



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

April 6, 2022

LICENSEE: Union Electric Company

FACILITY: Callaway Plant, Unit No. 1

SUBJECT: SUMMARY OF FEBRUARY 28, 2022, PARTIALLY CLOSED
PRE-APPLICATION TELECONFERENCE WITH UNION ELECTRIC COMPANY
REGARDING APPROVAL TO INSERT FRAMATOME'S GAIA FUEL
ASSEMBLIES IN ITS CORE IN RELOAD QUANTITIES FOR CALLAWAY
PLANT, UNIT NO. 1 (EPID L-2022-LRM-0013)

On February 28, 2022, an Observation pre-application meeting was held between the U.S. Nuclear Regulatory Commission (NRC) staff and representatives of Union Electric Company, dba Ameren Missouri (the licensee). The purpose of the meeting was to discuss, in advance, the licensee's intent to submit a license amendment request (LAR) for approval to use Framatome's GAIA fuel in the Callaway Plant, Unit No. 1 (Callaway) core. Currently, Callaway has four lead assemblies of Framatome's GAIA fuel loaded in the core for Fuel Cycle 25 in non-limiting positions. The licensee stated it is further considering transitioning the entire core from Westinghouse to Framatome fuel and expects to make this decision late in Fuel Cycle 26 or early in Fuel Cycle 27.

This meeting for the Callaway Vendor Qualification Program was intended to discuss all the licensing analyses required to support fuel reload transition to a new vendor. A portion of the meeting was closed to public participation because proprietary information was discussed. The meeting notice and agenda, dated February 14, 2022, are available in the Agencywide Documents Access and Management System (ADAMS) at Accession No. ML22045A985. Enclosed is a list of attendees at the meeting.

During the open session of the meeting, the licensee presented meeting slides, which can be found in ADAMS at Accession No. ML22047A094. The licensee covered some background on Callaway, and discussed GAIA fuel assembly design description, operating experience with GAIA fuel assembly, and the analyses that have been performed in support of a transition to GAIA fuel. The licensee's plan is to initially install eight Framatome GAIA fuel assemblies into the Callaway core, which will include the four lead fuel assemblies as well as four additional assemblies acquired under the Callaway Vendor Qualification Program.

The licensee summarized NRC approved analysis methods and discussed the technical specification changes necessary to transition to Framatome fuel in the Callaway core. In the near term, the Callaway core will contain both Westinghouse and Framatome fuel assemblies while the eight GAIA assemblies are loaded in the core. A mixed core condition could further persist during additional transition fuel cycles if the licensee selects Framatome as its fuel vendor. Whether the licensee chooses Framatome or Westinghouse, the licensee stated that its long-term plan is to use a single fuel vendor. The requested license amendment will ensure that the technical specifications are appropriately revised after Fuel Cycle 29 to reflect whoever

is the selected fuel vendor. The licensee's presentation also included its schedule to submit the LAR on March 30, 2022, and request NRC approval prior to September 30, 2023, to support Fuel Cycle 27.

The NRC staff asked several clarifying questions on the LAR submittal schedule. The licensee stated that they are looking at the radiological consequences with change to the fuel. The licensee stated that this LAR should not have any impact on the amendment for Generic Safety Issue-191, currently under NRC review.

During the closed session of the meeting, the licensee discussed and provided further details on their proposed changes to Framatome's approved methodologies.

No regulatory decisions were made as a result of this teleconference. No members of the public identified themselves on the teleconference. Public Meeting Feedback forms were not received.

Please direct any inquiries to me at 301-415-8371, or via e-mail at Mahesh.Chawla@nrc.gov

/RA/

Mahesh L. Chawla, Project Manager
Plant Licensing Branch IV
Division Operating Reactor Licensing
Office of Nuclear Reactor Regulation

Docket No. 50-483

Enclosure:
List of Attendees

cc: Listserv

LIST OF ATTENDEES

FEBRUARY 28, 2022, PARTIALLY CLOSED PRE- APPLICATION TELECONFERENCE

WITH UNION ELECTRIC COMPANY

CALLAWAY PLANT, UNIT NO. 1

TO DISCUSS APPROVAL TO INSERT FRAMATOME'S GAIA FUEL ASSEMBLIES IN ITS

CORE IN RELOAD QUANTITIES FOR

U.S. Nuclear Regulatory Commission

D. Woodyatt
A. Sallman
M. Chawla
J. Lehning
A. Keim
A. Rau
J. Messina
R. Beaton
P. Clifford
S. Krepel

Union Electric Company

S. Banker
T. Elwood
T. Witt
S. Meyer
B. Richardson
C. Ehmke
J. Knaup
J. Vinyard
D. Pallardy
D. Rickard
J. Kovar
K. Linsenbardt
L. Russell
J. McInvale
J. Cordz

Framatome

R. Williamson
T. Gardner
C. White
G. Borza
M. Byram
G. Wissinger
K. Segard
T. Lindquist
P. Reed
B. Painter
R. Heath
M. Harris

Members of the Public

None Introduced

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 PLANT, UNIT NO. 1 (EPID L-2022-LRM-0013) DATED APRIL 6, 2022

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ADAMS Accession Nos.:

Meeting Notice: ML22045A985

Meeting Summary: ML22089A229

***via e-mail**

OFFICE	NRR/DORL/LPL4/PM	NRR/DORL/LPL4/LA*	NRR/DSS/SNSB/BC*	NRR/DSS/SFNB/BC*
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DATE	4/1/2022	4/6/2022	4/6/2022	

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