BOSTON EDISON

Pilgrim Nuclear Power Station
Rocky Hill Road

Plymouth, Massachusetts 02360

E. T. Boulette, PhD Senior Vice President – Nuclear

> April 14, 1994 BECo Ltr. #94-041

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

> Docket No. 50-293 License No. DPR-35

# MARCH 1994 MONTHLY REPORT

In accordance with PNPS Technical Specification 6.9.A.2, a copy of the Operational Status Summary for Pilgrim Nuclear Power Station is attached for your information and planning. Should you have any questions concerning this report please contact me directly.

E. T. Boulette PhD

WJM/dmc/9447

Attachment

cc: Mr. Thomas T. Martin
Regional Administrator, Region I
U.S. Nuclear Regulatory Commission
475 Allendale Road
King of Prussia, PA 19406

Senior Resident Inspector

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#### OPERATING DATA REPORT

DOCKET NO. 50-293 April 14, 1594 COMPLETED BY: W. Munro TELEPHONE (508) 830-8474

#### OPERATING STATUS

#### NOTES

1.	Unit Name	Pilgrim I	
2.	Reporting Period	March 1994	
3.	Licensed Thermal Power (MWt)	1998	
4.	Nameplate Rating (Gross MWe)	678	
5.	Design Electrical Rating (Net MWe)	655	
6.	Maximum Dependable Capacity (Gross MWe)	696	
7.	Maximum Dependable Capacity (Net MWe)	670	
8.	If Changes Occur in Capacity Ratings (It	em Number 3 Through 7) Since Last Report, (	Jive
	Reasons:		
	None		
9.	Power Level To Which Restricted, If Any	(Net MWe): None	
10.	Reasons For Restrictions, If Any: N/A		

		This Month	Yr-to-Date	Cumulative
11.	Hours In Reporting Period	744.0	2160.0	186792.0
12.	Number of Hours Reactor Was Critical	671.8	2006.2	114947.7
13.	Reactor Reserve Shutdown Hours	0.0	0.0	0.0
14.	Hours Generator On-Line	639.0	1916.9	110705.9
15.	Unit Reserve Shutdown Hours	0.0	0.0	0.0
16.	Gross Thermal Energy Generated (MWH)	1204200.0	3668760.0	194813496.0
17.	Gross Electrical Energy Generated (MWH)	411640.0	1262170.0	65908104.0
18.	Net Electrical Energy Generated (MWH)	396128.0	1215101.0	63348795.0
19.	Unit Service Factor	85.9	88.7	59.3
20.	Unit Availability Factor	85.9	88.7	59.3
21.	Unit Capacity Factor (Using MDC Net)	79.5	84.0	50.6
22.	Unit Capacity Factor (Using DER Net)	81.3	85.9	51.8
23.	Unit Forced Outage Rate	3.3	1.1	11.7
24.	Shutdowns scheduled over next 6 months (type, date,	and duration	of each) -	

25. If shutdown at end of report period, estimated date of startup - unit operating

# AVERAGE DAILY UNIT POWER LEVEL

DOCKET NO. 50-293 April 14, 1994

COMPLETED BY: W. Munro TELEPHONE: (508) 830-8474

## MONTH March 1994

DAY	AVERAGE DAILY POWER LEVEL (MWe-Net)	DAY	AVERAGE DAILY POWER LEVEL (MWe-Net)
1	0	17	664
2	0	18	664
3	0	19	664
4	108	20	664
5	532	21	664
6	663	22	663
7	666	23	664
8	666	24	664
9	664	25	664
10	664	26	663
11	291	27	563
12	124	28	664
13	182	29	663
14	663	30	664
15	664	31	664
16	664		

This format lists the average daily unit power level in MWe-Net for each day in the reporting month, computed to the nearest whole megawatt.

# BOSTON EDISON COMPANY PILGRIM NUCLEAR POWER STATION DOCKET NO. 50-293

#### OPERATIONAL SUMMARY FOR MARCH 1994

The unit started the reporting period in cold shutdown condition to complete the scheduled outage activities which were originated on February 23, 1994. On March 4, 1994 at 0012 hours the reactor was made critical and the unit was synchronized to the grid at 1057 hours. Reactor power was increased and at 1007 hours on March 5, 1994, the unit attained 100 percent core thermal power (CTP), where it was essentially maintained until March 11, 1994. On March 11, 1994 reactor power was reduced to approximately 45 percent CTP to facilitate maintenance on the Augmented Offgas System. On March 12, 1994, reactor power was further reduced to approximately 10 percent CTP, and the main generator was taken offline to perform a leak repair on the stator cooling system. Following the repair, the main generator was synchronized to the grid at 1055 hours on March 13, 1994. Reactor power was increased and the unit attained 100 percent CTP at 2200 hours on March 13, 1994, where it was essentially maintained throughout the end of the reporting period.

## SAFETY RELIEF VALVE CHALLENGES MONTH OF MARCH 1994

Requirement: NUREG-0737 T.A.P. II.K.3.3

There were no safety relief valve challenges during the reporting period.

An SRV challenge is defined as anytime an SRV has received a signal to operate via reactor pressure, auto signal (ADS) or control switch (manual). Ref. BECo ltr. #81-01 date 01/05/81.

#### REFUELING INFORMATION

The following refueling information is included in the Monthly Report as requested in an NRC letter to BECo, dated January 18, 1978:

For your convenience, the information supplied has been enumerated so that each number corresponds to equivalent notation utilized in the request.

- 1. The name of this facility is Pilgrim Nuclear Power Station, Docket Number 50-293.
- 2. Scheduled date for next refueling shutdown: April 1, 1995
- 3. Scheduled date for restart following next refueling: May 26, 1995
- 4. Due to their similarity, requests 4, 5, & 6 are responded to collectively under #6.
- 5. See #6.
- 6. The new fuel loaded during the 1993 refueling outage was of the same design as loaded in the previous refueling outage and consisted of 140 assemblies.
- 7. (a) There are 580 fuel assemblies in the core.
  - (b) There are 1629 fuel assemblies in the spent fuel pool.
- 8. (a) The station is presently licensed to store 2320 spent fuel assemblies. The actual usable spent fuel storage capacity is 2320 fuel assemblies.
  - (b) The planned spent fuel storage capacity is 2320 fuel assemblies.
- 9. With present spent fuel in storage, the spent fuel pool now has the capacity to accommodate an additional 691 fuel assemblies.

## MONTH MARCH 1994

#### PILGRIM NUCLEAR POWER STATION MAJOR SAFETY RELATED MAINTENANCE

SYSTEM	COMPONENT	MALFUNCTION	CAUSE	MAINTENANCE	CORRECTIVE ACTION TO PREVENT RECURRENCE	ASSOCIATED LER
TURBINE * GENERATOR AND AUXILIARIES SYSTEM *	AND PRESSURE	CRACKED WELD CAUSING PRESSURE TAP TO LEAK. (PR94.9110)	INCORRECT INSTALLATION OF THE PRESSURE TAP FOR Y-37 AND YGA-11 DURING INITIAL CONSTRUCTION.	PARTS NEEDED TO PROPERLY INSTALL NEW PRESSURE TAP WERE NOT AVAILABLE. TEMPORARY MODIFICATION 94-07 WAS IMPLEMENTED TO REMOVE THE PRESSURE TAP, VALVE AND GAUGE. A PATCH WAS WELDED OVER THE REMAINING HOLE.	DURING RFO-10 A NEW PRESSURE TAP WILL BE INSTALLED USING A SOCKET WELD FITTING. GAUGE YGA-11 WILL BE REPLACED WITH A SMALLER GAUGE TO REDUCE STRESS ON THE WELD. (MR 19400698).	N/A
HIGH PRESSURE COOLANT INSPECTION (HPCI) SYSTEM.	HPCI MOTOR OPERATED INJECTION VALVE MO-2301-09	VALVE FAILED MONTHLY SURVEILLANCE OPERABILITY TEST DUE TO FAILURE OF THE VALVE MOTOR OPERATOR (LIMITORQUE) TORQUE SWITCH DRIVE PINION GEAR ROLL PIN. HPCI DECLARED INOPERABLE. (PR94.9104)	ANALYSIS OF THE FAILED PIN FOUND IT TO BE LESS THAN OPTIMUM DESIGN. CONTRIBUTING CAUSE INCLUDED HARDENED GREASE IN THE MOTOR OPERATOR SPRING PACK.	MAINTENANCE PERSONNEL IMPLEMENTED	INSTALLATION OF A NEW SPRING PACK RESISTANT TO GREASE BUILDUP, AND REPLACEMENT OF THE TORQUE SWITCH WITH ONE OF AN IMPROVED DESIGN PRIOR TO RETURNING THE VALVE TO SERVICE.	LER 94-002-00

<sup>\*</sup> NOT SAFETY RELATED BUT CAUSED SIGNIFICANT ECONOMIC IMPACT.

MONTH MARCH 1994

# PILGRIM NUCLEAR POWER STATION MAJOR SAFETY RELATED MAINTENANCE

SYSTEM	COMPONENT	MALFUNCTION	CAUSE	MAINTENANCE	CORRECTIVE ACTION TO PREVENT RECURRENCE	ASSOCIATED LER
REACTOR W CLEANUP ( SYSTEM	MOTOR OPERATED VALVE MO-1201-80 RETURN ISOLATION VALVE.	INABILITY TO OPEN VALVE FROM THE CONTROL ROOM.	LIMIT SWITCH OUT OF ADJUSTMENT.	ADJUSTED LIMIT SWITCH TO ACHIEVE PROPER GAP BETWEEN L-BRACKET AND CONTACT FINGER #5 IN ACCORDANCE WITH PROCEDURE 8.Q.3-8. PERFORMED POST WORK TEST PER PROCEDURE 8.6.5.2 SUCCESSFULLY.	PERFORMANCE OF PREVENTIVE MAINTENANCE/ SURVEILLANCE PROGRAM.	N/A

# UNIT SHUTDOWNS AND POWER REDUCTIONS DOCKET NO: 50-293

DOCKET NO: 50-293

NAME: Pilgrim I.

DATE: April 14, 1994

COMPLETED BY: W. Munro

TELEPHONE: (508) 830-8474

REPORT MONTH MARCH 1994

NO.	DATE	TYPE 1	DURATION (HOURS)	REASON 2	METHOD OF SHUTTING DOWN REACTOR 3	LICENSE EVENT REPORT #	SYSTEM CODE 4	COMPONENT CODE 5	CAUSE & CORRECTIVE ACTION TO PREVENT RECURRENCE
1	3-04-94	S	82.9	В	1	N/A	N/A	N/A	Continuation of Main Steam Isolation Valve Maintenance Outage.
2	3-11-94	F	0.0	В		N/A	N/A	N/A	Reduced power to perform maintenance on Augmented Offga System.
3	3-12-94	F	22.1	В		N/A	N/A	N/A	Main Turbine Generator was taken off line to repair leak on Stator Cooling System.

1	2	2	3	4.65
F-FORCED S-SCHED	A-Equip Failure B-Main or Test C-Refueling D-Regulatory Restriction E-Operator Training & License Examination	F-Admin G-Oper Error H-Other	1-Manual 2-Manual Scram 3-Auto Scram 4-Continued 5-Reduced Load 9-Other	Exhibit F & H Instructions for Preparations of Data Entry Sheet Licensee Event Report (LER) File (NUREG-1022)