29/98	ELECT/I&C Raychem Proc 3/31/98	Revise Conduct of Maintenance ADM-08.02			
November	December	January	February	March	April	May	June	

**ST. LUCIE PLANT
MAINTENANCE PROCEDURE UPGRADE PROJECT**

**TASK #3: CONVERT NON-SAFETY RELATED PROCEDURES INTO MAINTENANCE
GUIDELINES**

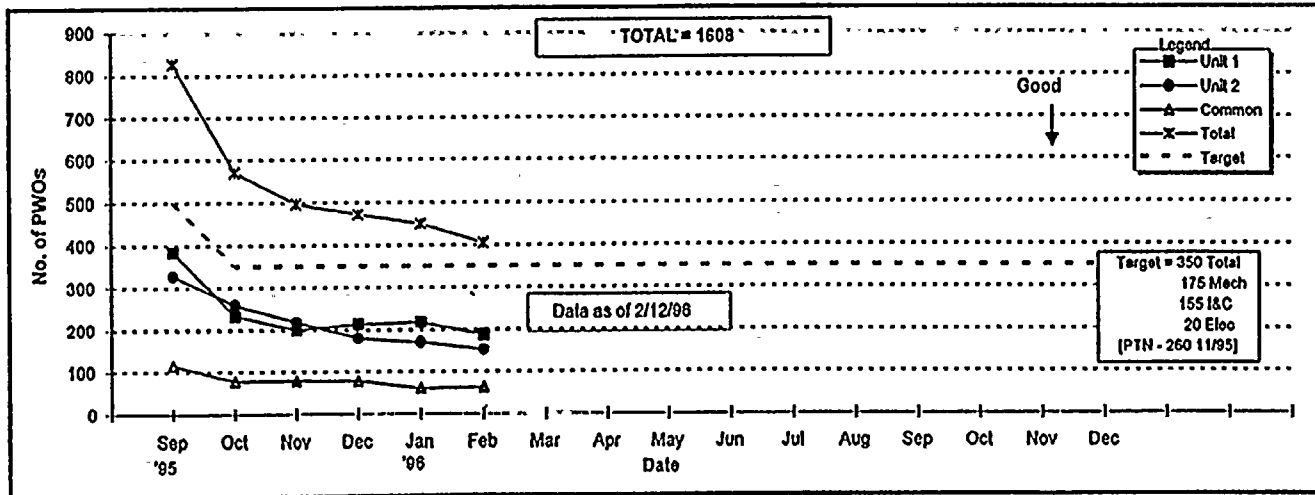
		2-EMG-75.01 PM of Cath Prot EM 2-0610089 1/31/90	EMG-50.02 BOP 125 VDC O 980089 1/31/90					
		EMG-50.03 BOP 125VDC Wk 980088 1/31/90	EMG-50.04 BOP 125VDC Per MP-0980074 1/31/90					
		Units 1 & 2 Screen Wash Pump MMP-21.02 1/31/90	MFRV Actuator-1 FCV-9011 & 9021 (& 1400195) 1/31/90	Preventive Maint Cathodic Prot EM 1-0610089 1/31/90		Units 1 & 2 LP Turbine MMP-22.02 2/29/90		
		Units 1 & 2 Service Air Comp MMP-18.02 1/31/90	MFRV Positioner FCV-9011 & 9021 (& 1400190) 1/31/90	MN Gen. Volt Reg & Excler SWGR EM 2100069 1/31/90	Units 1 & 2 MFRV Pumps MMP-09.04 2/29/90	Steam Trap Insp Program GMP-11 2/29/90	Portable Elect Cord Program 0050060 2/29/90	
TCW Sys LV Calibration 1-MMP-13.12 11/30/95	Ext. STM Sys Pressure Cal. 1-MMP-10.14 12/31/95	Reheater Control Calibration 2-MMP-09.03 1/31/90	Unit 1 Condensate Pump Insp 1-MMP-12.01 1/31/90	MN Generator & Exc Main Gnd EM 2100067 1/31/90	Unit 2 Condensate Pump Insp 2-MMP-12.01 2/29/90	Dis. Insp/Repair Turb Bypass Vlv 2-MMP-08.02 2/29/90	2D Battery Perf. Test 2-0980078 2/29/90	
TCW Sys Flow Calibration 1-MMP-13.11 11/30/95	Aux STM Pres Calibration 1-MMP-15.14 12/31/95	Main Condenser Tubo Sheet M-0921 1/31/90	HDP 1A & 1B Repair 1-MMP-11.01 1/31/90	Generator Cond. Monitor EM 2100068 1/31/90	Circ Water Pump Repair 20-MMP-21.01 2/29/90	Jerguson Flat G&S Glasses 1-MMP-81.02 2/29/90	BOP 125 VDC Sys Batt Chg 18 m 2-0980073 2/29/90	
TCW Sys Temp Calibration 1-MMP-13.13 11/30/95	Aux STM Temp Calibration 1-MMP-1.13 12/31/95	HP Turbine Inspection M-0110 1/31/90	Dis. Insp/Repair Turb Bypass Vlv 1-MMP-08.02 1/31/90	Generator Shaft Volt & GND Verif. EM 2100065 1/31/90	Inst Air Comp 2A & 2B 2-MMP-18.01 2/29/90	Circ Water Pump Repair 1-MMP-21.01 2/29/90	BOP Battery 18 Mo. Maint 2-0980070 2/29/90	
SBCS Loop Calibration 1-MMP-08.02 11/30/95	Aux STM Level Calibration 1-MMP-16.12 12/31/95	Brushless Exciter M-0063 1/31/90	Jerdon Magneto Gases MMP-18.01 1/31/90	Generator GND and Testing EM 2100064 1/31/90	TCW PP 2A & 2B Inspection 2-MMP-13.01 2/29/90	Inst Air Comp 1A & 1B 1-MMP-18.01 2/29/90	BOP 125 VDC Sys Batt Chg 18 mo 1-0980073 2/29/90	
SBCS Chkout 1-1400028 11/30/95	Aux STM Flow Calibration 1-MMP-16.11 12/31/95	MFRV Repair FCV-9011, 9021 M-0047 1/31/90	Main Generator Dis. Insp/Repair MMP-83.01 1/31/90	Periodic Maint of Isophase EM 0980178 1/31/90	HDP 2A & 2B Repair 2-MMP-11.01 2/29/90	TCW PP 1A & 1B Inspection 1-MMP-13.01 2/29/90	BOP Battery 18 Mo Maint 1-0980070 2/29/90	
November	December	January	January	January	February	February	February	

POWER BLOCK PWO BACKLOG

Joe Marchese - Maintenance

PWO Backlog:

- PWO backlog are non-outage corrective work orders (Work Type 5 status 22-48) on components/equipment in the power block. Total includes all Work Type 1 & Work Type 5. (all hold codes)



Data Source: Passport

SUMMARY STATUS

Discipline	Unit 1	Unit 2	Common	Total
Mechanloat	97	65	43	205
Electrical	9	5	2	16
I&C	82	83	18	183
Projects	0	0	0	0
Total	188	153	63	404

Oldest PWO	2/11/84	3/14/84	8/20/84
PWO #	0786	0562	3987
Discipline	MM *	MM	MM *

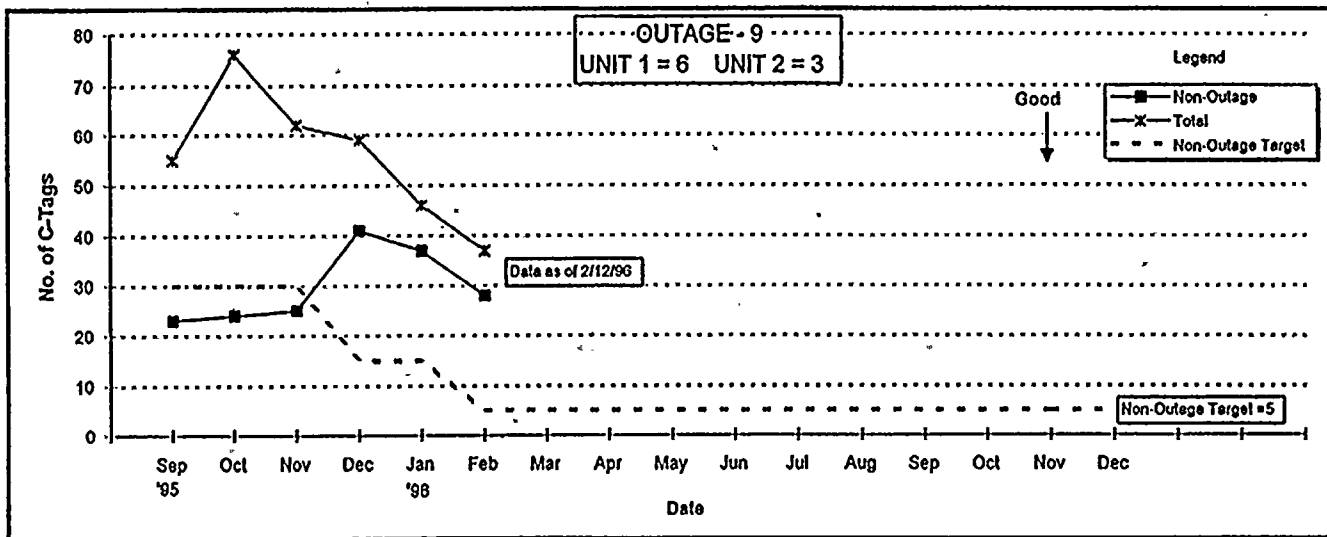
* COMPLETED AFTER DATA CUTOFF DATE

CONTROL ROOM DEFICIENCIES (C-TAGS)

Randy Olson - I&C

C-Tags:

- The number of Control Room/Board Green Tags. It provides an indication of the attention given to maintaining control room instruments in an operable condition.



Data: M. Willis

SUMMARY STATUS

	Non-Outage	Outage	Total
Ready to Work or Working	11	7	18
Engineering/RTA	6	1	7
AWP	5	0	5
Other Holds	6	1	7
Total	28	9	37

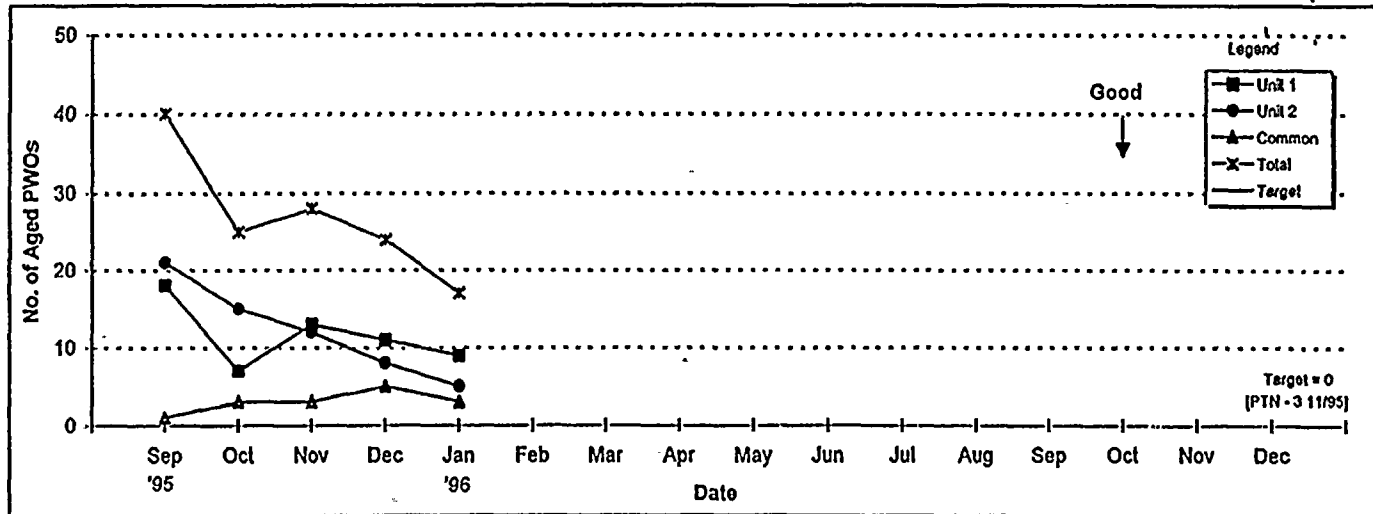
Oldest	10/2/94	5/4/94
Discipline	EM (OUTAGE)	I&C (OUTAGE)

AGED PWOs > 12 MONTHS (GOLDEN OLDIES)

Joe Marchese - Maintenance

Aged PWOs:

- Non-outage corrective maintenance work type 5 PWOs older than 12 months.



Data Source: Passport

SUMMARY STATUS

	Unit 1	Unit 2	Common	Total
Mechanical	6	3	1	10
Electrical	0	0	0	0
I&C	2	2	2	6
Construction	1	0	0	1
Total	9	5	3	17

Oldest	2/11/94	11/1/93	8/20/94
PWO #	0786	0562	3987
Discipline	MM *	MM *	MM

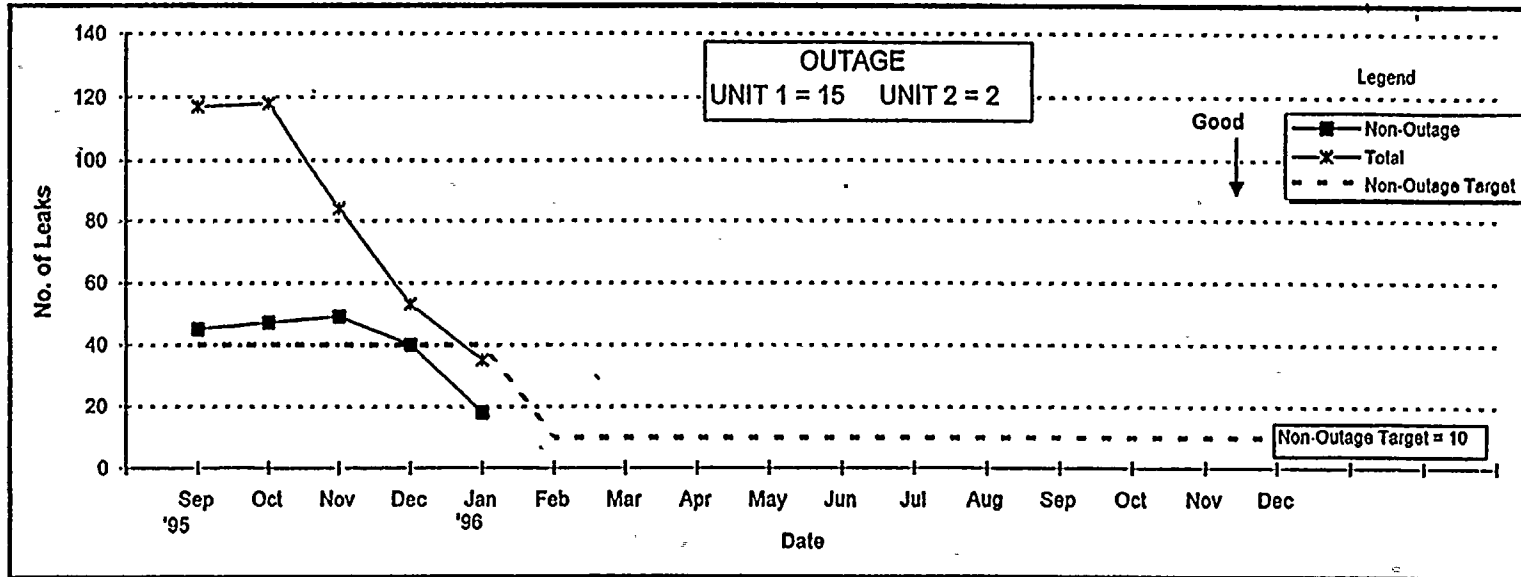
* COMPLETED AFTER DATA CUTOFF DATE

LEAKS

N. Motley

Leaks:

- Active leaks (primary and secondary)



Data Source: Passport

SUMMARY STATUS

	Unit 1	Unit 2	Total
Primary - Outage	15	2	17
Primary - Non-Outage	4	8	12
Secondary	4	2	6
Total	23	12	35

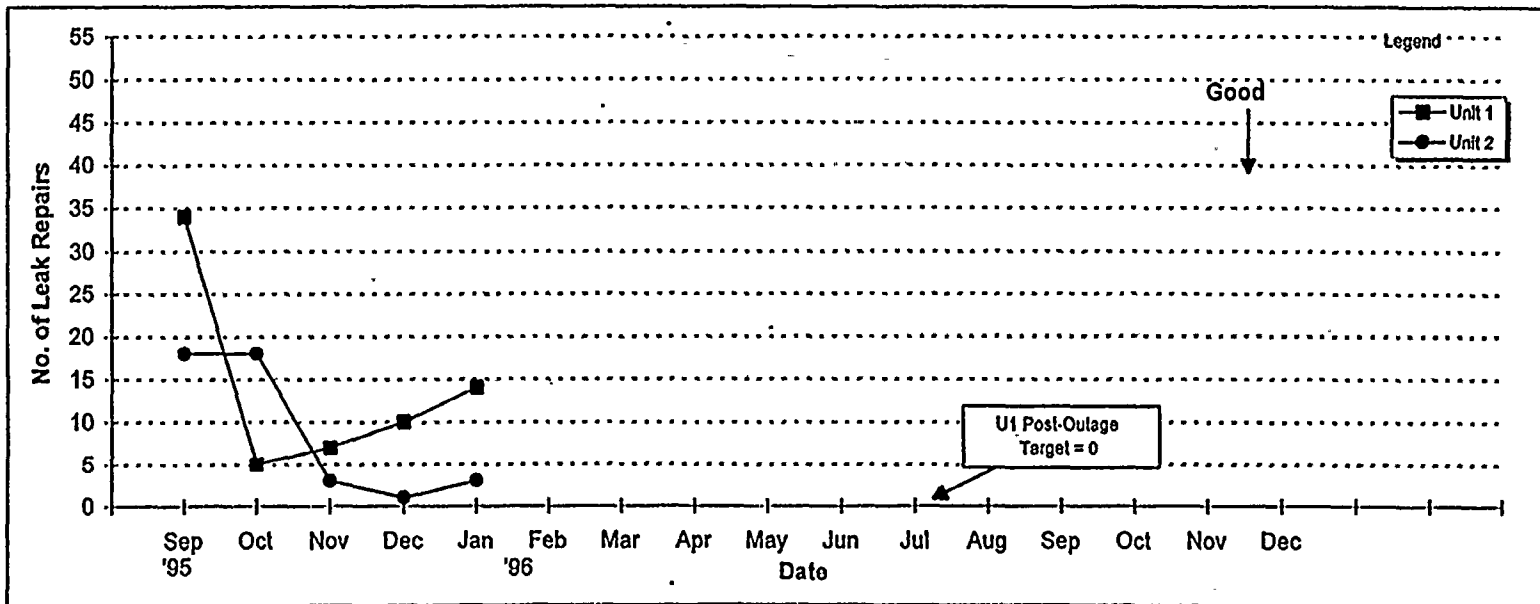
Oldest (Non-Outage)	12/10/94	6/14/95
Status	AWP	AWP

LEAK REPAIRS (FITTINGS)

Greg Pustover - Programs

Leak Repairs:

- Leaks that have been temporarily repaired.



Data Source: Joel Kagan (SCE)

SUMMARY STATUS

	Unit 1	Unit 2	Total
Total	14	3	17

**SYSTEMS & COMPONENTS
ENGINEERING**



IMPROVEMENTS/ACTIONS

SYSTEMS & COMPONENTS ENGINEERING

Major Improvement Areas

Improve Equipment Reliability:

- Emergency Diesel Generators (Unit 1/Unit 2) 2/96
- Reactor Coolant Gas Vent Valves (Unit 1) 6/96
- Pressurizer Code Safeties (Unit 1) 6/96

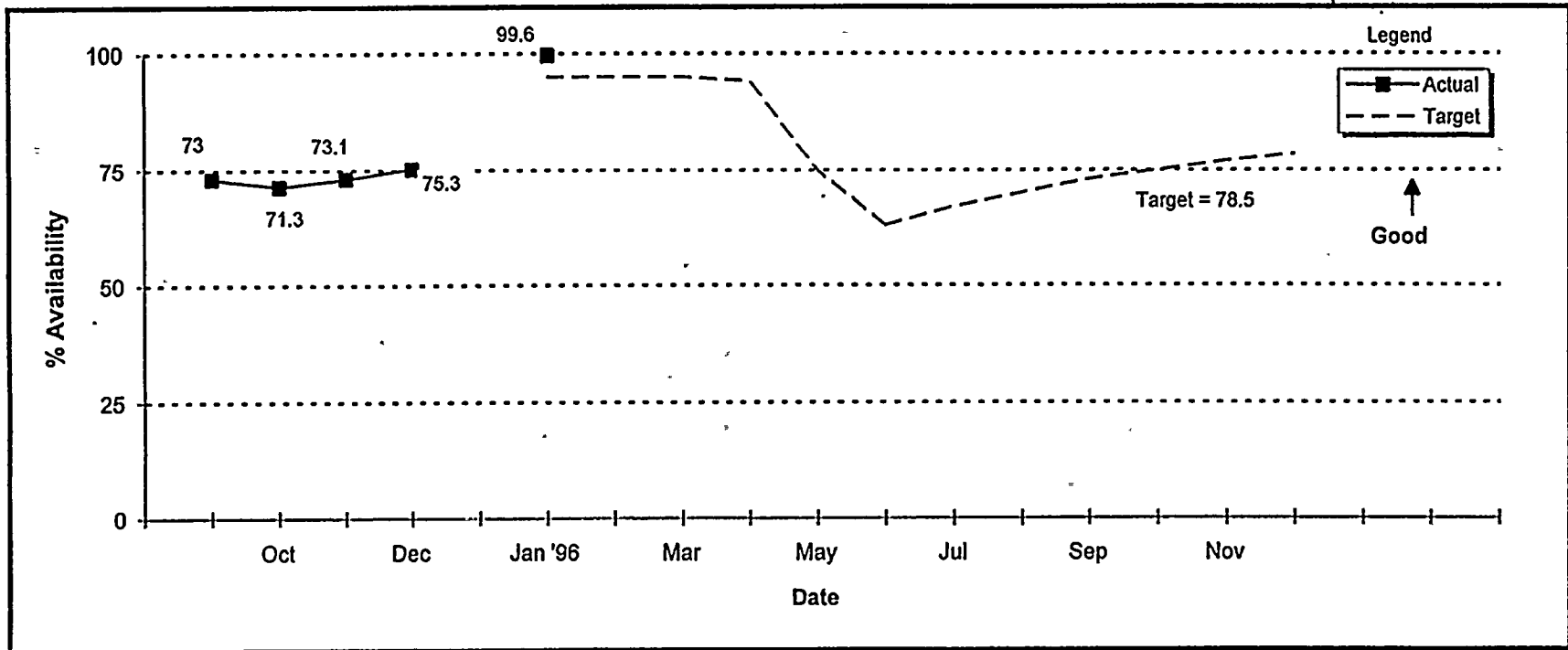
Strengthen System Performance Monitoring:

- Complete Maintenance Rule Implementation 4/96
- Complete PM Basis Program 12/96



EQUIVALENT AVAILABILITY FACTOR - UNIT 1

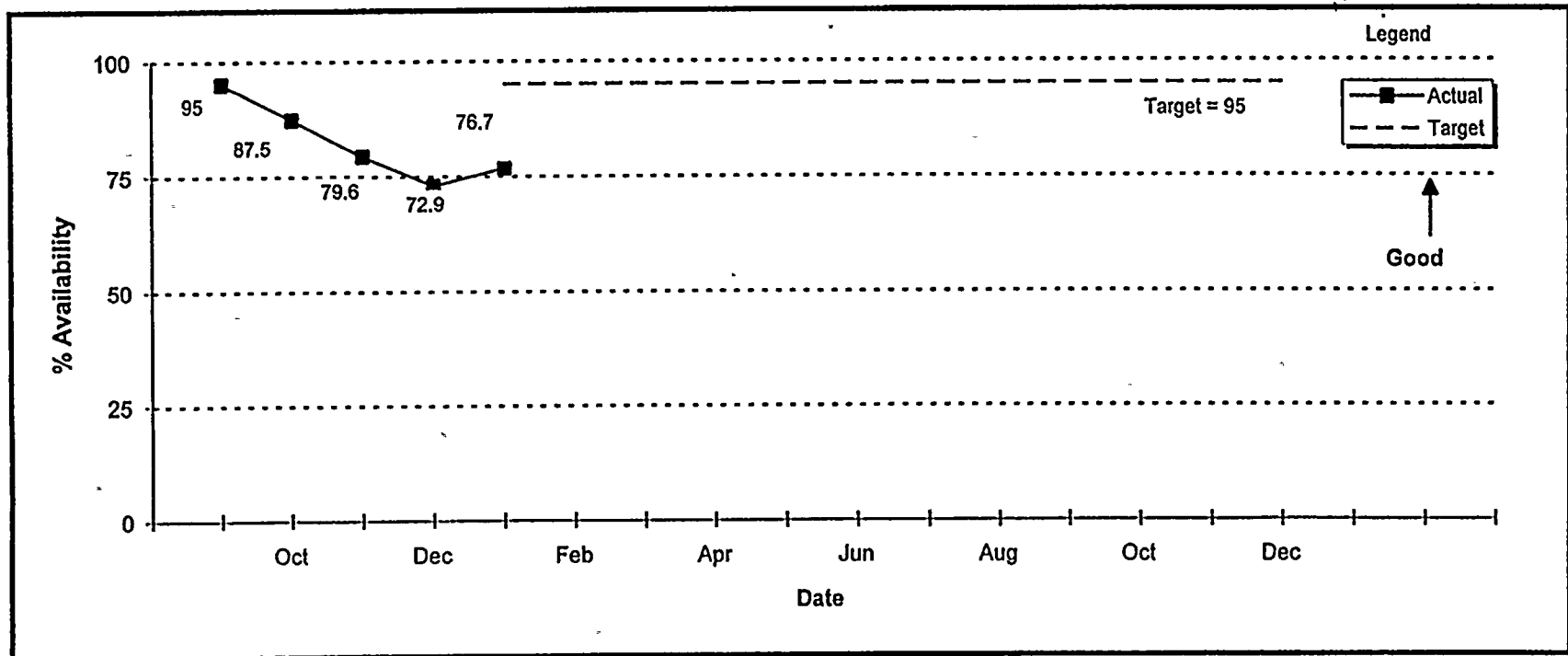
Lee Rogers - Systems & Components Engineering



Data Source: Lee Rogers

EQUIVALENT AVAILABILITY FACTOR - UNIT 2

Lee Rogers - Systems & Components Engineering



Data Source: Judy Rogers

Plant St. Lucie Emergency Diesel Generator Reliability Improvement Plan Matrix

Problem	Root Cause	Corrective Actions	Status and Long Term Notes
Units 1 & 2 Governor Actuator failures	Vendor teardown: report identified fatigue due to length service; recommended 6 year periodic factory overhaul. STARS 950059 & 950529	Plant inflated 6 year overhaul Preventative Maint item.	All unit 2 actuators overhauled Nov-95. Unit 1 actuators scheduled for May 96 outage.
Unit 1 EDG Governor unstable during surveillances (tied to grid)	Older design electronics very susceptible to "NOISE" "NOISY" inputs identified.	1. Replaced all suspect electronic components and optimized alignment with vendor rep support. NPWOs: 1A: 95026166 1B: 95026332	Engineering evaluating upgrade of governor system to more current design (Woodward 2301A) with proven noise rejection features.
Unit 1 & 2 EDG Governor Actuator Wiring grounds	Vendor design: governor wiring harness wires in contact with rough surface; vibration induced abrasion. STARS 951062 and 951055	Completed repairs and added Raychem sleeve covering for abrasion protection PWOs 95024478 95026057	Engineering developing improved design to eliminate abrasion concern: Unit 1: May 96 Unit 2: April 97
Unit 2 Control Relay sockets failures	Two failure modes identified: Pins relaxation and solder joint failure due to cracks. Removal / Insertion (PM) and vibration. STAR 951721 Report JPN/CSI MET 95-223	All four EDGs inspected and suspect sockets replaced. NPWOs: 1A: 95031756 1B: 95031676 2A: 95031265 2B: 95032588	Engineering is evaluating design change options; ie, new relay base or change relay to one that does not require base/ socket.
Unit 1 fuel oil piping failure	Fatigue due to vibration; this engine had underwent high vibration during 8-31-95 valve fail event. STAR 951322	Pipe replaced; others inspected NPWO: 6035	System engineer monitors engine piping closely; visual exam of fuel line components at least monthly.
Unit 1 Radiator performance	Identified during trend analysis of engine jacket water temp. STAR 951575 provided safety assessment to operate until May 96 outage replacement.	Radiator replacement is scheduled as an outage job	System engineer monitors and trends performance.
Unit 1 cooling water relief valves weeping and not sealing.	Vendor design; valves placed in flow stream.	PC/M implemented on 1B1 (leaking)	Other three engines valves to be completed May 96 Unit 1 outage

Implementation schedule for the Maintenance Rule

2/14/96

MJ Snyder

By January 10

	<u>Status or Completion Date</u>
<u>QA Finding</u>	
Snyder - Issue STAR for goals on EDG governor performance monitoring.	1/4/96
Kulavich - Develop goals & monitor EDG governor performance.	1/25/96

By January 31

Procedure Upgrades

*Walcheski -Flowchart Maintenance Rule process.	1/26/96
*Walcheski -Implement Dave Lowens recommendations into ADM17.08.	1/31/96
*Walcheski -Implement Philip Johnson's recommendations into ADM17.08	1/31/96

Risk Assessment

Vincent - Identify criteria for risk & non-risk division for Instrument Air & Main Feedwater.

Training

*Snyder - Provide formalized root cause training to all 'owners' of systems.	1/26/96
Swiatek - Provide training (handout of expectations?) on Maintenance Rule for Expert Panel.	

Expert Panel Review

Snyder - Redefine composition of the Expert Panel.	1/31/96
Snyder - Evaluate inclusion of Switchyard, FHB ventilation, grounding, cathodic protection.	
Snyder - Re-evaluate current scope of risk systems w/Expert Panel.	

By February 15

Ownership

Snyder - Identify each SSC explicitly in scope of Maint Rule.	90% complete
*Snyder - Recommend to appropriate management the owners of each SSC.	2/1/96
*Management - Identify owner of each SSC to the maintenance rule coordinator.	
Snyder - Negotiate standard KRA with management & individuals.	
*Cimino - Format standard shell 'Maintenance Rule Notebooks'.	= 2/14/96

Procedure Upgrades

Walcheski -Revise NPWO & STAR procedure to interface w/Maint Rule.	
Walcheski -Revise Design Control procedure to interface w/Maint Rule.	
Walcheski -Revise FOP procedure & EOP writers guide procedure to interface w/Maint Rule.	

Training & Awareness

*Walcheski - Develop Flowchart Maintenance Rule process 'Poster'.	2/14/96
*Walcheski - Place Posters in strategic locations.	
*Walcheski - Develop lesson plan for owners.	2/13/96
Miller - Develop summary instruction for the owner's PASSPORT Historical Review.	
*Snyder - Provide training for all owners on PSL Maint Rule.	66% complete

* Indicates a critical path item, most of which must be completed sequentially.

By February 28

Performance Monitoring

- Cimino - Attend INPO conference on NPRDS & Maint. Rule implementation. Trip approved
- *Cimino - Analyze Unit performance, scrams, ESF actuation, outage delays to identify (a)(1)s.
- *Cimino - Notify owners of potential (a)(1)s from unit performance reviews.
- *Owners - Evaluate potential (a)(1)s and issue STARs.
- *Owners - Propose performance goals based on INPO, PSA, past perform & planned CMM.
- *Vincent - Verify that proposed goals are appropriate from PSA perspective.
- Rogers - Standardize Maint Rule Notebook format for owners.
- Walcheski - Develop Periodic Assessment report format.

Procedure Upgrades

- Snyder - Upgrade the Maintenance Root Cause procedure.
- Snyder - Develop an Event Response Team procedure.
- Snyder - Notify users of new procedures.

Risk Assessment

- Vincent - Use PSA to enhance Shutdown Safety Assessments.
- Korth - Proceduralize Shutdown Safety Assessments.
- Snyder - Coordinate action plan for risk assessment of maintenance activities for all modes.

Expert Panel Review

- Swiatek - Complete reviews of remaining systems.
- *Owners - Sponsor Unit Performance (a)(1)s goals & corrective actions.

By March 15

Performance Monitoring

- *Owners - Chart unavailability & reliability for risk systems (update monthly).
- *Owners - Complete historical review for determining (a)(1).
- *Owners - Propose Goals, corrective actions & begin monitoring for (a)(1)s.
- *Owners - Document (a)(1)s via STAR.
- Rogers - Standardize Management SSC performance review format.
- Snyder - Develop schedule for Management SSC performance reviews. (12 week schedule)
- Cimino - Identify strategic locations for Maint Rule indicators.
- Cimino - Maintain & display current indicators for Maint Rule.
- Walcheski - Draft first Periodic Assessment Report for PSL.
- Snyder - Participate in NEI Maintenance Rule Peer review at Limerick.

Expert Panel Review

- *Owners - Present all SSCs in (a)(1) with corrective actions & goals.
- *Swiatek - Present final draft Program Compliance Plan.

Program Compliance Plan

- *Swiatek - Finalize & Distribute.

* Indicates a critical path item, most of which must be completed sequentially.

By March 31

Performance Monitoring

*Owners - Complete Maintenance Rule Notebooks.

*Cimino - Compile SSC indicators & start monthly distribution.

Management - Begin SSC performance reviews with owners.

Snyder - For final benchmark of PSL, attend NEI workshop on Maintenance Rule.

Risk Assessment

TBA - Procedurally encompass PMs & surveillances in risk assessment all modes.

Vincent- Assist risk assessment as necessary.

By April 15

Peer Review of PSL Maintenance Rule Program

*Snyder - Host NEI peers for critique of PSL Maintenance Rule Program.

By May 30

QA peer exchange

Snyder - Participate in QA audit for Maintenance Rule at SONGs.

By July 10

Second Independent Review

*QA - Perform a second review of Maintenance Rule Implementation at PSL.

JULY 10 - MAINTENANCE RULE BECOMES EFFECTIVE FOR ALL SYSTEMS

* Indicates a critical path item, most of which must be completed sequentially.

ENGINEERING



IMPROVEMENTS/ACTIONS

ENGINEERING

Major Improvement Areas

Improve Configuration Management Controls:

- Implement Temporary System Alteration 3/31/96
- Reduce Open TSAs 6/30/96
- Reduce Age of Oldest PCMs 12/31/96

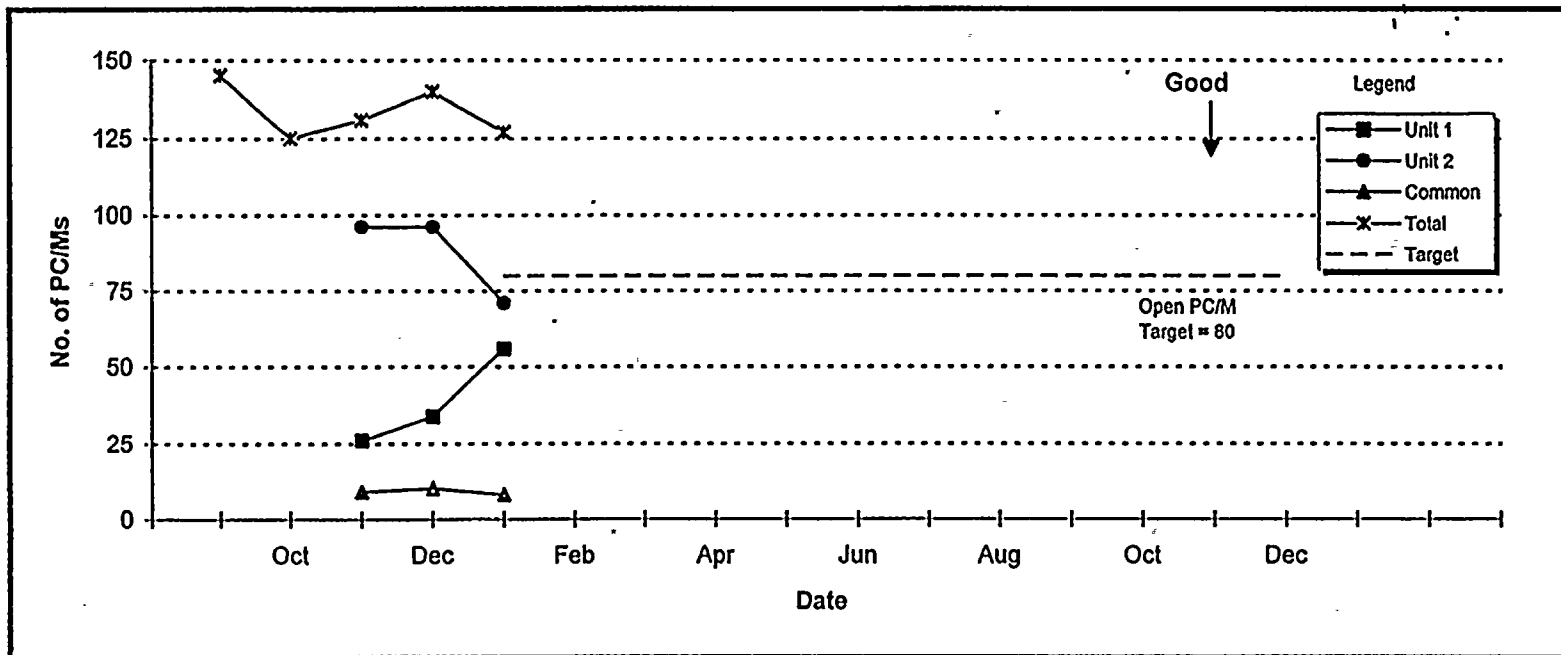
Improve FSAR:

- Assessment Team Effort 2/22/96
- Corrective Actions Unit 1 TBD
- Corrective Actions Unit 2 TBD



PLANT CHANGE/MODIFICATIONS

Kris Mohindroo - Engineering



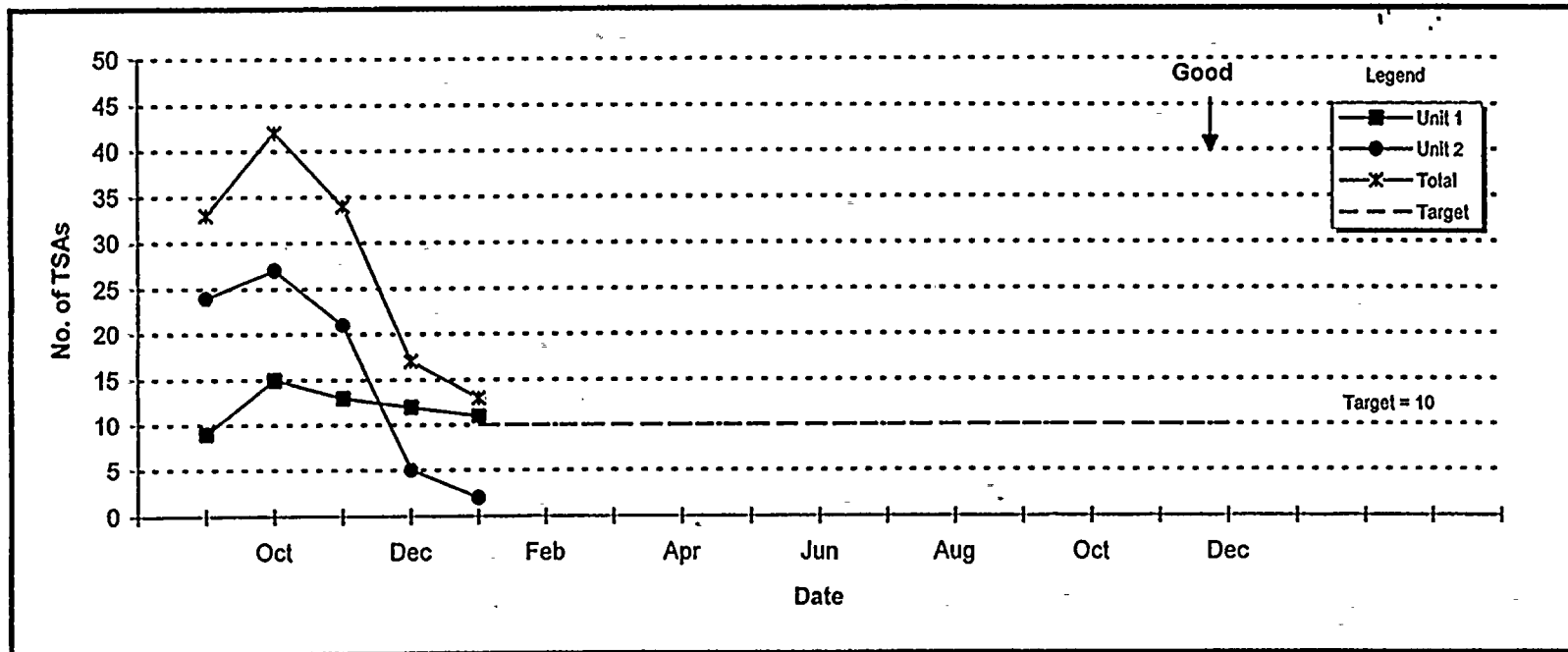
Data Source: Kris Mohindroo

SUMMARY STATUS

Discipline	Unit 1	Unit 2	Common	Total
Open PC/M	56	71	8	135
PC/Ms >24 Mo.	12	8	3	23

TEMPORARY SYSTEM ALTERATIONS (TSA)

Kris Mohindroo - Engineering



Data Source: Kris Mohindroo

SUMMARY STATUS

Discipline	Unit 1	Unit 2	Total
Mechanical	1	0	1
Electrical	2	0	2
I&C	8	3	11
Engineering	0	0	0
Operations	0	0	0
Health Physics	0	0	0
Construction	1	0	1
SCE	0	0	0
Total	12	3	15

Oldest TSA	12/13/94	10/94
Discipline	I&C	I&C

ST. LUCIE PLANT - 10 OLDEST OPEN PC/M's

PC/M NUMBER	DESCRIPTION	DATE ISSUED	DATE FRG'D	SCH CLOSE DATE	STATUS AND ACTIONS REQUIRED TO CLOSE
103-182	Removal of old Unit 1 Security System Equipment which is not performing any useful service	9/12/84	7/9/85	2/16/96	PC/M approximately 40% implemented. Significant effort required to as-build completed activities with little benefit. JPN developing an action plan for closure.
021-184	RAB High Pressure Sodium Lamp Replacement	2/23/84	3/23/84	6/30/96	As-fail PC/M. Completed scope needs to be documented, then closure paper can be processed.
144-286	PASS Dissolved Hydrogen Analyzer	2/1/89	2/23/89	2/16/96	PC/M implemented 11/30/89 and drawings as-built 11/13/90. PC/M tied to completion of PC/M 125-292 which is now ready for closure. ICM needs to process PWO (w/o 93012296 01) for closure of PC/M 125-192. Both PC/M's can then be closed.
193-189	Open Blowdown Cooling Water Heat Exchanger Vacuum Breaker Valve Changeout	2/11/89	12/11/89	2/23/96	PC/M implemented. Action plan to resolve slight periodic leakage problems with valves needs to be developed prior to closure.
375-189	Control Room Air Conditioning Refrigerant Line Coupling	12/19/89	12/20/89	2/16/96	PC/M implemented 2/3/91 and drawings as-built 3/29/91. Need to reconstruct Section XI paperwork to close.
335-190	Check Valve Hinge Pin and Bonnet Modifications on CCW pump discharge check valves V14143, V14147 and V14151	7/18/91- Sup 0 3/25/93- Sup 1	4/13/93- Sup 0 4/13/93- Sup 1	UNIT 1 OUTAGE	PC/M implemented on valves V14147 and V14151. Modifications to V14143 planned for next refueling outage. Will close PC/M upon completion of the work activity
171-191	Resizing and replacement of MOV Thermal Overload Devices on 137 MOV's	7/17/91	9/19/91	UNIT 1 OUTAGE	PC/M implemented on 122 valves. 15 valves remaining to be modified. EM needs to schedule remaining work. Will close PC/M upon completion of the work activity
186-191	Intake Cooling Water Support Modifications	7/1/92- Sup 1	Not FRG'd	UNIT 1 OUTAGE	Sup 0 Complete. Sup. 1 was budget approved at the MRB 1/30/96 for implementation during the 1996 Unit 1 outage.
086-292	Radiation Monitoring Computer Replacement	4/22/92	5/7/92	2/23/96	PC/M implemented. ICM has one PWO associated with two remaining CRN's which is required to be worked to close the PC/M. Will close PC/M upon completion of the work activity.
203-192	Replacement of 95 Sigma Meters in the Control Room and Hot Shutdown Panel do to obsolescence issues.	12/21/92	4/6/93	2/23/96	PC/M partially implemented with 15 instruments installed. Recommend as-building what work has been completed and close PC/M. New PC/M's can then be generated based on planned work activities.



QUALITY ASSURANCE



**QUALITY ASSURANCE OVERSIGHT OF THE PLAN
TO IMPROVE OPERATIONAL PERFORMANCE
WITHIN THE 1st QUARTER 1996**

- **CONDUCT FURTHER EFFECTIVENESS AUDITS (2 COMPLETED) OF THE IMPROVEMENT PLAN**
 - Reconduct survey and compare trend data
 - Audit specific attributes of the plan
 - Audit the transition of STARS to Condition Reports (Corrective Action Program)

- **CONTINUE TO UTILIZE OUTSIDE OF FPL TECHNICAL SPECIALIST IN ASSESSMENTS/AUDITS**
 - Operations/Maintenance (benchmarking industry standards against PSL)

- **INCREASE QA DAILY SURVEILLANCE OF CONTROL ROOMS**
 - Monitor the attentiveness of operations staff
 - Review administrative practices including log keeping
 - Provide feedback to management daily

- **CONDUCT AUDITS OF OPERATIONS**

- Procedure Usage	- Collection of Operating Data
- Procedure Content	- Technical Specification Compliance
- Verbatim Compliance	- Control of Temporary System Alterations
- Document Control	- Shift Technical Advisor Responsibilities
- Operator Rounds	- Attention to Detail
- Valve & Breaker Line-ups	- Operating Experience Feedback Effectiveness

- **CONDUCT AUDITS OF MAINTENANCE**
 - Procedure Usage
 - Procedure Content
 - Verbatim Compliance
 - Document Control
 - Preventative Maintenance of Critical Components
 - Safety Relief Valve PM
 - ASME XI Pump & Valve Program
 - EDG Maintenance
 - Effectiveness of Breaker Reliability Program
 - Conduct of Maintenance
 - Requisition & Utilization of Parts
 - Corrective Action
 - Attention to Detail
- **ESTABLISH A COMPUTERIZED TREND DATA PROGRAM FOR STARS, IHES & HPES DATA**
- **CONDUCT A 1995 STAR PROGRAM RESULTS ASSESSMENT**
- **INDEPENDENTLY ANALYZE 1995 VIOLATIONS FOR ROOT CAUSE DETERMINATION AND EFFECTIVENESS OF CORRECTIVE ACTIONS**
- **CONDUCT SELF-ASSESSMENT & CONDITIONS ADVERSE TO QUALITY TRAINING FOR KEY PLANT MANAGEMENT AND SUPERVISION**
- **PERSONNEL CHANGES/ADDITIONS**
 - Hire from outside FPL a QC Supervisor (extensive operating plant experience)
 - Hire from outside FPL an Operations QA Engineer (RO/SRO/Degreed Engineer)
 - Hire from outside FPL a QA engineer (Nuclear industry experience and root cause expertise)
- **FOLLOW-UP ON PREVIOUSLY IDENTIFIED RECOMMENDATIONS FOR IMPROVEMENTS PROVIDED IN QA ASSESSMENTS**
- **MONITOR KEY INDICATORS OF PLANT PERFORMANCE**
 - Backlogs
 - Age of PWOs, PC/Ms
 - Operator workarounds

**CORRECTIVE ACTION
PROGRAM**

IMPROVEMENTS/ACTIONS

CORRECTIVE ACTION PROGRAM

Major Improvement Areas

Improve Analysis Capability:

- Obtain 1995 data from other plant departments to combine with STARs Complete
- Obtain analysis methodology from industry best plants (Turkey Point/Callaway). Complete
- Produce 1995 Summary Report. 2/20/96

Standardize Corrective Action Process with Nuclear Division.

- Implement PMAI Database Complete
- Implement PMAI Procedure Complete
- FRG approval of Condition Report (CR) 3/1/96
- Training on new CR process 3/96
- Convert STARs to CR/PMAI 4/1/96

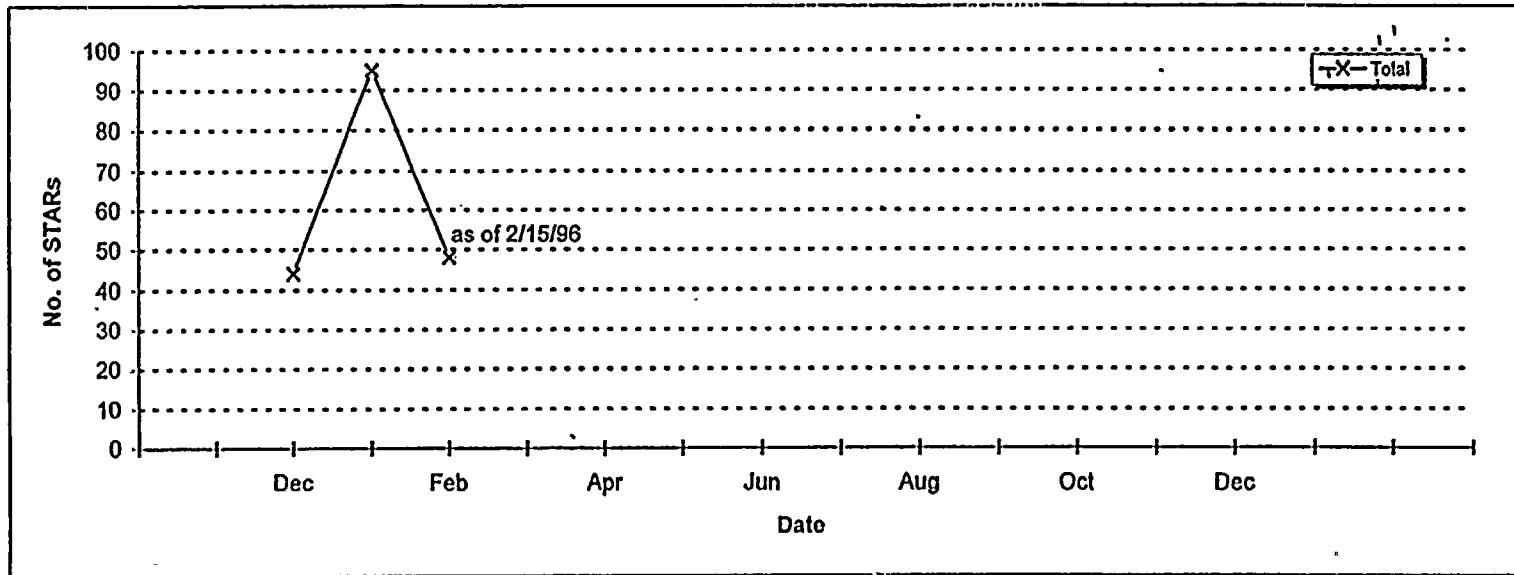
Upgrade Self-Assessment Activities to include Outside Perspective:

- Implement a Management Observation Program (based on Brunswick Program and Turkey Point Backshift Tours) - Complete
- Review each department to ensure a program to perform self-assessments is in place and that the program contains plans to utilize outside assistance. 2/20/96



OVERDUE STARS

Bob Dawson - Corrective Action Program



Data Source: Bob Dawson

STATUS SUMMARY

Discipline	No. Overdue
Chemistry	1
Const Services	3
Elect. Maint.	1
Engineering	14
I&C	2
Mechanical	2
NMM	2
Operations	11
OST	0
Reactor Eng.	1
SCE	7
PM	3
Prot Serv	1
TOTAL	48

**NUCLEAR
MATERIALS MANAGEMENT**

IMPROVEMENTS/ACTIONS

NUCLEAR MATERIALS MANAGEMENT

Major Improvement Areas

Ensure the Availability of Spare Parts:

- Reduce the number of "Below Minimum" items. 4/1/96
- Reduce number and age of work order waiting for parts (AWP). 4/1/96

Reduce the Cost of Carried Inventory:

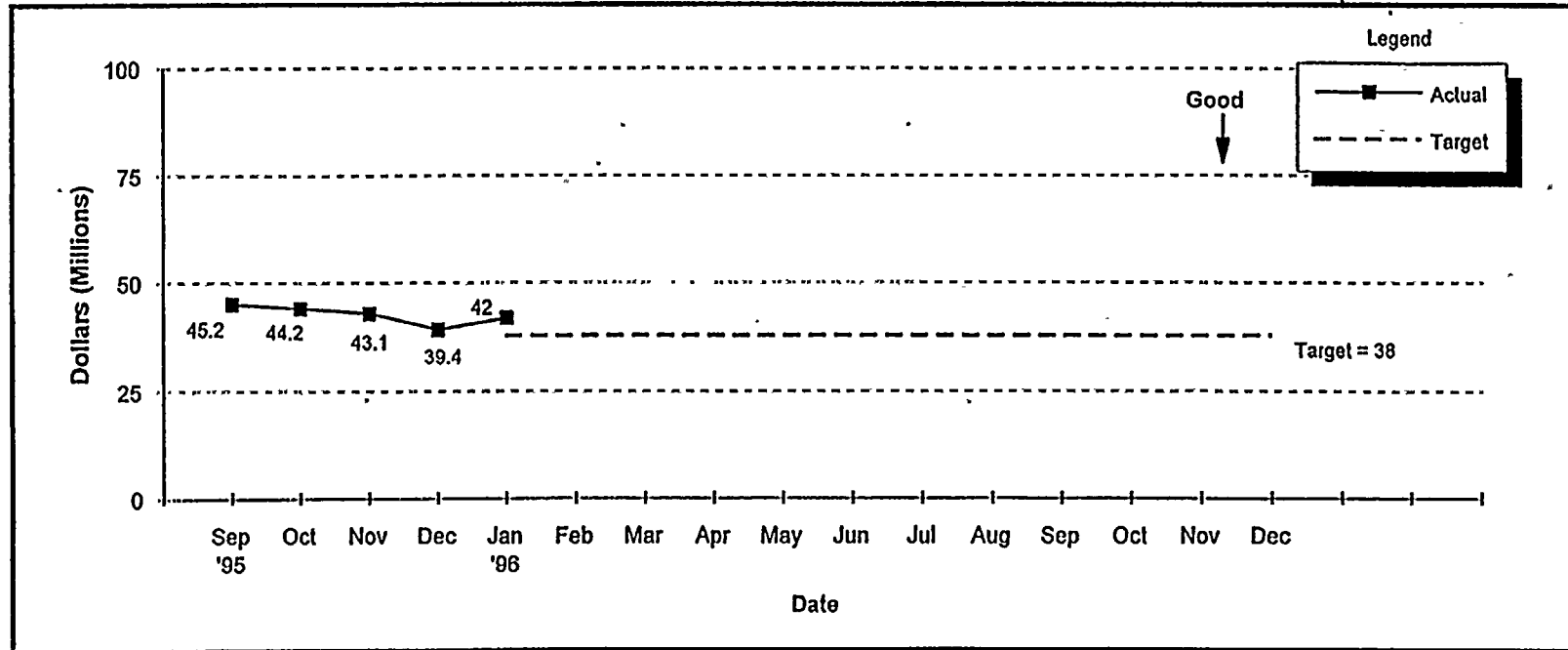
- Reduce value of inventory. 12/31/96
- Reduce overmax inventory. 12/31/96

Outage Material Availability:

- Have all identified material available prior to the outage. 3/29/96

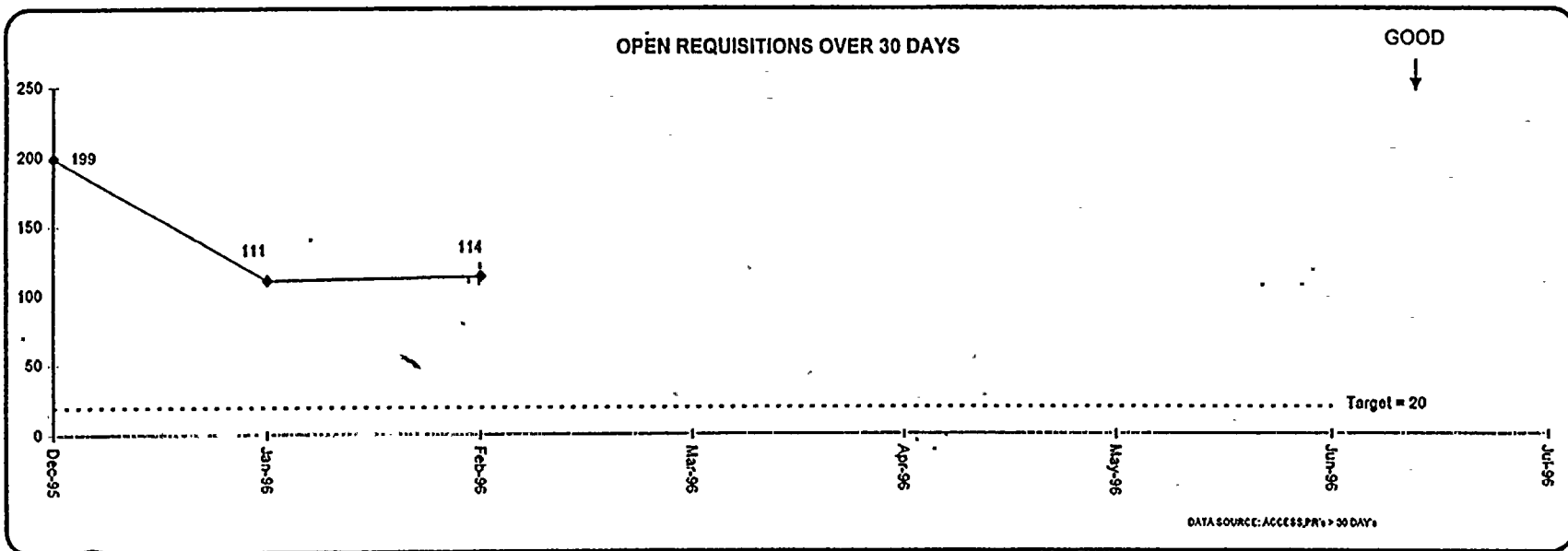
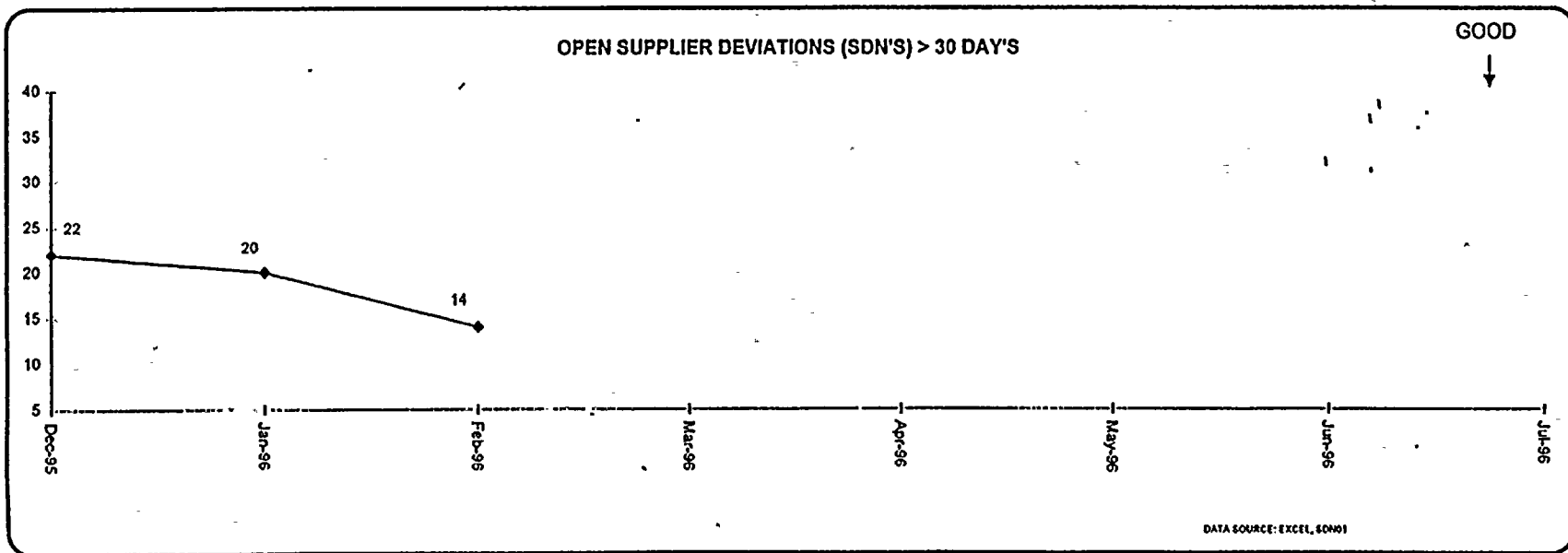
INVENTORY VALUE

Tom Kreinberg - Nuclear Materials Management

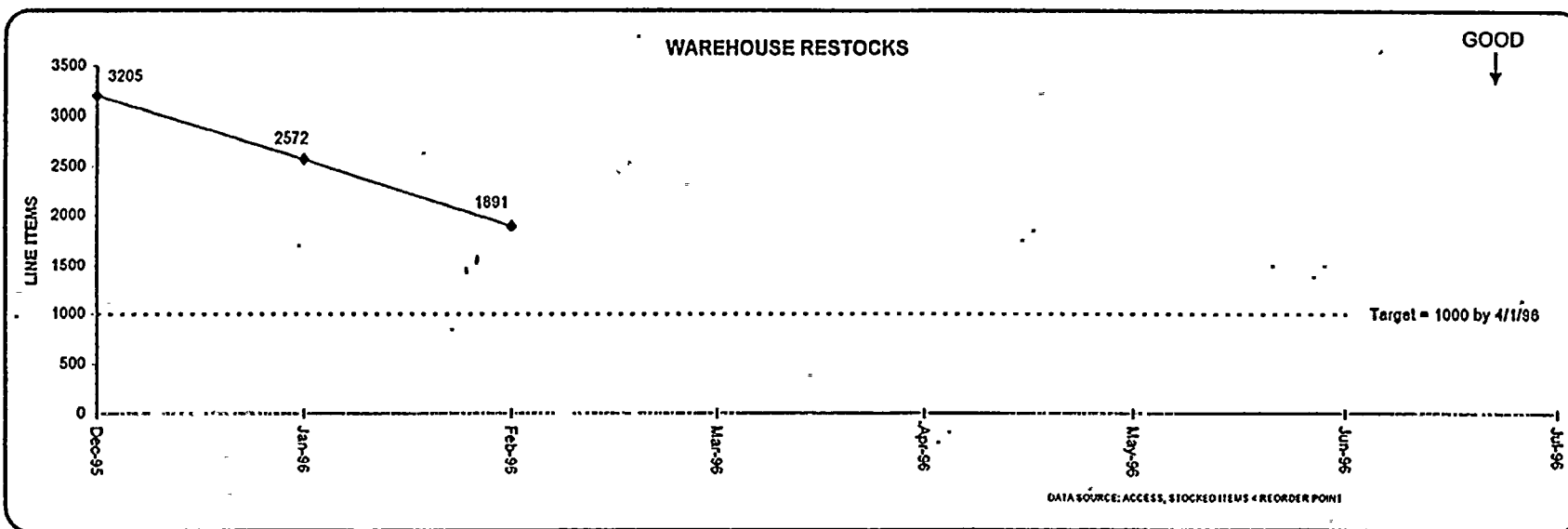
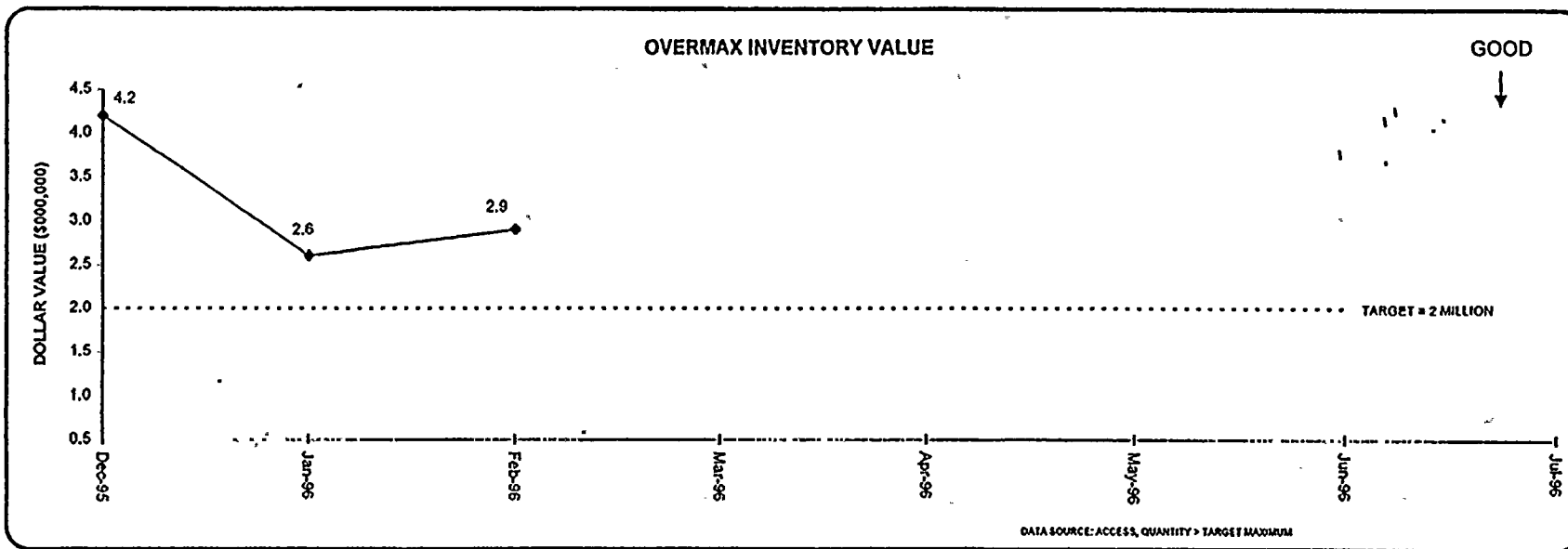


Data Source: Tom Kreinberg

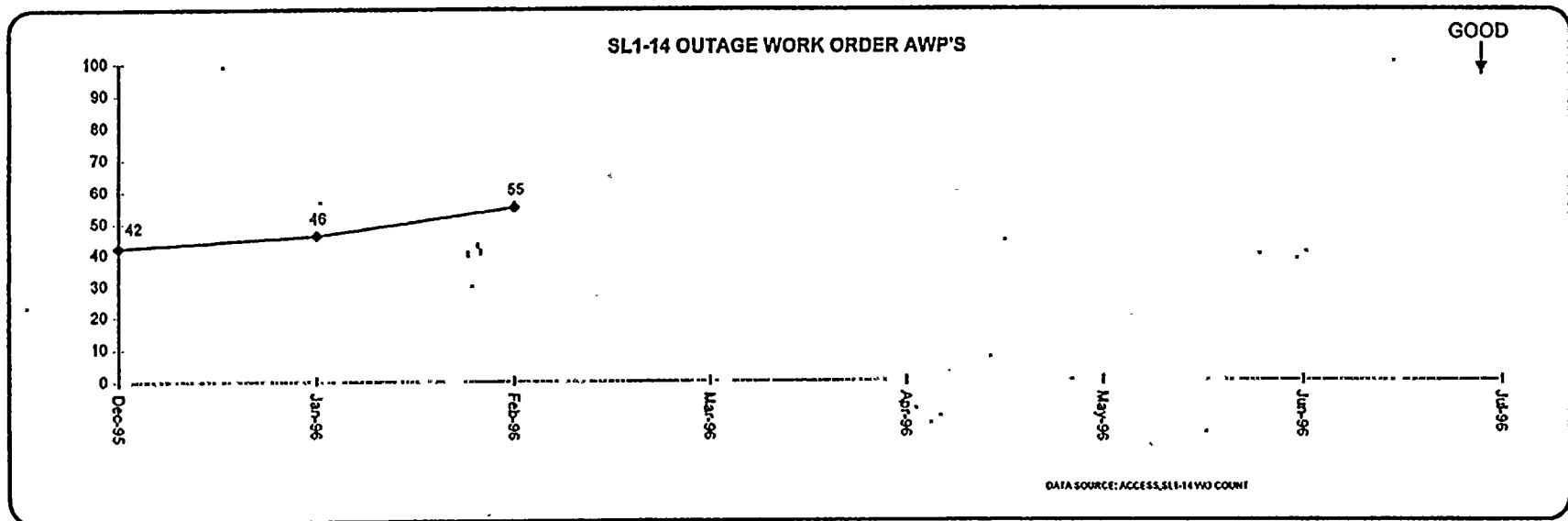
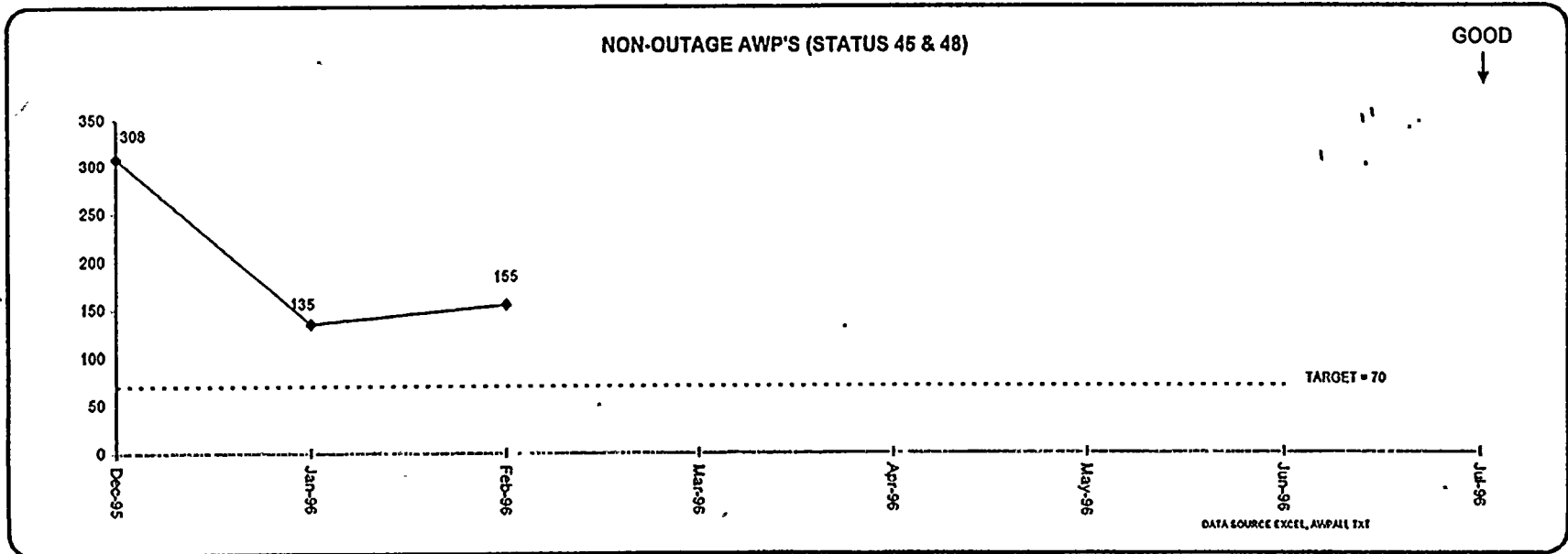
NMM MONTHLY INDICATORS



NMM MONTHLY INDICATORS



NMM MONTHLY INDICATORS



**NMM MONTHLY INDICATORS
(10 OLDEST AWP'S AS OF 02/01/96)**

UN	ORIGINATION DATE	COMPONENT/ASSOCIATE/NAME	TITLE	WORK ORDER	SCHEDULE	STOCK CODE	P.O./P.R.	ACTION	COMMENTS
1	1/14/93	V14143 CHECK VALVE FOR COMPONENT COOLING WATER	IMPLEMENT PCM #335-190M	9300144401	SL1-14	177521-1		NMM	REORDER REVIEW
1	3/17/93	SR-07-1B/SAFETY RELIEF VALVE FOR LPSI 1B & HPSI 1B PP SUCTION	PERFORM IST INSPECTION & RPR FLNG LK.	9300864501	SL1-14	37251-3 57194-1 57594-1	PR 22578 PR 20922 PO 11942	PUR	DELIVERY DATE 3/1/96
1	5/14/93	AFW PP 1C GOV/GOVERNOR/AUXILIARY FEEDWATER PP 1C GOVERNOR	REPLACE VALVE BONNET NEXT OUTAGE IAW	9301401901	SL1-14	183264-1	PO 94934-91034	M/M	REF. W/R #95014323
1	3/19/94	SR-14-8D/SAFETY RELIEF VALVE FOR CONTAINMENT FAN COOLER HVS-1D CCW OUTLET.	INSTALL REPLACEMENT VLV DURING SL1-14	9400844401	SL1-14	34213-1	PR 22490	PUR	QUOTE DUE 2/15/96
2	4/13/94	LCV-9005/VALVE/LEVEL CONTROL VALVE FOR FW REG STATION (FCV-9011) 15% BYPASS	BODY EROSION/FLOW CAGE GASKET LEAKAGE	9400856501	SL2-10	19160-3	PO 12576	PUR	DELIVERY DATE 7/2/96
1	5/13/94	HCV-3625/VALVE/MOTOR OPERATED VALVE FOR LPSI FEED (LP HDR) TO LOOP 1A1	BONNET LEAK & PACKING LEAK	9401193401	SL1-14	65940-3	PO 13425	PUR	DELIVERY DATE 3/1/96
2	7/17/94	V18191 ISOLATION VALVE FOR INSTRUMENT AIR SUPPLY HEADED TO RCB	PIPING NEEDS TO BE STRAIGHTENED	9401747201	SL2-9	34625-4		NMM	REORDER REVIEW
2	6/23/94	LIS-07-2C/LEVEL INDICATING SWITCH FOR REFUELING WATER TANK LEVEL	REPLACE LIS-07-2C AND PIS-07-2C WITH	9401581901		90581-1	PO 13253	PUR	DELIVERY DATE 3/29/96
1	9/24/94	FCV-24-107/VALVE/CONTROL VALVE FOR ES DRAIN TO CNDSR 1A FROM HP EXHAUST TO MSR 1C	DISASSEMBLE AND INSPECT REPAIR AS NEEDED	9402439601	SL1-14	194732-4	PO 13477	PUR	DELIVERY DATE 2/26/96
1	9/24/94	FCV-24-108/CONTROL VALVE FOR ES DRAIN TO CNDSR 1A FROM HP EXHAUST TO MSR 1D	DISASSEMBLE AND INSPECT REPAIR AS NEEDED	9402439701	SL1-14	194732-4 178731-4	PO 13477	PUR	DELIVERY DATE 2/26/96

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SERVICES



IMPROVEMENTS/ACTIONS

SERVICES

Major Improvement Areas

Improve the Procedure Administration Process to Ensure Quality Procedures:

Temporary Change Action Plan

- Reduce the number of active TCs prior to placing Unit 2 in service - 90% reduction accomplished. Complete
- Clarify definition of TC versus PCR. Complete
- Consolidate TC and PCR process. Complete
- Revise QI 5-1 to clarify process and accountabilities. Complete
- Benchmark process against other utilities. Complete

Convert Procedures are not required by TS 6.8.1 to Department Guidelines

- Each department head has an identified scope of procedures to address. 2/29/96

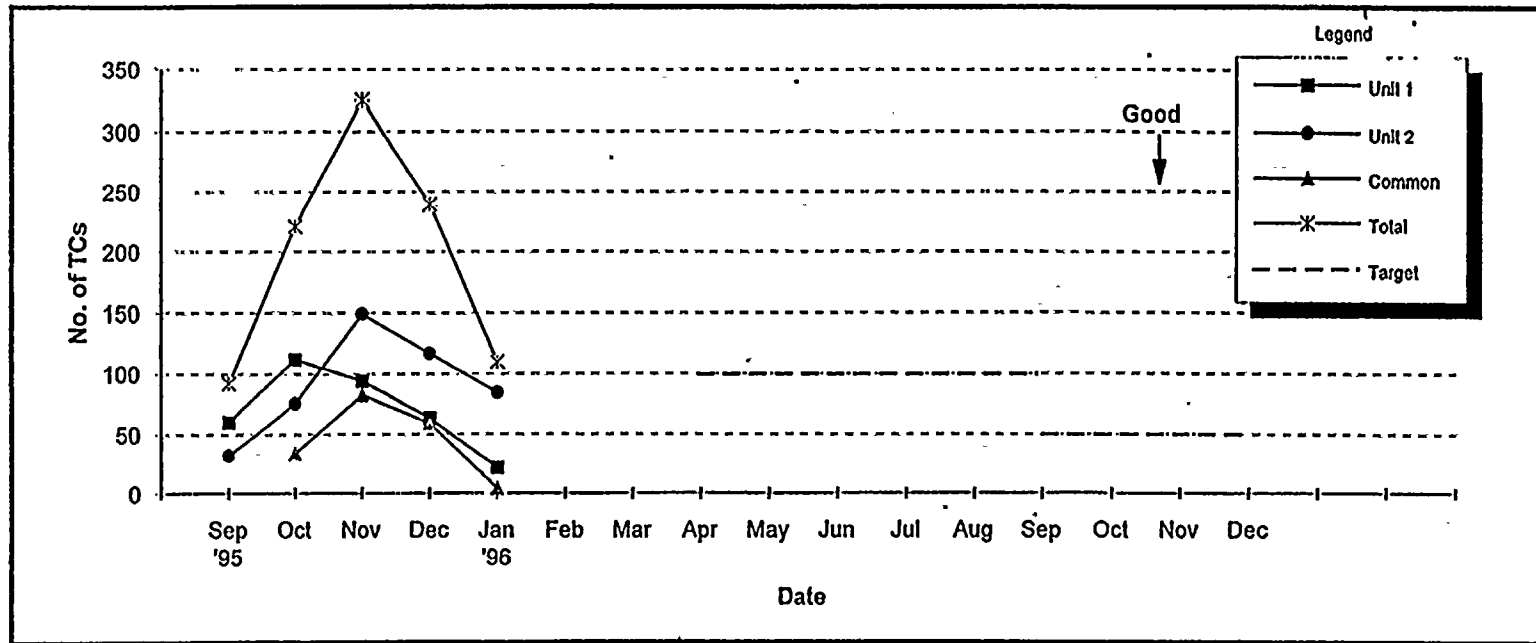
Improve the Safety Focus of FRG and Thoroughness of Review:

- Submit Tech Spec amendment to delete need for FRG to see non-nuclear safety procedures. 6/30/96
- Review need for detailed agendas and meeting minutes. Complete
- Benchmark process against other utilities. 4/1/96
- Achieve routine Operations participation in FRG. Complete
- Require sponsorship of non-routine items. Complete
- Establish FRG subcommittee to pre-screen submittals and reduce FRG volume. Complete
- Revise FRG process and procedure IAW new Tech Spec. 10/30/96



TEMPORARY CHANGES TO PROCEDURES

Jim Holt - Information Services



Data Source: Jim Holt

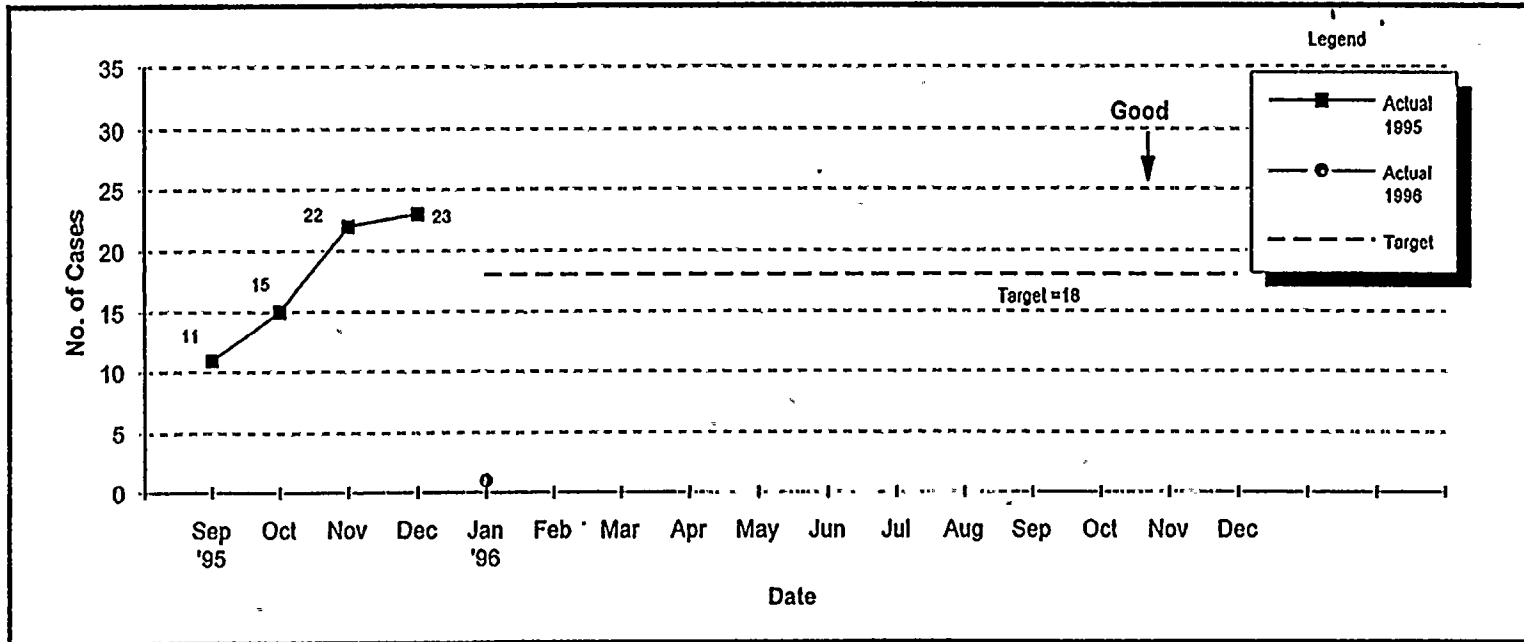
SUMMARY STATUS

Oldest TC (days)
89
85
89
88
30
89
20

Discipline	Unit 1	Unit 2	Common	Total
Operations	12	39	0	51
Mechanical	3	4	0	7
Electrical	5	12	1	18
I&C	1	24	0	25
Reactor Eng.	1	2	2	5
SCE	0	3	0	3
HP	0	0	1	1
Total	22	84	4	110

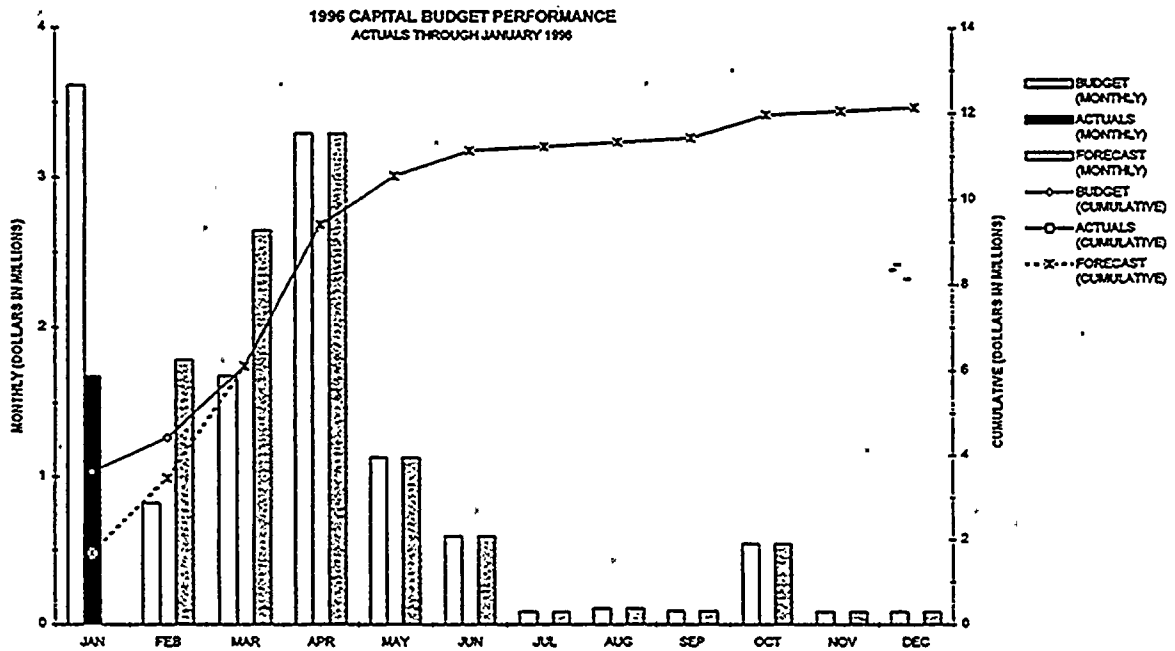
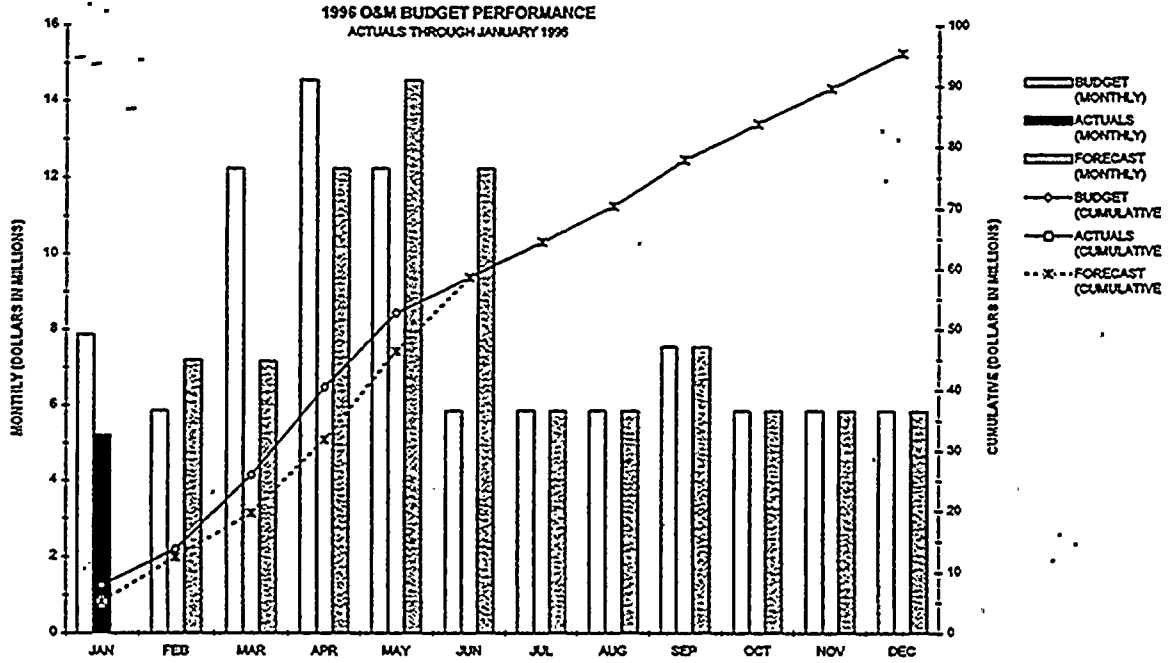
INDUSTRIAL SAFETY - RECORDABLE DOCTOR CASES

Kim Heffelfinger - Protection Services



Data Source: Kim Heffelfinger

**ST. LUCIE PLANT
BUDGET PERFORMANCE INDICATOR**



LICENSING



IMPROVEMENTS/ACTIONS

LICENSING

Major Improvement Areas

Improve Support to Operations in the Use and Interpretation of the PSL Technical Specifications:

- Further evaluate cost/benefit of implementation of Improved Standard Technical Specifications (ISTS). 6/30/96
- Improve the Technical Specifications BASES:
 - Submit PLAs to remove the BASES from the PSL Technical Specifications Index 6/30/96
 - Use the ISTS BASES for PSL BASES improvements. On-going (post-PLA approval)
- Evaluate the need for Technical Specifications position statements. 6/30/96

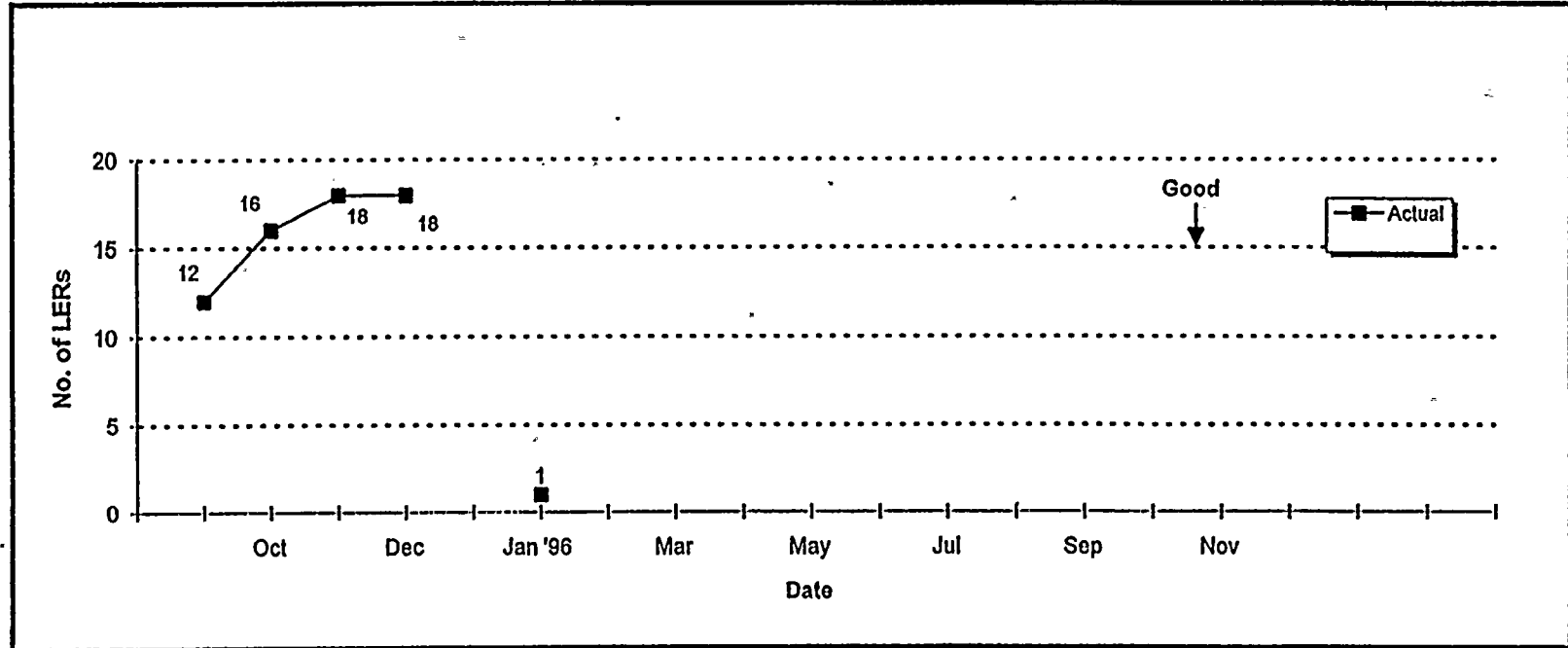
Address and improve the implementation of the Operating Experience Feedback (OEF) Program. 3/31/96

Determine the need to track both 10 CFR §50.72 and 10 CFR §50.73. Reportable Event notifications. 3/31/96



LICENSEE EVENT REPORTS

Ed Weinkam - Licensing



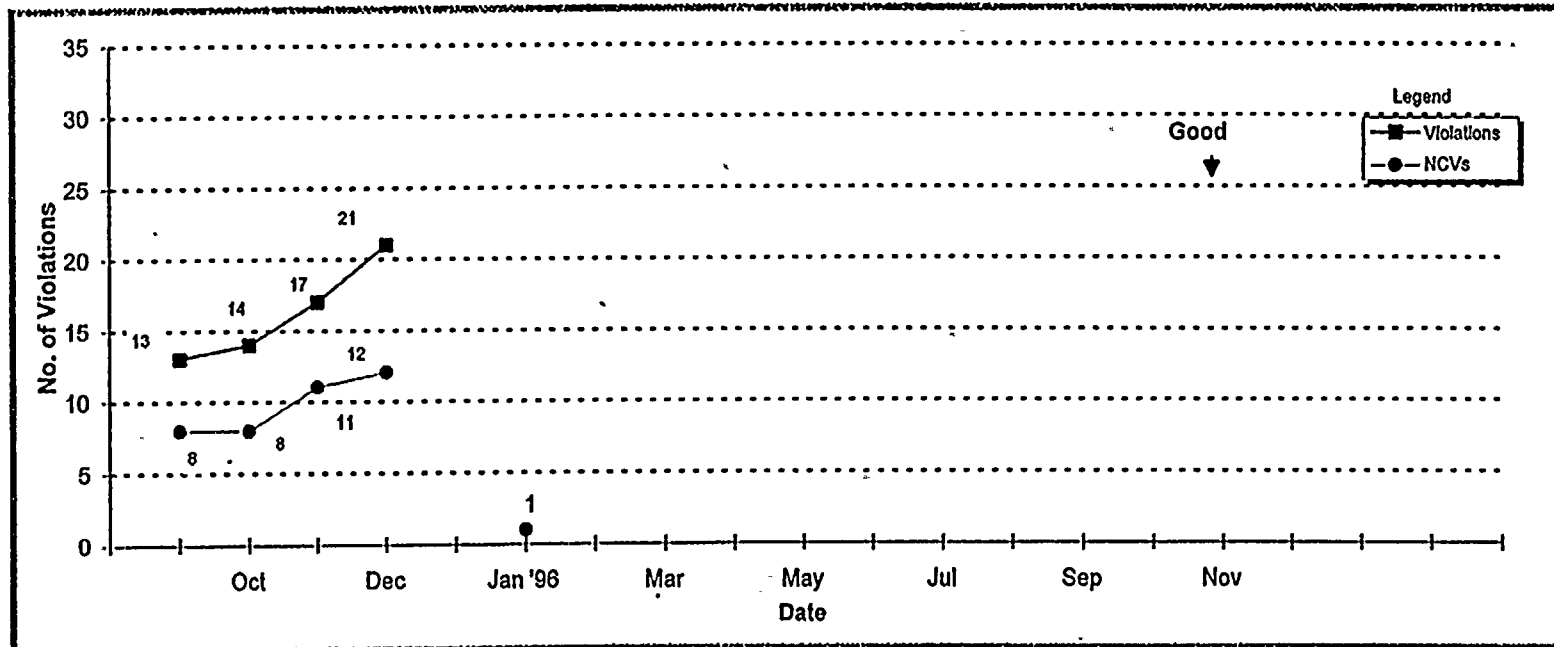
Data Source: Ed Weinkam

SUMMARY STATUS

Date	Event
1/5/96	Unit 2 Manual Reactor Trip Due to High Generator Cold Gas Temperature

NRC VIOLATIONS

Ed Weinkam - Licensing



Data Source: Ed Weinkam

HUMAN RESOURCES



IMPROVEMENTS/ACTIONS

HUMAN RESOURCES

Major Improvement Areas

Strengthen the Management Skills of our Supervision:

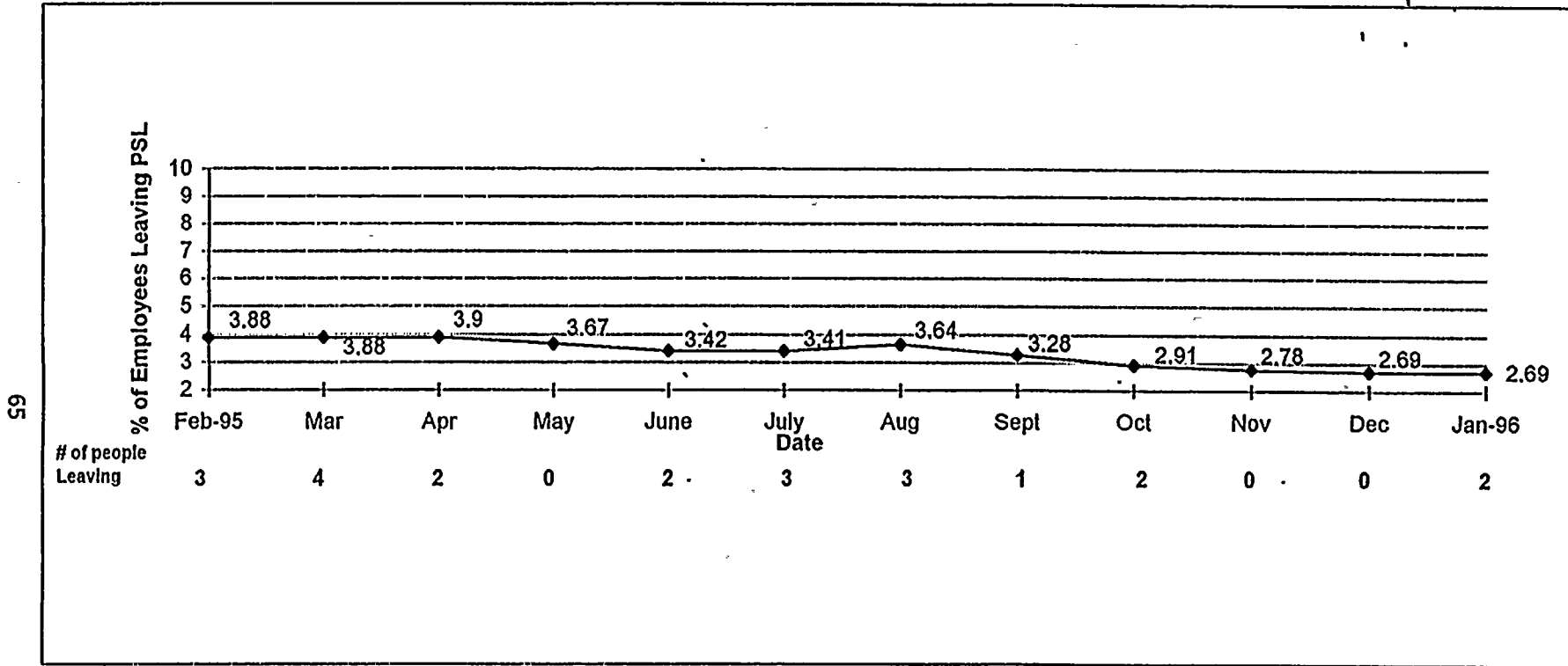
- Include the following attributes in personnel performance appraisals: Complete
 - Adherence to procedures
 - Compliance with Industrial Safety Program
- Develop and issue guidelines to foreman and supervisory personnel on assessing employee performance. Complete
- Evaluate and modify, if necessary, accountabilities of foremen/supervisors to ensure handling employee performance is a key responsibility. Ensure these accountabilities are clearly identified in the foreman/ supervisor selection process. 3/15/96
- Interview foreman and supervisor incumbents to ensure they are willing to meet the expectations of the position in handling employee performance issues. 6/30/96

Improve Labor Relations:

- Reduce number of union grievances not handled within 10 days. Include indicator for review. -- Tracking Implemented Process On-going



**ANNUALIZED VOLUNTARY EXTERNAL TURNOVER
ST. LUCIE PLANT**
Andy DeSolza - Human Resources

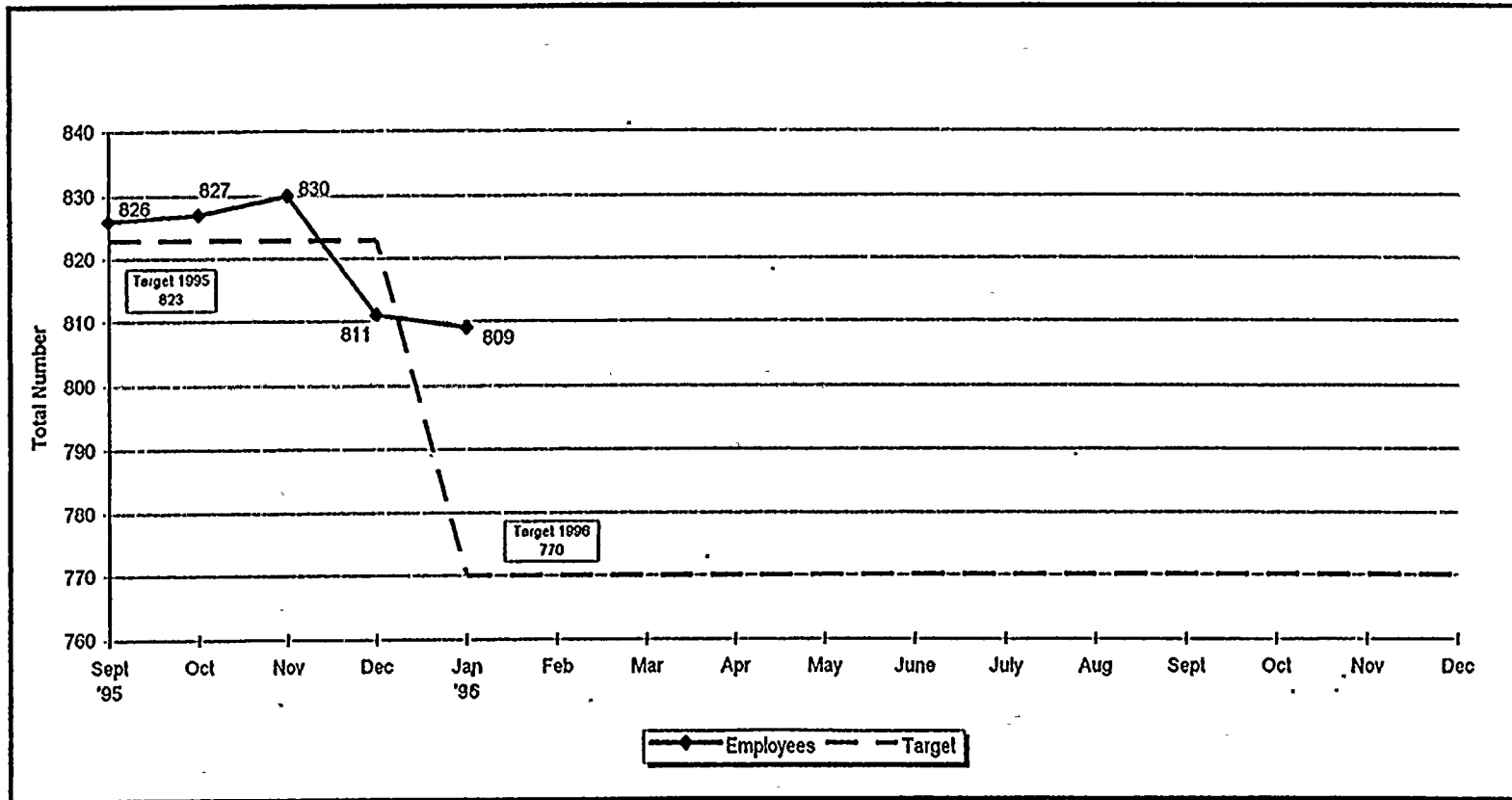


DEFINITION: Turnover - the total number of people leaving site. (direct reports to Site VP)

Percentage calculated by number of people leaving site over the total number of FPL, St. Lucie, employees on site.

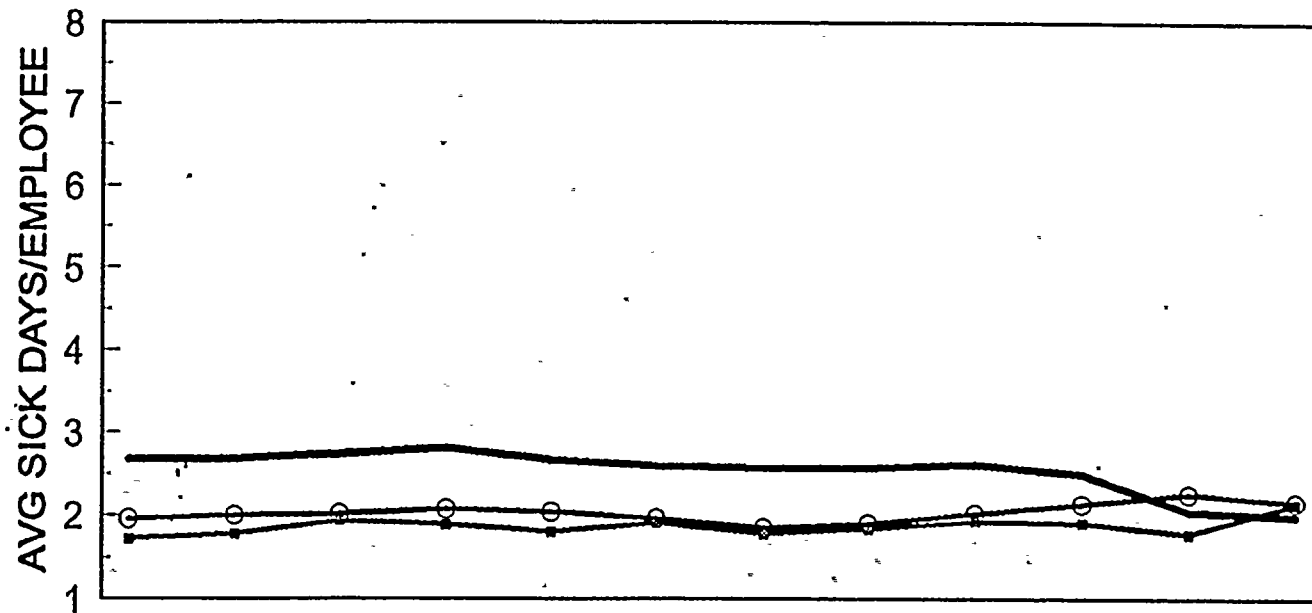
ST LUCIE PLANT
Total Employees
Andy DeSolza - Human Resources

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NUCLEAR DIVISION EXEMPT ABSENTEEISM

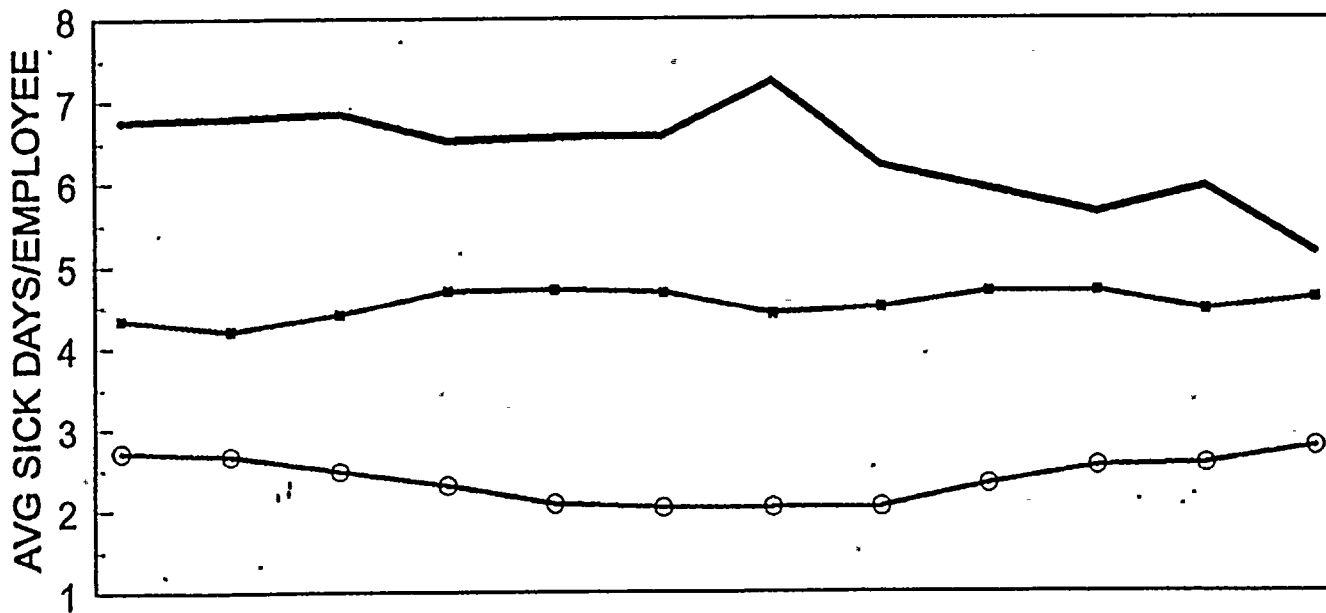
JANUARY, 1996
12 Month Average



12 months ending	F	M	A	M	J	J	A	S	O	N	D	J
JB STAFF	2.68	2.68	2.74	2.80	2.66	2.59	2.57	2.57	2.61	2.49	2.04	1.98
PSL	1.95	1.99	2.01	2.07	2.03	1.95	1.84	1.89	2.01	2.13	2.25	2.15
PTN	1.71	1.77	1.93	1.88	1.79	1.90	1.77	1.83	1.92	1.90	1.77	2.13

NUCLEAR DIVISION NON-EXEMPT ABSENTEEISM

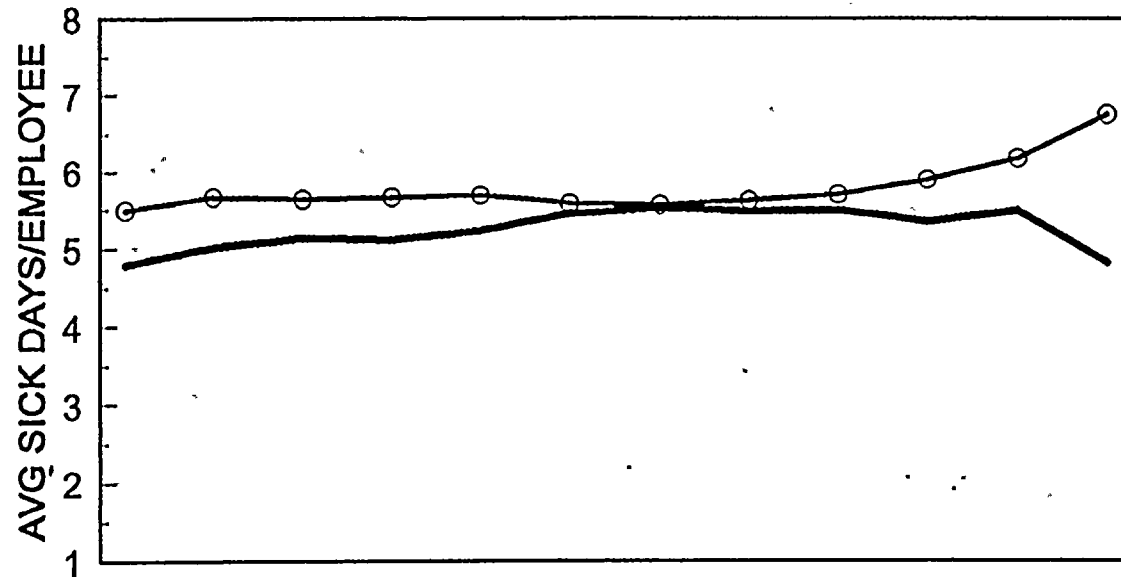
JANUARY, 1996
12 Month Average



12 months ending	F	M	A	M	J	J	A	S	O	N	D	J
JB STAFF	6.75	6.79	6.85	6.51	6.56	6.57	7.24	6.21	5.93	5.64	5.95	5.16
PSL	2.71	2.66	2.48	2.30	2.07	2.02	2.03	2.04	2.32	2.54	2.57	2.78
PTN	4.34	4.20	4.41	4.69	4.71	4.67	4.41	4.49	4.68	4.69	4.46	4.60

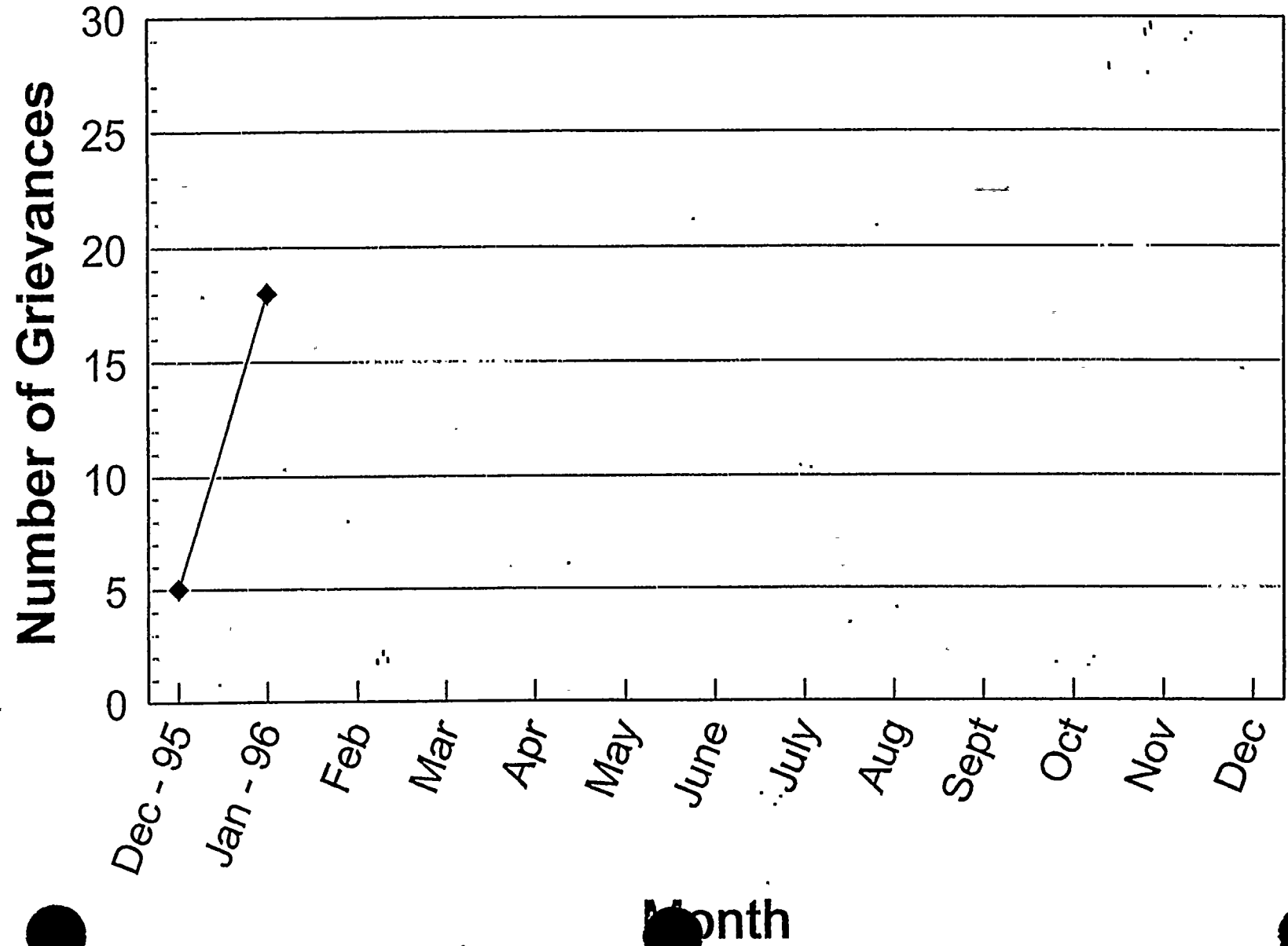
NUCLEAR DIVISION BARGAINING UNIT ABSENTEEISM

JANUARY, 1996
12 Month Average



12 months ending	F	M	A	M	J	J	A	S	O	N	D	J
PTN —	4.79	5.02	5.14	5.11	5.23	5.45	5.52	5.48	5.50	5.35	5.49	4.82
PSL ⊖	5.49	5.66	5.64	5.66	5.69	5.58	5.56	5.62	5.70	5.90	6.19	6.76

Outstanding Grievances Older than 10 days



70