

Commonwealth Edison Company  
Quad Cities Generating Station  
22710 206th Avenue North  
Cordova, IL 61242-9740  
Tel 309-654-2241



SVP-99-052

March 15, 1999

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

Quad Cities Nuclear Power Station, Unit 1 and Unit 2  
Facility Operating License Nos. DPR-29 and DPR-30  
NRC Docket Nos. 50-254 and 50-265

Subject: **Monthly Performance Report**

In accordance with NRC Generic Letter 97-02, and Technical Specification Section 6.9, we are forwarding the Monthly Performance Report covering the operation of Quad Cities Nuclear Power Station, Unit One and Unit Two, during the month of February 1999.

If there are any questions or comments concerning this letter, please refer them to Mr. Wally Beck, Acting Regulatory Assurance Manager, at (309) 654-2241, extension 3609.

Sincerely,

A handwritten signature in dark ink, appearing to read "Joel P. Dimmette, Jr.", is written over the printed name.

Joel P. Dimmette, Jr.  
Site Vice President  
Quad Cities Nuclear Power Station

Enclosure

cc: Regional Administrator - NRC Region III  
NRC Senior Resident Inspector - Quad Cities Nuclear Power Station

9903190361 990228  
PDR ADOCK 05000254  
R PDR

QUAD CITIES NUCLEAR POWER STATION

UNITS 1 AND 2

MONTHLY PERFORMANCE REPORT

FEBRUARY 1999

COMMONWEALTH EDISON COMPANY

AND

MIDAMERICAN ENERGY COMPANY

NRC DOCKET NOS. 50-254 AND 50-265

LICENSE NOS. DPR-29 AND DPR-30

## TABLE OF CONTENTS

- I. Introduction
- II. Summary of Operating Experience
  - A. Unit One
  - B. Unit Two
- III. Operating Data Statistics
  - A. Operating Data Report for February – Quad Cities Unit One
  - A. Operating Data Report for February – Quad Cities Unit Two
- IV. Unit Shutdowns
  - A. Unit One Shutdowns
  - A. Unit Two Shutdowns
- IV. Amendments to Facility License or Technical Specifications
- VI. Unique Reporting Requirements
  - A. Main Steam Relief Valve Operations



## I. INTRODUCTION

Quad Cities Nuclear Power Station is composed of two Boiling Water Reactors and Steam Turbine/Generators, each with a Maximum Dependable Capacity of 769 MWe Net, located in Cordova, Illinois. The Station is jointly owned by Commonwealth Edison Company and MidAmerican Energy Company. The Nuclear Steam Supply Systems are General Electric Company Boiling Water Reactors. The Architect/ Engineer was Sargent & Lundy, Incorporated, and the primary construction contractor was United Engineers & Constructors. The Mississippi River is the condenser cooling water source. The plant is subject to license numbers DPR-29 and DPR-30, issued October 1, 1971, and March 21, 1972, respectively; pursuant to Docket Numbers 50-254 and 50-265. The date of initial Reactor criticalities for Units One and Two, respectively were October 18, 1971, and April 26, 1972. Commercial generation of power began on February 18, 1973 for Unit One and March 10, 1973 for Unit Two.

This report was compiled by Lynne Hamilton and Debra Kelley, telephone number 309-654-2241, extensions 3114 and 2240, respectively.

## II. SUMMARY OF OPERATING EXPERIENCE

### A. Unit One

Quad Cities Unit One began the month of February operating at full power. Unit One operated throughout the month at full power with minor down power operations for routine maintenance and surveillance testing.

### B. Unit Two

Quad Cities Unit Two began the month of February operating at full power. On February 20, 1999, at 12:02 a.m., the main turbine was tripped and the reactor was manually shutdown for the Q2P02 scheduled surveillance outage. On February 28, 1999, at 6:14 a.m., the reactor went critical. The main generator was synchronized to the grid on March 1, 1999, at 6:44 a.m.

### III. OPERATING DATA STATISTICS

#### A. Unit One Operating Data Report for February 1999

DOCKET NO.: 50-254  
DATE: March 10, 1999  
COMPLETED BY: Lynne Hamilton  
TELEPHONE: (309) 654-2241

#### OPERATING STATUS

0000 020199

1. REPORTING PERIOD: 2400 022899 GROSS HOURS IN REPORTING PERIOD: 672  
2. CURRENTLY AUTHORIZED POWER LEVEL (MWt): 2511 MAX > DEPEND > CAPACITY: 769  
DESIGN ELECTRICAL RATING (MWe-NET): 789

	THIS MONTH	YEAR TO DATE	CUMULATIVE
3. NUMBER OF HOURS REACTOR WAS CRITICAL	672.00	1416.00	178212.70
4. REACTOR RESERVE SHUTDOWN HOURS	0.00	0.00	3421.90
5. HOURS GENERATOR ON LINE	672.00	1416.00	173011.40
6. UNIT RESERVE SHUTDOWN HOURS	0.00	0.00	909.20
7. GROSS THERMAL ENERGY GENERATED (MWH)	1689107.52	3543553.44	379292048.04
8. GROSS ELECTRICAL ENERGY GENERATED (MWH)	548505.00	1159252.00	122716595.00
9. NET ELECTRICAL ENERGY GENERATED (MWH)	525512.00	1109540.00	110407393.00
10. REACTOR SERVICE FACTOR	100.00	100.00	75.62
11. REACTOR AVAILABILITY FACTOR	100.00	100.00	77.08
12. UNIT SERVICE FACTOR	100.00	100.00	73.42
13. UNIT AVAILABILITY FACTOR	100.00	100.00	73.80
14. UNIT CAPACITY FACTOR (Using MDC)	101.69	101.90	60.93
15. UNIT CAPACITY FACTOR (Using Design Mwe)	99.11	99.31	59.38
16. UNIT FORCED OUTAGE RATE	0.00	0.00	7.03



### III. OPERATING DATA STATISTICS

#### B. Unit Two Operating Data Report for February 1999

DOCKET NO: 50-265  
DATE: March 10, 1999  
COMPLETED BY: Lynne Hamilton  
TELEPHONE: (309) 654-2241

#### OPERATING STATUS

0000 020199

1. REPORTING PERIOD: 2400 022899 GROSS HOURS IN REPORTING PERIOD: 672  
2. CURRENTLY AUTHORIZED POWER LEVEL (MWt): 2511 MAX > DEPEND > CAPACITY: 769  
DESIGN ELECTRICAL RATING (MWe-NET): 789

	THIS MONTH	YEAR TO DATE	CUMULATIVE
3. NUMBER OF HOURS REACTOR WAS CRITICAL	473.80	1217.80	170814.90
4. REACTOR RESERVE SHUTDOWN HOURS	0.00	0.00	2985.80
5. HOURS GENERATOR ON LINE	456.00	1200.00	166266.75
6. UNIT RESERVE SHUTDOWN HOURS	0.00	0.00	702.90
7. GROSS THERMAL ENERGY GENERATED (MWH)	1133241.36	2996635.68	363836718.54
8. GROSS ELECTRICAL ENERGY GENERATED (MWH)	368002.00	973387.00	116722517.00
9. NET ELECTRICAL ENERGY GENERATED (MWH)	352657.00	936365.00	110703409.00
10. REACTOR SERVICE FACTOR	70.51	86.00	72.97
11. REACTOR AVAILABILITY FACTOR	70.51	86.00	74.24
12. UNIT SERVICE FACTOR	67.86	84.75	71.03
13. UNIT AVAILABILITY FACTOR	67.86	84.75	71.33
14. UNIT CAPACITY FACTOR (Using MDC)	68.24	85.99	61.50
15. UNIT CAPACITY FACTOR (Using Design Mwe)	66.51	83.81	59.94
16. UNIT FORCED OUTAGE RATE	0.00	0.00	10.90

#### IV. UNIT SHUTDOWNS

##### A. Unit One Shutdowns for February 1999

DOCKET NO.: 50-254  
DATE: March 10, 1999  
COMPLETED BY: Lynne Hamilton  
TELEPHONE: (309) 654-2241

No.	DATE	TYPE FOR S	DURATION (HOURS)	REASON	METHOD OF SHUTTING DOWN REACTOR	CORRECTIVE ACTIONS/COMMENTS
						None for the Month of February.

#### Legend:

##### (1) Reason

- A - Equipment Failure (Explain)
- B - Maintenance or Test
- C - Refueling
- D - Regulatory Restriction
- E - Operator Training/License Examination
- F - Administrative
- G - Operational Error (Explain)
- H - Other (Explain)

##### (2) Method

- 1 - Manual
- 2 - Manual Trip/Scram
- 3 - Automatic Trip/Scram
- 4 - Continuation
- 5 - Other (Explain)



#### IV. UNIT SHUTDOWNS

##### B. Unit Two Shutdowns for February 1999

DOCKET NO.: 50-265  
DATE: March 10, 1999  
COMPLETED BY: Lynne Hamilton  
TELEPHONE: (309) 654-2241

No.	DATE	TYPE F O R S	DURATION (HOURS)	REASON	METHOD OF SHUTTING DOWN REACTOR	CORRECTIVE ACTIONS/COMMENTS
99-01	990220	S	216.0	B	2	Q2P02 Scheduled Surveillance Outage.

#### Legend:

##### (1) Reason

- A - Equipment Failure (Explain)
- B - Maintenance or Test
- C - Refueling
- D - Regulatory Restriction
- E - Operator Training/License Examination
- F - Administrative
- G - Operational Error (Explain)
- H - Other (Explain)

##### (2) Method

- 1 - Manual
- 2 - Manual Trip/Scram
- 3 - Automatic Trip/Scram
- 4 - Continuation
- 5 - Other (Explain)

## V. AMENDMENTS TO FACILITY LICENSE OR TECHNICAL SPECIFICATIONS

Technical Specification Amendment No. 183 was issued on February 8, 1999 to Facility Operating License No. DPR-29 and Amendment No. 180 to Facility Operating License No. DPR-30 for Quad Cities Nuclear Power Station, Units 1 and 2, respectively.

The amendments relocate the requirement to remove Reactor Protection System (RPS) shorting links to the Updated Final Safety Analysis Report (UFSAR). Currently, the Technical Specifications (TSs) require the shorting links to be removed from the RPS circuitry prior to and during the time any control rod is withdrawn unless adequate SHUTDOWN MARGIN (SDM) has been demonstrated and the "one-rod-out" Refuel mode switch interlock has been demonstrated OPERABLE (an exception exists that allows shorting links to remain installed while in MODE 5 for control rod removal per Specification 3.10.I and 3.10.J). Removal of the shorting links enables a non-coincident scram based on high neutron flux as detected by any neutron monitor. The changes affect TS Sections 3/4.1.A "Reactor Protection System (RPS)", 3/4.10.B, "Refueling Operations, Instrumentation," and 3/4.12.B, "SHUTDOWN MARGIN Demonstrations."

## VI. UNIQUE REPORTING REQUIREMENTS

The following items are included in this report based on the requirements set forth in Technical Specification 6.9.A.5.

### A. Main Steam Relief Valve Operations

Relief valve operations during the reporting period are summarized in the following table. The table includes information as to which relief valve was actuated, how it was actuated, and the circumstances resulting in its actuation.

Unit: Two

Date: February 28, 1999

<u>Valve Actuated:</u>	<u>No. &amp; Type of Actuation:</u>
------------------------	-------------------------------------

2-0203-3A	1 Manual
-----------	----------

Plant Conditions: Reactor Pressure – 320 psig

Description of Events: QCOS 0203-03 "Main Steam Relief Valve Operability Test".  
The valve was tested due to replacement during Q2P02.