

OPERATING DATA REPORT

DOCKET NO. 50-315
 DATE 3-2-82
 COMPLETED BY W. T. Gillett
 TELEPHONE 616-465-5901

OPERATING STATUS

1. Unit Name: Donald C. Cook 1
2. Reporting Period: February 1982
3. Licensed Thermal Power (MWt): 3250
4. Nameplate Rating (Gross MWe): 1089
5. Design Electrical Rating (Net MWe): 1054
6. Maximum Dependable Capacity (Gross MWe): 1080
7. Maximum Dependable Capacity (Net MWe): 1044
8. If Changes Occur in Capacity Ratings (Items Number 3 Through 7) Since Last Report. Give Reasons:

Notes

9. Power Level To Which Restricted, If Any (Net MWe):
10. Reasons For Restrictions, If Any:

	This Month	Yr.-to-Date	Cumulative
11. Hours In Reporting Period	672	1416	62,784
12. Number Of Hours Reactor Was Critical	0	503.2	46,776.4
13. Reactor Reserve Shutdown Hours	0	0	463
14. Hours Generator On-Line	0	496.8	45,719.0
15. Unit Reserve Shutdown Hours	0	0	321
16. Gross Thermal Energy Generated (MWH)	0	1,569,517	131,932,706
17. Gross Electrical Energy Generated (MWH)	0	525,490	43,407,270
18. Net Electrical Energy Generated (MWH)	0	507,243	41,747,921
19. Unit Service Factor	0	35.1	75.4
20. Unit Availability Factor	0	35.1	75.4
21. Unit Capacity Factor (Using MDC Net)	0	34.3	67.8
22. Unit Capacity Factor (Using DER Net)	0	34.0	64.3
23. Unit Forced Outage Rate	100	64.8	8.4
24. Shutdowns Scheduled Over Next 6 Months (Type, Date, and Duration of Each):			
Refueling June-July 1982			

25. If Shut Down At End Of Report Period, Estimated Date of Startup:

26. Units In Test Status (Prior to Commercial Operation):

Forecast

Achieved

INITIAL CRITICALITY
 INITIAL ELECTRICITY
 COMMERCIAL OPERATION

AVERAGE DAILY UNIT POWER LEVEL

DOCKET NO. 50-315

UNIT 1

DATE 3-2-82

COMPLETED BY W. T. Gillett

TELEPHONE 616-465-5901

MONTH February 1982

DAY AVERAGE DAILY POWER LEVEL
 (MWe-Net)

1	0
2	
3	
4	
5	
6	
7	
8	
9	
10	
11	
12	
13	↓
14	
15	
16	

DAY AVERAGE DAILY POWER LEVEL
 (MWe-Net)

17	0
18	
19	
20	
21	
22	
23	
24	
25	
26	
27	
28	
29	↓
30	
31	

INSTRUCTIONS

On this format list the average daily unit power level in MWe-Net for each day in the reporting month. Compute to the nearest whole megawatt.

UNIT SHUTDOWNS AND POWER REDUCTIONS

REPORT MONTH February, 1982

DOCKET NO. 50-315
 UNIT NAME D.C. Cook - Unit 1
 DATE 3-9-82
 COMPLETED BY B.A. Svensson
 TELEPHONE (616) 465-5901
 PAGE 1 of 1

No.	Date	Type ¹	Duration (Hours)	Reason ²	Method of Shutting Down Reactor ³	Licensee Event Report #	System Code ⁴	Component Code ⁵	Cause & Corrective Action to Prevent Recurrence
179 Cont'd.	820131	F	672	A	3	N.A.	HA	Turbin	Turbine repair outage continued from previous month. At the end of the month the RCS had been filled and vented and ready for heatup and the turbine reassembly was in its final stages.

¹
 F: Forced
 S: Scheduled

²
 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)

³
 Method:
 1-Manual
 2-Manual Scram.
 3-Automatic Scram.
 4-Other (Explain)

⁴
 Exhibit G - Instructions
 for Preparation of Data
 Entry Sheets for Licensee
 Event Report (LER) File (NUREG-
 0161)

⁵
 Exhibit I - Same Source

UNIT SHUTDOWNS AND POWER REDUCTIONS

INSTRUCTIONS

This report should describe all plant shutdowns during the report period. In addition, it should be the source of explanation of significant dips in average power levels. Each significant reduction in power level (greater than 20% reduction in average daily power level for the preceding 24 hours) should be noted, even though the unit may not have been shut down completely¹. For such reductions in power level, the duration should be listed as zero, the method of reduction should be listed as 4 (Other), and the Cause and Corrective Action to Prevent Recurrence column should explain. The Cause and Corrective Action to Prevent Recurrence column should be used to provide any needed explanation to fully describe the circumstances of the outage or power reduction.

NUMBER. This column should indicate the sequential number assigned to each shutdown or significant reduction in power for that calendar year. When a shutdown or significant power reduction begins in one report period and ends in another, an entry should be made for both report periods to be sure all shutdowns or significant power reductions are reported. Until a unit has achieved its first power generation, no number should be assigned to each entry.

DATE. This column should indicate the date of the start of each shutdown or significant power reduction. Report as year, month, and day. August 14, 1977 would be reported as 770814. When a shutdown or significant power reduction begins in one report period and ends in another, an entry should be made for both report periods to be sure all shutdowns or significant power reductions are reported.

TYPE. Use "F" or "S" to indicate either "Forced" or "Scheduled," respectively, for each shutdown or significant power reduction. Forced shutdowns include those required to be initiated by no later than the weekend following discovery of an off-normal condition. It is recognized that some judgment is required in categorizing shutdowns in this way. In general, a forced shutdown is one that would not have been completed in the absence of the condition for which corrective action was taken.

DURATION. Self-explanatory. When a shutdown extends beyond the end of a report period, count only the time to the end of the report period and pick up the ensuing down time in the following report periods. Report duration of outages rounded to the nearest tenth of an hour to facilitate summation. The sum of the total outage hours plus the hours the generator was on line should equal the gross hours in the reporting period.

REASON. Categorize by letter designation in accordance with the table appearing on the report form. If category H must be used, supply brief comments.

METHOD OF SHUTTING DOWN THE REACTOR OR REDUCING POWER. Categorize by number designation

in accordance with the table appearing on the report form. If category 4 must be used, supply brief comments.

LICENSEE EVENT REPORT =. Reference the applicable reportable occurrence pertaining to the outage or power reduction. Enter the first four parts (event year, sequential report number, occurrence code and report type) of the five part designation as described in Item 17 of Instructions for Preparation of Data Entry Sheets for Licensee Event Report (LER) File (NUREG-0161). This information may not be immediately evident for all such shutdowns, of course, since further investigation may be required to ascertain whether or not a reportable occurrence was involved.) If the outage or power reduction will not result in a reportable occurrence, the positive indication of this lack of correlation should be noted as not applicable (N/A).

SYSTEM CODE. The system in which the outage or power reduction originated should be noted by the two digit code of Exhibit G - Instructions for Preparation of Data Entry Sheets for Licensee Event Report (LER) File (NUREG-0161).

Systems that do not fit any existing code should be designated XX. The code ZZ should be used for those events where a system is not applicable.

COMPONENT CODE. Select the most appropriate component from Exhibit I - Instructions for Preparation of Data Entry Sheets for Licensee Event Report (LER) File (NUREG-0161), using the following criteria:

- A. If a component failed, use the component directly involved.
- B. If not a component failure, use the related component: e.g., wrong valve operated through error: list valve as component.
- C. If a chain of failures occurs, the first component to malfunction should be listed. The sequence of events, including the other components which fail, should be described under the Cause and Corrective Action to Prevent Recurrence column.

Components that do not fit any existing code should be designated XXXXXX. The code ZZZZZZ should be used for events where a component designation is not applicable.

CAUSE & CORRECTIVE ACTION TO PREVENT RECURRENCE. Use the column in a narrative fashion to amplify or explain the circumstances of the shutdown or power reduction. The column should include the specific cause for each shutdown or significant power reduction and the immediate and contemplated long term corrective action taken, if appropriate. This column should also be used for a description of the major safety-related corrective maintenance performed during the outage or power reduction including an identification of the critical path activity and a report of any single release of radioactivity or single radiation exposure specifically associated with the outage which accounts for more than 10 percent of the allowable annual values.

For long textual reports continue narrative on separate paper and reference the shutdown or power reduction for this narrative.

¹Note that this differs from the Edison Electric Institute (EEI) definitions of "Forced Partial Outage" and "Scheduled Partial Outage." For these terms, EEI uses a change of 30 MW as the break point. For larger power reactors, 30 MW is too small a change to warrant explanation.

Docket No.: 50-315
Unit Name: D. C. Cook Unit #1
Completed By: C. E. Murphy
Telephone: (616) 465-5901
Date: March 9, 1982
Page: 1 of 1

MONTHLY OPERATING ACTIVITIES - FEBRUARY, 1982

Highlights:

The Unit entered this reporting period shutdown due to a turbine vibration trip which occurred at 0641 on January 31, 1982. Mode 4 was entered at 0700 hours on February 1, 1982, and Mode 5 was entered at 1113 hours on February 2, 1982. The vibration was found to have been caused by a first stage blading problem in the High Pressure Turbine. The Unit was drained to $\frac{1}{2}$ loop while modifications were made on two of the Reactor Coolant Pumps and various other packing leaks were repaired.

At 0919 hours on February 18, 1982, a "blackout" of the Unit occurred when, while in backfeed, the "K" breaker opened when the disconnects for "K-1" was opened. The Diesel Generators started and loaded automatically. Station loads were transferred manually to normal reserve transformers. The cause of the event was found to be an improperly wired socket in the Relay Rack Power Supply. The socket wiring has been corrected and confirmation is currently being made that this has corrected the cause. The expected completion date is March 12, 1982.

Total electrical generation for this month was 0.

DOCKET NO.	50 - 315
UNIT NAME	D. C. Cook - Unit No. 1
DATE	3-9-82
COMPLETED BY	B. A. Svensson
TELEPHONE	(616) 465-5901
PAGE	1 of 1

MAJOR SAFETY-RELATED MAINTENANCE

FEBRUARY, 1982

- M-1 Isolation valve from No. 1 boric acid pump to the middle boric acid storage tank, CS-417-1, had a body-to-bonnet leak. Replaced the valve diaphragm.
- M-2 Excess letdown isolation valve, QRV-114, had a body-to-bonnet leak. Repaired leak, repacked valve and had it tested.
- M-3 The inlet flange for SV-52, low pressure letdown safety valve, was leaking. Replaced the flex gasket.
- M-4 The ESW safety valve for the east CTS heat exchanger, SV-14, was leaking by. Lapped the valve seat and disc and had the valve tested.
- M-5 No. 1 boric acid transfer pump discharge check valve, CS-415-1, was leaking by. Replaced the check valve and had necessary NDE performed. Also completed hydrostatic test.
- M-6 Loop 4 feedwater check valve, FW-118-4, had a leak at the hinge pin cover plate to body joint. The valve was temporarily repaired by Furmanite injection. The final repair consisted of lapping the cover plate gasket surface and replacing the gasket.
- M-7 The east centrifugal charging pump outboard end mechanical seal failed. Replaced the mechanical seal, shaft sleeve, runner, gaskets and o-rings. Had the pump tested.
- M-8 Nondestructive examination indicated a possibility of wall thinning on the essential service water pipe at the outlet of the west component cooling water heat exchanger. A 36" section of pipe, flange and elbow at the outlet side of shutoff valve WMO-737 was replaced. Applicable NDE was performed and a hydrostatic test was completed.
- C&I-1 Containment air temperature recorders had point 10 erratic. The RTD (ETR-020) was replaced and correct operation verified.
- C&I-2 Repaired control air leak on XRV-227 CD diesel starting air valve. A new diaphragm was installed and operation verified.
- C&I-3 The blue pen on the humidity recorder was reading high. Investigation revealed the balance pot to be dirty, this was cleaned. The investigation also revealed that the pump was bad, it was replaced and the unit readjusted and balanced and correct operation was verified.
- C&I-4 CD diesel jacket water surge tank make-up float valve failed open. The problem was found to be in the float which was separated from the lift rod. The float was replaced and proper operation was verified.