UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D.C. 20555-0001

June 9, 2021

Mr. Joel P. Gebbie
Senior Vice President and Chief
Nuclear Officer
Indiana Michigan Power Company
Nuclear Generation Group
One Cook Place
Bridgman, MI 49106

SUBJECT: DONALD C. COOK NUCLEAR PLANT, UNIT 1 – REVIEW OF THE FALL 2017 STEAM GENERATOR TUBE INSPECTIONS REPORT (EPID L-2021-LRO-0018)

Dear Mr. Gebbie:

By letter dated May 22, 2018 (Agencywide Documents Access and Management System (ADAMS) Accession No. ML18145A100), Indiana Michigan Power Company (the licensee) submitted information summarizing the results of the fall 2017 steam generator (SG) inspections for the Donald C. Cook Nuclear Plant (CNP), Unit 1. This report was submitted in accordance with Technical Specification (TS) 5.6.7, "Steam Generator Tube Inspection Report."

The U.S. Nuclear Regulatory Commission (NRC) staff has completed its review of the 2017 SG tube inspection for CNP, Unit 1. Based on this review, the NRC staff concludes that the information required by TS 5.6.7 has been provided and no additional follow-up action is required at this time. A summary of the NRC staff's review is enclosed.

Please feel free to contact me at (301) 415-2855 if you have any questions or concerns.

Sincerely,

/RA/

Scott P. Wall, Senior Project Manager
Plant Licensing Branch III
Division of Operating Reactor Licensing
Office of Nuclear Reactor Regulation

Docket No. 50-315

Enclosure:
Review of the Fall 2017 Steam Generator Tube
Inspection Report

cc: Listserv

REVIEW OF THE FALL 2017 STEAM GENERATOR TUBE INSPECTION REPORT

DONALD C. COOK NUCLEAR PLANT, UNIT 1

DOCKET NO. 50-315

By letter dated May 22, 2018 (Agencywide Documents Access and Management System (ADAMS) Accession No. ML18145A100), Indiana Michigan Power Company (the licensee) submitted information summarizing the results of the fall 2017 steam generator (SG) inspections for the Donald C. Cook Nuclear Plant (CNP), Unit 1. This report was submitted in accordance with Technical Specification (TS) 5.6.7, "Steam Generator Tube Inspection Report."

CNP, Unit 1, has four Model 51R recirculating SGs, designed and fabricated by Babcock and Wilcox International. Each SG has 3,496 thermally treated Alloy 690 tubes that have a nominal outside diameter of 0.875 inches, and a nominal wall thickness of 0.049 inches. The tubes are supported by Type 410 stainless steel, lattice-grid tube supports, and flat fan bars. The tubes were hydraulically expanded at each end for the full depth of the tubesheet.

The licensee provided the scope, extent, methods, and results of their SG tube inspections, in the document referenced above. In addition, the licensee described corrective actions, such as tube plugging, taken in response to the inspection findings.

Based on the review of the information provided, the U.S. Nuclear Regulatory Commission (NRC) staff has the following observations and comments:

- The licensee performed deposit mapping (via bobbin probe examination) in SG 14 only and sludge height reporting in all four SGs.

- In SG 13, there are 48 tubes with inner diameter scratches in the expanded region that were created during manufacturing.

- The tube in row 68 column 72 (R68C72) of SG 13 had foreign object wear identified at the 6th hot-leg support (lattice-grid) that was newly identified this inspection outage. Visual inspection of the area of interest was not possible, so the tube was stabilized and plugged. In addition, the tubes in R40C10, R41C11, and R42C10, of SG 13 were stabilized and plugged due to the presence of a foreign object that was detected visually but not by eddy current examination.

- Fan bar wear is the predominant (over 95 percent) wear degradation mechanism in the four SGs. In the current outage, 2,439 of the 2,563 reported wear indications were fan bar wear; however, 2,055 of the indications were less than 20 percent through-wall and none of the fan bar wear indications were over 40 percent through-wall.

Based on a review of the information provided, the NRC staff concludes that the licensee provided the information required by CNP Unit 1 TS 5.6.7. In addition, the staff concludes that there are no technical issues that warrant follow-up action at this time since the inspections appear to be consistent with the objective of detecting potential tube degradation and the inspection results appear to be consistent with industry operating experience at similarly designed and operated units.

Enclosure

SUBJECT: DONALD C. COOK NUCLEAR PLANT, UNIT 1 – REVIEW OF THE FALL 2017 STEAM GENERATOR TUBE INSPECTIONS REPORT (EPID L-2021-LRO-0018) DATED: JUNE 9, 2021

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ADAMS Accession No.: ML21158A173 *** via e-mail** ****via memo**

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NAME	NSalgado	SWall	
DATE	06/08/2021	06/09/2021	

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