FEB 0 7 1983

3 ⁽²)

Docket Nos. 50-315 and 50-316

Mr. John Dolan, Vice President Indiana and Michigan Electric Company Post Office Box 18 Bowling Green Station New York, New York 10004 DISTRIBUTION Docket RDiggs NRC PDR Gray L PDR NSIC ORB#1 Rdg DEisenhut **OELD** JMTaylor ELJordan LJHarmon-2 ACRS-10 CParrish DWigginton LSchneider TBarnhart-8 DBrinkman ASLAB OPA

Dear Mr. Dolan:

The Commission has issued the enclosed Amendment No. 68 to Facility Operating License No. DPR-58 and Amendment No. 50 to Facility Operating License No. DPR-74 for the Donald C. Cook Nuclear Plant, Unit Nos. 1 and 2, respectively. The amendments consist of changes to the Technical Specifications in partial response to your application transmitted by letter dated August 2, 1982, as supplemented by letters dated November 23, 1982 and December 30, 1982.

These amendments change the Technical Specifications to allow a roving fire watch patrol in areas affected when automatic carbon dioxide fire suppression systems are temporarily isolated.

Copies of the Safety Evaluation and the Notice of Issuance are also enclosed.

Sincerely,

ORIGINAL SIGNERY

David L. Wigginton, Project Manager Operating Reactors Branch #1 Division of Licensing

Λ

Enclosures:

- 1. Amendment No. 68 to DPR-58
- 2. Amendment No. 50 to DPR-74
- 3. Safety Evaluation
- 4. Notice of Issuance

cc w/enclosures: See next page

8302170412 830207 PDR ADBCK 05000315 PDR				AS TUFEN MUY						
OFFICE	ORB#1:DLC	ORB	WQ-	ORB#1:DL	AÞ/	ØR:DL	OELD		· · · · · · · · · · · · · · · · · · ·	
	CParrish	DWiggi	nton:dm	Svarga	GL'a	inas (Jugat	11.	*****	
DATE	9/1/83	<u></u> %/	<u>. /83</u>	B71 /83	N//	/83	21/2	183/		
NRC FORM 318 (10-80) NRCM 0240			OFFICIAL RECORD COPY						USGPO: 1981-335-960	

Mr. John Dolan Indiana and Michigan Electric Company

cc: Mr. M. P. Alexich Assistant Vice President for Nuclear Engineering American Electric Power Service Corporation 2 Broadway New York, New York 10004

> Mr. William R. Rustem (2) Office of the Governor Room 1 - Capitol Building Lansing, Michigan 48913

Mr. Wade Schuler, Supervisor Lake Township Baroda, Michigan 49101

W. G. Smith, Jr., Plant Manager Donald C. Cook Nuclear Plant P. O. Box 458 Bridgman, Michigan 49106

U. S. Nuclear Regulatory Commission Resident Inspectors Office 7700 Red Arrow Highway Stevensville, Michigan 49127

Gerald Charnoff, Esquire Shaw, Pittman, Potts and Trowbridge 1800 M Street, N.W. Washington; D. C. 20036 Honorable James Bemenek, Mayor City of Bridgman, Michigan 49106

U.S. Environmental Protection Agency Region V Office ATTN: EIS COORDINATOR 230 South Dearborn Street Chicago, Illinois 60604

Maurice S. Reizen, M.D. Director Department of Public Health P.O. Box 30035 Lansing, Michigan 48109

William J. Scanlon, Esquire 2034 Pauline Boulevard Ann Arbor, Michigan 48103

The Honorable Tom Corcoran United States House of Representatives Washington, D. C. 20515

James G. Keppler Regional Administrator - Region III U. S. Nuclear Regulatory Commission 799 Roosevelt Road Glen Ellyn, Illinois 60137



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

INDIANA AND MICHIGAN ELECTRIC COMPANY

DOCKET NO. 50-315

DONALD C. COOK NUCLEAR PLANT UNIT NO. 1

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 68 License No. DPR-58

- 1. The Nuclear Regulatory Commission (the Commission) has found that:
 - A. The application for amendment by Indiana and Michigan Electric Company (the licensee) dated August 2, 1982, as supplemented by letters dated November 23, 1982 and December 30, 1982, complies 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.



- 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:
 - (2) Technical Specifications

The Technical Specifications contained in Appendices A and B, as revised through Amendment No. 68, 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 Steven A. Varga, Chief Operating Reactors Branch

Division of Licensing

Attachment: Changes to the Technical Specifications

Date of Issuance: February 7, 1983

ATTACHMENT TO LICENSE AMENDMENT

AMENDMENT NO. 68 TO FACILITY OPERATING LICENSE NO. DPR-58

DOCKET NO. 50-315

Revise Appendix A as follows:

Remove Pages	Insert Pages
3/4 7-47	3/4 7-47
B3/4 7-7	B3/4 7-7
B3/4 7-8	B3/4 7-8

LOW PRESSURE CO, SYSTEMS

LIMITING CONDITION FOR OPERATION

3.7.9.3 The low pressure CO₂ systems located in the greas shown in Table 3.7-6 shall be OPERABLE.

APPLICABILITY: Whenever equipment in the low pressure CO₂ protected areas is required to be OPERABLE.

ACTION:

- a. With one or more of the above required low pressure CO₂ systems isolated for personnel protection, to permit entry for routine tours, maintenance, construction or surveillance testing, verify the operability of the fire detection system as per Specification 4.3.3.7 in the affected areas(s) and establish a Roving Fire Watch Patrol (as defined in the Bases Section) in those areas affected by the isolated CO₂ system(s). In the event that the Roving Fire Watch Patrol cannot be maintained in the affected areas, then personnel must be evacuated and the CO₂ system returned to its normal condition.
- b. With one or more of the above required low pressure CO, systems inoperable, within 1 hour establish a continuous fire Watch with backup fire suppression equipment for those areas in which redundant safe shitdown systems or components could be damaged; for other areas ensure that back-up fire suppression equipment is evailable and establish an hourly fire watch patrol. Restore the system to OPERABLE status within 14 days or, in lieu of any other report required by Specification 6.9.1, prepare and submit a Special Report to the Commission pursuant to Specification 6.9.2 within the next 30 days outlining the action taken, the cause of the inoperability and the plans and schedule for restoring the system to OPERABLE status.
- c. The provisions of Specifications 3.0.3 and 3.0.4 are not applicable.

SURVEILLANCE REQUIREMENTS

4.7.9.3 Each of the above required low pressure CO₂ systems shall be demonstrated OPERABLE:

- a. At least once per 7 days by verifying the CO₂ storage tank level to be \geq 50% and pressure to be \geq 285 psig. and
- b. At least once per 18 months by verifying:
 - 1. The system valves, associated ventilation dampers and self closing fire doors actuate manually and automatically, upon receipt of a simulated actuation signal, and
 - 2. Flow from each nozzle during a "Puff Test".

D. C. COOK - UNIT 1

3/4 7-47

Amendment No. 68

lases

3/4.7.9 FIRE SUPPRESSION SYSTEMS

The OPERABILITY of the fire suppression systems ensures that adequate fire suppression capability is available to confine and extinguish fires occurring in any portion of the facility where safety related equipment is located. The fire suppression system consists of the water system, spray and/or sprinklers, CO., Halon and fire hose stations. The collective capability of the fire suppression systems is adequata to minimize potential damage to safety related equipment and is a major element in the facility fire protection program.

In the event that one or more of the required low pressure CO2 systems are isolated for personnel protection, to permit entry for routine tours, meintenance, construction or surveillance testing, the fire detection system(s) required by specification 3.3.3.7 shall be verified to be operable and a Roving Fire Watch Patrol established in the affected areas, The Roving Fire Watch Patrol(s) shall consist of one or more persons knowledgeable of the location and operation of fire fighting equipment and good fire protection/personnel safety practices such as maintenance of access and egress routes and personnel accountability measures. The functions of the Roving Fire Watch Patrol can be fulfilled by personnel involved in other tasks (e.g. an operator on tour) provided that such personnel fulfilled the above stated requirements. As a minimum, each area affected by an isolated low pressure CO, system must be visited every twenty-five (25) to thirty-five (35) minutes by the Roving Fire Watch Patrol. Such measures will provide the necessary level of fire protection while affording necessary provisions for personnel safety.

In the event that portions of the fire suppression systems are inoperable, alternate backup fire-fighting equipment is required to be made available in the affected areas until the inoperable equipment is restored to service. When the inoperable fire-fighting equipment is intended for use as a backup means of fire suppression, a longer period of time is allowed to provide an alternate means of fire-fighting than if the inoperable equipment is the primary means of fire suppression.

The surveillance requirements provide assurance that the minimum OPERABILITY requirements of the fire suppression systems are met. An allowance is made for ensuring a sufficient volume of Halon and CO. in the storage tanks by varifying either the weight, level, or pressure of the tanks.

In the event the firs suppression water system becomes inoperable. immediate corrective measures must be taken since this system provides the major fire suppression capability of the plant. The requirement for a twenty-four hour report to the Commission provides for prompt evaluation of the acceptability of the corrective measures to provide adequate fire suppression capability for the continued protection of the nuclear plant.

D. C. COOK - UNIT 1

B 3/4 7-7

3/4.7.10 PENETRATION FIRE BARRIERS

The functional integrity of the penetration fire barriers ensures that fires will be confined or adequately retarded from spreading to adjacent portions of the facility. This design feature minimizes the possibility of a single fire rapidly involving several areas of the facility prior to detection and extinguishment. The penetration fire barriers are a passive element in the facility fire protection program and are subject to periodic inspections.

During periods of time when the barriers are not functional, a continuous fire watch is required to be maintained in the vicinity of the affected barrier until the barrier is restored to functional status.

Amendment No. 68

1.



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

INDIANA AND MICHIGAN ELECTRIC COMPANY

DOCKET NO. 50-316

DONALD C. COOK NUCLEAR PLANT UNIT NO. 2

AMENDMENT TO FACILITY OPERATING LICENSE

Amendment No. 50 License No. DPR-74

- 1. The Nuclear Regulatory Commission (the Commission) has found that:
 - A. The application for amendment by Indiana and Michigan Electric Company (the licensee) dated August 2, 1982, as supplemented by letters dated November 23, 1982 and December 30, 1982, complies 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.

 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:

(2) Technical Specifications

The Technical Specifications contained in Appendices A and B, as revised through Amendment No. 50, 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 /Steven A. Varga, Chief Operating Reactors Branch #1 Division of Licensing

Attachment: Changes to the Technical Specifications

Date of Issuance: February 7, 1983

ATTACHMENT TO LICENSE AMENDMENT

AMENDMENT NO. 50 TO FACILITY OPERATING LICENSE NO. DPR-74

DOCKET NO. 50-316

Revise Appendix A as follows:

Remove Pages	Insert Pages				
3/4 7-42	3/4 7-42				
B3/4 7-6	B3/4 7-6				
B3/4 7-7	B3/4 7-7				

LOW PRESSURE CO, SYSTEMS

LIMITING CONDITION FOR OPERATION

3.7.9.3 The low pressure CO₂ systems located in the areas shown in Table 3.7-6 shall be OPERABLE.

APPLICABILITY: Whenever equipment in the low pressure CO2 protected areas is required to be OPERABLE.

ACTION:

a. With one or more of the above required low pressure CO₂ systems isolated for personnel protection, to permit entry for routine tours, maintenance, construction or surveillance testing, verify the operability of the fire detection system as per Specification 4.3.3.8 in the affected areas(s) and establish a Roving Fire Watch Patrol (as defined in the Bases Section) in those areas affected by the isolated CO₂ system(s). In the event that the Roving Fire Watch Patrol cannot be maintained in the affected areas, then personnel must be evacuated and the CO₂ system returned to its normal condition.

b. With one or more of the above required low pressure CO₂ systems inoperable, within 1 hour establish a continuous fire Watch with backup fire suppression equipment for those areas in which redundant safe shutdown systems or components could be damaged; for other areas ensure that back-up fire suppression equipment is available and establish an hourly fire watch patrol. Restore the system to OPERABLE status within 14 days or, in lieu of any other report required by Specification 6.9.1, prepare and submit a Special Report to the Commission pursuant to Specification 6.9.2 within the next 30 days outlining the action taken, the cause of the inoperability and the plans and schedule for restoring the system to OPERABLE status.

c. The provisions of Specifications 3.0.3 and 3.0.4 are not applicable.

SURVEILLANCE REQUIREMENTS

4.7.9.3 Each of the above required low pressure CO₂ systems shall be demonstrated OPERABLE:

- a. At least once per 7 days by verifying the CO₂ storage tank level to be \geq 50% and pressure to be \geq 285 psig, and
- b. At least once per 18 months by verifying:

- 1. The system valves, associated ventilation dampers and self closing fire doors actuate manually and automatically, upon receipt of a simulated actuation signal, and
- 2. Flow from each nozzle during a "Puff Test".

D. C. COOK - UNIT 2

BASES

3/4.7.8 SEALED SOURCE CONTAMINATION

The limitations on removable contamination for sources requiring leak testing, including alpha emitters, is based on 10 CFR 70.39(c) limits for plutonium. This limitation will ensure that leakage from byproduct, source, and special nuclear material sources will not exceed allowable intake values.

3/4.7.9 FIRE SUPPRESSION SYSTEMS

The OPERABILITY of the fire suppression systems ensures that adequate fire suppression capability is available to confine and extinguish fires occurring in any portion of the facility where safety related equipment is located. The fire suppression system consists of the water system, spray and/or sprinklers, CO₂, Halon and fire hose stations. The collective capability of the fire suppression systems is adequate to minimize potential damage to safety related equipment and is a major element in the facility fire protection program.

In the event that one or more of the required low pressure CO2 systems are isolated for personnel protection, to permit entry for routine tours, maintenance, construction or surveillance testing, the fire detection system(s) required by specification 3.3.3.8 shall be verified to be operable and a Roving Fire Watch Patrol established in the affected areas not occupied by workers. The Roving Fire Watch Patrol(s) shall consist of one or more persons knowledgeable of the location and operation of fire fighting equipment and good fire protection/personnel safety practicas such as maintenance of access and egress routes and personnel accountability measures. The functions of the Roving Fire Watch Patrol can be fulfilled by personnel involved in other tasks (e.g. an operator on tour) provided that such personnel fulfilled the above stated requirements. As a minimum, each area affected by an isolated low pressure CO, system must be visited every twenty-five (25) to thirty-five (35) minutes by the Roving Fire Watch Patrol. Such measures will provide the necessary level of fire protection while affording necessary provisions for personnel safety.

In the event that portions of the fire suppression systems are inoperable, alternate backup fire fighting equipment is required to be made available in the affected areas until the inoperable equipment is restored to service. When the inoperable fire-fighting equipment is intended for use as a backup means of fire suppression, a longer period of time is allowed to provide an alternate means of fire fighting than if the inoperable equipment is the primary means of fire suppression.

D. C. COOK - UNIT 2

3/4.7.9 FIRE SUPPRESSION SYSTEMS (Cont'd)

The surveillance requirements provide assurance that the minimum OPERABILITY requirements of the fire suppression systems are met. An allowance is made for ensuring a sufficient volume of Halon and CO, in the storage tanks by verifying either the weight, level, or pressure of the tanks.

In the event the fire suppression water system becomes inoperable. immediate corrective measures must be taken since this system provides the major fire suppression capability of the plant. The requirement for a twenty-four hour report to the Commission provides for prompt evaluation of the acceptability of the corrective measures to provide adequate fire suppression capability for the continued protection of the nuclear plant.

3/4.7.10 PENETRATION FIRE BARRIERS

The functional integrity of the penetration fire barriers ensures that fires will be confined or adequately retarded from spreading to adjacent portions of the facility. This design feature minimizes the possiblity of a single fire rapidly involving several areas of the facility prior to detection and extinguishment. The penetration fire barriers are a passive element in the faiclity fire protection program and are subject to periodic inspections.

During periods of time when the barriers are not functional, a continuous fire watch is required to be maintained in the vicinity of the affected barrier until the barrier is restored to functional status.

C. COOK - UNIT 2

B 3/4 7-7

Amendment No.



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

SAFETY EVALUATION BY THE OFFICE OF NUCLEAR REACTOR REGULATION RELATED TO AMENDMENT NO. ⁶⁸ TO FACILITY OPERATING LICENSE NO. DPR-58 AND AMENDMENT NO. ⁵⁰ TO FACILITY OPERATING LICENSE NO. DPR-74

INDIANA AND MICHIGAN ELECTRIC COMPANY

DONALD C. COOK NUCLEAR PLANT UNIT NOS. 1 AND 2

DOCKET NOS. 50-315 AND 50-316

Background

The standard technical specifications require that if the CO, system in a fire area is isolated for maintenance or other activities which require personnel to enter the fire area, a continuous fire watch must be established in the fire areas affected. Due to the configuration of certain plant areas, isolation of the CO, system for maintenance in one area may require the isolation of CO₂ systems in several interconnected areas to permit personnel to access the area in which the maintenance is to be performed.

Evaluation

To alleviate the need for a large number of fire watch personnel in such a case, i.e., one for each area as isolated, the licensee has proposed the use of a roving fire watch patrol that would visit each area within 25-35 minutes. We have evaluated this proposal and find that as written, a portion of the proposed changes are unacceptable i.e, the action statements that would only require establishment of a roving fire watch patrol in areas "not occupied by workers". The presence of a worker who is not a qualified fire watch does not provide adequate assurance that an effective fire watch is maintained.

By telephone call on January 10, 1983 the licensee agreed to delete the statement, "which are not occupied by workers" from the action statements, and to refer to the qualifications needed for the roving fire watch patrol in the bases section. With these changes, we find that for the spaces in question, the use of a roving fire watch patrol provides an acceptable level of safety.

In addition, the licensee letter of December 30, 1982 also proposed the use of TV cameras in high exposure areas. Subsequently, the licensee verbally withdrew this proposal. Thus, this aspect of the December 30, 1983 letter has not been evaluated.



Environmental Consideration

We have determined that the amendments do not authorize a change in effluent types or total amounts nor an increase in power level and will not result in any significant environmental impact. Having made this determination, we have further concluded that the amendments involve an action which is insignificant from the standpoint of environmental impact and, pursuant to 10 CFR $\S51.5(d)(4)$, that an environmental impact statement or negative declaration and environmental impact appraisal need not be prepared in connection with the issuance of these amendments.

Conclusion

We have concluded, based on the considerations discussed above, that: (1) because the amendments do not involve a significant increase in the probability or consequences of an accident previously evaluated, do not create the possibility of an accident of a type different from any evaluated previously, and do not involve a significant reduction in a margin of safety, the amendments do not involve a significant hazards consideration, (2) there is reasonable assurance that the health and safety of the public will not be endangered by operation in the proposed manner, and (3) such activities will be conducted in compliance with the Commission's regulations and the issuance of the amendments will not be inimical to the common defense and security or to the health and safety of the public.

Dated: February 7, 1983

- 2 -

UNITED STATES NUCLEAR REGULATORY COMMISSION DOCKET NOS. 50-315 AND 50-316 INDIANA AND MICHIGAN ELECTRIC COMPANY NOTICE OF ISSUANCE OF AMENDMENT TO FACILITY OPERATING LICENSE

The U. S. Nuclear Regulatory Commission (the Commission) has issued Amendment No. 68 to Facility Operating License No. DPR-58, and Amendment No. 50 to Facility Operating License No. DPR-74 issued to Indiana and Michigan Electric Company (the licensee), which revised Technical Specifications for operation of Donald C. Cook Nuclear Plant, Unit Nos. 1 and 2 (the facilities) located in Berrien County, Michigan. The amendments are effective as of the date of issuance.

The amendments change the Technical Specification to allow a roving fire watch patrol in areas affected when automatic carbon dioxide fire suppression systems are temporarily isolated.

The application for the amendments complies with the standards and requirements of the Atomic Energy Act of 1954, as amended (the Act), and the Commission's rules and regulations. The Commission has made appropriate findings as required by the Act and the Commission's rules and regulations in 10 CFR Chapter I, which are set forth in the license amendments. Prior public notice of these amendments was not required since the amendments do not involve a significant hazards consideration.

The Commission has determined that the issuance of these amendments will not result in any significant environmental impact and that pursuant to 10 CFR 51.5(d)(4) an environmental impact statement or negative declaration and environmental impact appraisal need not be prepared in connection with issuance of these amendments.

7590-01

7590-01

- 2 -

For further details with respect to this action, see (1) the application for amendments dated August 2, 1982, as supplemented by letters dated November 23, 1982 and December 30, 1982, (2) Amendment Nos. 68 and 50 to License Nos. DPR-58 and DPR-74, and (3) the Commission's related Safety Evaluation. All of these items are available for public inspection at the Commission's Public Document Room, 1717 H Street, N.W., Washington, D.C. and at the Maude Reston Palenske Memorial Library, 500 Market Street, St. Joseph, Michigan 49085. A copy of items (2) and (3) may be obtained upon request addressed to the U. S. Nuclear Regulatory Commission, Washington D.C. 20555, Attention: Director, Division of Licensing.

Dated at Bethesda, Maryland, this 7th day of February, 1983.

THE NUCLEAR REGULATORY COMMISSION

Operating Reactons Branch #1 Division of Licensing