Docket Nos. 50-315
and 50-316

April 11, 1989

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Mr. Milton P. Alexich, Vice President
Indiana Michigan Power Company
c/o American Electric Power Service Corporation
1 Riverside Plaza
Columbus, Ohio 43216

Dear Mr. Alexich:

SUBJECT: AMENDMENTS NOS. 123 AND 110 TO FACILITY OPERATING LICENSES NOS. DPR-58 AND DPR-74:
(TACS NOS. 68056/68057)

The Commission has issued the enclosed Amendment No. 123 to Facility Operating License No. DPR-58 and Amendment No. 110 to Facility Operating License No. DPR-74 for the Donald C. Cook Nuclear Plant, Units Nos. 1 and 2. The amendments consist of changes to the Technical Specifications in response to your applications dated January 16, 1987 and April 29, 1988.

These amendments will change the surveillance requirements for the station batteries (including the N-train batteries) to allow the use of simulated loads for testing battery capacity. The original application for amendment dated January 16, 1987 was split into two separate amendment applications with the application dated April 29, 1988. The remaining portion of the January 16, 1987 application will be addressed at a later date.

A copy of our related Safety Evaluation is also enclosed. Notice of Issuance will be included in the Commission's biweekly Federal Register notice.

Sincerely,

/s/

John F. Stang, Project Manager
Project Directorate III-1
Division of Reactor Projects - III, IV, V
& Special Projects

Enclosures:
1. Amendment No. 123 to DPR-58
2. Amendment No. 110 to DPR-74
3. Safety Evaluation

cc w/enclosures:
See next page

LA/PD31:DRSP	PM/PD31:DRSP	PM/PD31:DRSP	(A)D/PD31:DRSP	OGC
PShuttleworth	AGody	JStang:cr	TQuay	SHLewis
4/11/89	4/11/89	4/11/89	4/11/89	4/11/89

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UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D. C. 20555

April 11, 1989

Dockets Nos. 50-315
and 50-316

Mr. Milton P. Alexich, Vice President
Indiana Michigan Power Company
c/o American Electric Power Service Corporation
1 Riverside Plaza
Columbus, Ohio 43216

Dear Mr. Alexich:

SUBJECT: AMENDMENTS NOS.123 AND 110TO FACILITY OPERATING LICENSES NOS. DPR-58 AND DPR-74:
(TACS NOS. 68056/68057)

The Commission has issued the enclosed Amendment No.123 to Facility Operating License No. DPR-58 and Amendment No.110 to Facility Operating License No. DPR-74 for the Donald C. Cook Nuclear Plant, Units Nos. 1 and 2. The amendments consist of changes to the Technical Specifications in response to your applications dated January 16, 1987 and April 29, 1988.

These amendments will change the surveillance requirements for the station batteries (including the N-train batteries) to allow the use of simulated loads for testing battery capacity. The original application for amendment dated January 16, 1987 was split into two separate amendment applications with the application dated April 29, 1988. The remaining portion of the January 16, 1987 application will be addressed at a later date.

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Sincerely,

John F. Stang, Project Manager
Project Directorate III-1
Division of Reactor Projects - III, IV, V
& Special Projects

Enclosures:
1. Amendment No.123 to DPR-58
2. Amendment No.110 to DPR-74
3. Safety Evaluation

cc w/enclosures:
See next page

Mr. Milton Alexich
Indiana Michigan Power Company

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UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D. C. 20555

INDIANA MICHIGAN POWER COMPANY

DOCKET NO. 50-315

DONALD C. COOK NUCLEAR PLANT, UNIT NO. 1

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No.123
License No. DPR-58

1. The Nuclear Regulatory Commission (the Commission) has found that:

   A. The applications for amendment by Indiana Michigan Power Company (the licensee) dated Janauary 16, 1987 and April 29, 1988, comply with the standards and requirements of the Atomic Energy Act of 1954, as amended (the Act), and the Commission's rules and regulations set forth in 10 CFR Chapter I;

   B. The facility will operate in conformity with the application, the provisions of the Act, and the rules and regulations of the Commission;

   C. There is reasonable assurance (i) that the activities authorized by this amendment can be conducted without endangering the health and safety of the public, and (ii) that such activities will be conducted in compliance with the Commission's regulations;

   D. The issuance of this amendment will not be inimical to the common defense and security or to the health and safety of the public; and

   E. The issuance of this amendment is in accordance with 10 CFR Part 51 of the Commission's regulations and all applicable requirements have been satisfied.

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2. Accordingly, the license is amended by changes to the Technical Specifications as indicated in the attachment to this license amendment, and paragraph 2.C.(2) of Facility Operating License No. DPR-58 is hereby amended to read as follows:

   Technical Specifications

   The Technical Specifications contained in Appendices A and B, as revised through Amendment No. 123 , are hereby incorporated in the license. The licensee shall operate the facility in accordance with the Technical Specifications.

3. This license amendment is effective as of the date of its issuance.

FOR THE NUCLEAR REGULATORY COMMISSION

Theodore R Quay

Theodore R. Quay, Acting Director
Project Directorate III-1
Division of Reactor Projects - III, IV, V
& Special Projects

Attachment:
Changes to the Technical
Specifications

Date of Issuance: April 11, 1989

ATTACHMENT TO LICENSE AMENDMENTS

AMENDMENT NO. 123 TO FACILITY OPERATING LICENSE NO. DPR-58

DOCKET NO. 50-315

Revise Appendix A Technical Specifications by removing the pages identified below and inserting the attached pages. The revised pages are identified by amendment number and contain marginal lines indicating the area of change.

REMOVE	INSERT
3/4 8-9 and 8-10	3/4 8-9 and 8-10
3/4 8-14	3/4 8-14

SURVEILLANCE REQUIREMENTS (Continued)

2. The pilot cell specific gravity, corrected to 77°F and full electrolyte level (fluid at the bottom of the maximum level indication mark), is ≥ 1.200,

3. The pilot cell voltage is ≥ 2.10 volts, and

4. The overall battery voltage is ≥ 250 volts.

b. At least once per 92 days by verifying that:

1. The voltage of each connected cell is ≥ 2.10 volts under float charge and has not decreased more than 0.05 volts from the value observed during the original acceptance test, and

2. The specific gravity, corrected to 77°F and full electrolyte level (fluid at the bottom of the maximum level indication mark), of each connected cell is ≥ 1.200 and has not decreased more than 0.03 from the value observed during the previous test, and

3. The electrolyte level of each connected cell is between the top of the minimum level indication mark and the bottom of the maximum level indication mark.

c. At least once per 18 months by verifying that:

1. The cells, cell plates and battery racks show no visual indication of physical damage or abnormal deterioration.

2. The cell-to-cell and terminal connections are clean, tight, free of corrosion and coated with anti-corrosion material.

3. The battery charger will supply at least 140 amperes at ≥ 250 volts for at least 4 hours.

d. At least once per 18 months, during shutdown (MODES 5 or 6), by verifying that the battery capacity is adequate to supply and maintain in OPERABLE status the actual or simulated emergency loads for the times specified in Table 4.8-1A with the battery charger disconnected. The battery terminal voltage shall be maintained ≥ 210 volts throughout the battery service test.*

e. At least once per 60 months, during shutdown (MODES 5 or 6), by verifying that the battery capacity is at least 80% of the manufacturer's rating when subjected to a performance discharge test. This performance discharge test shall be performed in place of the battery service test.

*The provisions of Specification 4.0.6 are applicable.

TABLE 4.8-1A
BATTERY EMERGENCY LOADS

AB Battery Loads	Minimum Time
1. Channel III static inverter	3 hrs
2. Channel IV static inverter	3 hrs
3. Computer static inverter*	3 hrs
4. Feed pump turbine 1E oil pump	1 hr
5. Control room emergency lighting	8 hrs
6. Main turbine backup oil pump	3 hrs
7. Isolation valve control	8 hrs
8. All control circuits	8 hrs
CD Battery Loads	
1. Channel I static inverter	3 hrs
2. Channel II static inverter	3 hrs
3. BOP static inverter*	3 hrs
4. Feed pump turbine 1W oil pump	1 hr
5. Generator seal oil pump	8 hrs
6. Turbine emergency oil pump	3 hrs
7. Isolation valves	8 hrs
8. Annunciators	8 hrs
9. All control circuits	8 hrs

* AC power sources to the inverters shall be turned off at the start of the test and may be turned on at the end of the specific time interval. Inverters may be left in this operating mode for the duration of the discharge test.

SURVEILLANCE REQUIREMENTS (Continued)

2. The pilot cell specific gravity, corrected to 77°F and full electrolyte level (fluid at the bottom of the maximum level indication mark), is ≥ 1.200,

3. The pilot cell voltage is ≥ 2.10 volts, and

4. The overall battery voltage is ≥ 250 volts.

b. At least once per 92 days by verifying that:

1. The voltage of each connected cell is ≥ 2.10 volts under float charge and has not decreased more than 0.05 volts from the value observed during the original acceptance test, and

2. The specific gravity, corrected to 77°F and full electrolyte level (fluid at the bottom of the maximum level indication mark), of each connected cell is ≥ 1.200 and has not decreased more than 0.03 from the value observed during the previous test, and

3. The electrolyte level of each connected cell is between the top of the minimum level indication mark and the bottom of the maximum level indication mark.

c. At least once per 18 months by verifying that:

1. The cells, cell plates and battery racks show no visual indication of physical damage or abnormal deterioration.

2. The cell-to-cell and terminal connections are clean, tight, free of corrosion and coated with anti-corrosion material.

3. The battery charger will supply at least 10 amperes at ≥ 250 volts for at least 4 hours.

d. At least once per 18 months, during shutdown (MODES 5 or 6), by verifying that the battery capacity is adequate to supply and maintain in OPERABLE status the actual or simulated emergency loads for the times specified in Table 4.8-2 with the battery charger disconnected. The battery terminal voltage shall be maintained ≥ 210 volts throughout the battery service test.*

e. At least once per 60 months, during shutdown (MODES 5 or 6), by verifying that the battery capacity is at least 80% of the manufacturer's rating when subjected to a performance discharge test. This performance discharge test shall be performed in place of the battery service test.

*The provisions of Specification 4.0.6 are applicable.

UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D. C. 20555

INDIANA MICHIGAN POWER COMPANY

DOCKET NO. 50-316

DONALD C. COOK NUCLEAR PLANT, UNIT NO. 2

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 110
License No. DPR-74

1. The Nuclear Regulatory Commission (the Commission) has found that:

   A. The applications for amendment by Indiana Michigan Power Company (the licensee) dated January 16, 1987, and April 29, 1988, comply with the standards and requirements of the Atomic Energy Act of 1954, as amended (the Act), and the Commission's rules and regulations set forth in 10 CFR Chapter I;

   B. The facility will operate in conformity with the application, the provisions of the Act, and the rules and regulations of the Commission;

   C. There is reasonable assurance (i) that the activities authorized by this amendment can be conducted without endangering the health and safety of the public, and (ii) that such activities will be conducted in compliance with the Commission's regulations;

   D. The issuance of this amendment will not be inimical to the common defense and security or to the health and safety of the public; and

   E. The issuance of this amendment is in accordance with 10 CFR Part 51 of the Commission's regulations and all applicable requirements have been satisfied.

2. Accordingly, the license is amended by changes to the Technical Specifications as indicated in the attachment to this license amendment, and paragraph 2.C.(2) of Facility Operating License No. DPR-74 is hereby amended to read as follows:

   Technical Specifications

   The Technical Specifications contained in Appendices A and B, as revised through Amendment No. 110 , are hereby incorporated in the license. The licensee shall operate the facility in accordance with the Technical Specifications.

3. This license amendment is effective as of the date of its issuance.

FOR THE NUCLEAR REGULATORY COMMISSION

Theodore R. Quay

Theodore R. Quay, Acting Director
Project Directorate III-1
Division of Reactor Projects - III, IV, V
& Special Projects

Attachment:
Changes to the Technical
Specifications

Date of Issuance: April 11, 1989

ATTACHMENT TO LICENSE AMENDMENTS

AMENDMENT NO. 110 TO FACILITY OPERATING LICENSE NO. DPR-74

DOCKET NO. 50-316

Revise Appendix A Technical Specifications by removing the pages identified below and inserting the attached pages. The revised pages are identified by amendment number and contain marginal lines indicating the area of change.

REMOVE	INSERT
3/4 8-9 and 8-10	3/4 8-9 and 8-10
3/4 8-13	3/4 8-13

SURVEILLANCE REQUIREMENTS (Continued)

2. The pilot cell specific gravity, corrected to 77°F and full electrolyte level (fluid at the bottom of the maximum level indication mark), is ≥ 1.200,

3. The pilot cell voltage is ≥ 2.10 volts, and

4. The overall battery voltage is ≥ 250 volts.

b. At least once per 92 days by verifying that:

1. The voltage of each connected cell is ≥ 2.10 volts under float charge and has not decreased more than 0.05 volts from the value observed during the original acceptance test, and

2. The specific gravity, corrected to 77°F and full electrolyte level (fluid at the bottom of the maximum level indication mark), of each connected cell is ≥ 1.200 and has not decreased more than 0.03 from the value observed during the previous test, and

3. The electrolyte level of each connected cell is between the top of the minimum level indication mark and the bottom of the maximum level indication mark.

c. At least once per 18 months by verifying that:

1. The cells, cell plates and battery racks show no visual indication of physical damage or abnormal deterioration.

2. The cell-to-cell and terminal connections are clean, tight, free of corrosion and coated with anti-corrosion material.

3. The battery charger will supply at least 140 amperes at ≥ 250 volts for at least 4 hours.

d. At least once per 18 months, during shutdown (MODES 5 or 6), by verifying that the battery capacity is adequate to supply and maintain in OPERABLE status the actual or simulated emergency loads for the times specified in Table 4.8-1A with the battery charger disconnected. The battery terminal voltage shall be maintained ≥ 210 volts throughout the battery service test.

e. At least once per 60 months, during shutdown (MODES 5 or 6), by verifying that the battery capacity is at least 80% of the manufacturer's rating when subjected to a performance discharge test. This performance discharge test shall be performed in place of the battery service test.

TABLE 4.8-1A
BATTERY EMERGENCY LOADS

AB Battery Loads		Minimum Time
1.	Channel III static inverter	3 hrs
2.	Channel IV static inverter	3 hrs
3.	Computer static inverter*	3 hrs
4.	BOP Static Inverter*	3 hrs
5.	Feed pump turbine 2E oil pump	1 hr
6.	Control room emergency lighting	8 hrs
7.	Main turbine oil pump "E"	3 hrs
8.	Isolation valve control	8 hrs
9.	All control circuits	8 hrs
CD Battery Loads		
1.	Channel I static inverter	3 hrs
2.	Channel II static inverter	3 hrs
3.	Feed pump turbine 2W oil pump	1 hr
4.	Generator seal oil pump	5 hrs
5.	Main turbine oil pump "W"	3 hrs
6.	Isolation valves	8 hrs
7.	Annunciators	8 hrs
8.	All control circuits	8 hrs

* AC power sources to the inverters shall be turned off at the start of the test and may be turned on at the end of the specific time interval. Inverters may be left in this operating mode for the duration of the discharge test.

2. The pilot cell specific gravity, corrected to 77°F and full electrolyte level (fluid at the bottom of the maximum level indication mark), is ≥ 1.200.

3. The pilot cell voltage is ≥ 2.10 volts, and

4. The overall battery voltage is ≥ 250 volts.

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3. The electrolyte level of each connected cell is between the top of the minimum level indication mark and the bottom of the maximum level indication mark.

c. At least once per 18 months by verifying that:

1. The cells, cell plates and battery racks show no visual indication of physical damage or abnormal deterioration.

2. The cell-to-cell and terminal connections are clean, tight, free of corrosion and coated with anti-corrosion material,

3. The battery charger will supply at least 10 amperes at ≥ 250 volts for at least 4 hours.

d. At least once per 18 months, during shutdown (MODES 5 or 6), by verifying that the battery capacity is adequate to supply and maintain in OPERABLE status the actual or simulated emergency loads for the times specified in Table 4.8-2 with the battery charger disconnected. The battery terminal voltage shall be maintained ≥ 210 volts throughout the battery service test.

e. At least once per 60 months, during shutdown (MODES 5 or 6), by verifying that the battery capacity is at least 80% of the manufacturer's rating when subjected to a performance discharge test. This performance discharge test shall be performed in place of the battery service test.

UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D. C. 20555

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION

RELATED TO AMENDMENT NO. 123 TO FACILITY OPERATING LICENSE NO. DPR-58

AND AMENDMENT NO. 110 TO FACILITY OPERATING LICENSE NO. DPR-74

INDIANA MICHIGAN POWER COMPANY

DONALD C. COOK NUCLEAR PLANT, UNITS NOS. 1 AND 2

DOCKETS NOS. 50-315 AND 50-316

1.0 INTRODUCTION

By letter dated January 16, 1987, the Indiana Michigan Power Company (the licensee) requested an amendment to the Technical Specifications (TSs) appended to Facility Operating Licenses Nos. DPR-58 and DPR-74 for the Donald C. Cook Nuclear Plant, Units Nos. 1 and 2. The proposed amendment would change the surveillance requirements for the station batteries (including the N-train batteries) to allow the use of simulated loads for testing battery capacity. This simulated load testing change was resubmitted, separately, in a letter dated April 29, 1988. The change was resubmitted in order to ensure timely compliance with an INPO commitment and to reduce outage time. Additional changes to Technical Specifications in the April 29, 1988 letter include allowing simulated loads for testing the N-train batteries in addition to the station batteries.

This application was originally noticed on February 26, 1987 (52 FR 5857) and was renoticed on July 29, 1987 (52 FR 28380), and December 30, 1987 (52 FR 49227).

The no significant hazards finding for station battery testing remains as in the original January 16, 1987 amendment application. The basis for the no significant hazards finding is the fact that the testing of battery and inverter capacity with simulated loads is acceptable and equivalently conservative for all of the station batteries (including the N-train batteries). The April 29, 1988 application for amendment does not change the finding of no significant hazards.

2.0 EVALUATION

2.1 Objectives

The objective of the surveillance of the D. C. distribution system and its associated batteries and battery chargers is to ensure sufficient capacity and capability of the onsite D.C. power system to meet its safety function. Portions of the surveillance verify the ability of the batteries and associated chargers to provide sufficient power for maximum accident load profiles.

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2.2 Station Battery Tester

The staff believes that the use of the Battery Tester constitutes an equivalent method of testing battery and inverter capacity. The TS changes reflect more closely to the Standard Westinghouse TS (STS) (NUREG-0452, Rev. 4), which allow the use of simulated loads.

2.3 Technical Specifications

The proposed TS changes allow the use of simulated loads for all of the emergency battery loads. Specifications 4.8.2.3.2.d and 4.8.2.5.2.d allow the use of either actual or simulated emergency loads during battery capacity testing. Additionally the double asterisks and the associated footnote from Table 4.8-1A were deleted. This footnote allowed the use of either actual or simulated loads for the inverters during battery testing. This footnote is no longer necessary since specification 4.8.2.3.2.d has been changed to allow the use of either actual or simulated loads for all of the battery loads.

2.4 Conclusion

The staff concludes that the use of simulated loads for battery and associated inverter capacity testing:

(1) Provide a more controlled and relatively accurate maximum accident load profile; and

(2) Do not alter the objectives of the surveillance testing of station battery and associated charger capacities.

Therefore, the proposed TS changes are acceptable.

3.0 ENVIRONMENTAL CONSIDERATION

These amendments involve a change in the installation or use of a facility component located within the restricted area as defined in 10 CFR Part 20 and a change to the surveillance requirements. We have determined that the amendments involve no significant increase in the amounts, and no significant change in the types, of any effluents that may be released offsite and that there is no significant increase in individual or cumulative occupational radiation exposure. The Commission has previously issued a proposed finding that this amendment involves no significant hazards consideration and there has been no public comment on such finding. Accordingly, this amendment meets the eligibility criteria for categorical exclusion set forth in 10 CFR 51.22(c)(9). Pursuant to 10 CFR 51.22(b), no environmental impact statement or environmental assessment need be prepared in connection with the issuance of this amendment.

4.0 CONCLUSION

We have concluded, based on the considerations discussed above, that (1) there is reasonable assurance that the health and safety of the public will not be endangered by operation in the proposed manner, and (2) such activities will be conducted in compliance with the Commission's regulations, and the issuance of the amendment will not be inimical to the common defense and security or to the health and safety of the public.

Date: April 11, 1989

Principal Contributor: A. Gody