

April 12, 2000

Mr. Garry L. Randolph
Vice President and Chief Nuclear Officer
Union Electric Company
Post Office Box 620
Fulton, MO 65251

SUBJECT: REQUEST FOR INFORMATION ON MS. KAY DREY'S LETTER OF
MARCH 10, 2000 - CALLAWAY PLANT, UNIT 1 (TAC NO. MA8411)

Dear Mr. Randolph:

As project manager for the Callaway Plant, Unit 1, I received a letter from Ms. Kay Drey of University City, Missouri. Ms. Drey is seeking information about the reactor scram event at Callaway that occurred on Sunday, February 13, 2000, and the electrosleeve amendment that was issued as Amendment No. 132 on May 21, 1999. The letter is enclosed.

Ms. Drey also sent the letter to your Board of Directors and staff. We have discussed the letter with your staff and believe that your staff should provide answers to the questions that are not addressed solely to the Nuclear Regulatory Commission (NRC). These answers would be submitted by letter to the NRC and we would respond to Ms. Drey. The enclosed table lists the questions we are requesting that your staff address. Please use your copy of the letter for the actual questions, because the table only list summaries of the questions in the letter.

Based on the discussion with your staff, we request that you provide answers to the questions identified for your response in the enclosed table within 60 days of the receipt of this letter.

Sincerely,

/RA/

Jack Donohew, Senior Project Manager, Section 2
Project Directorate IV & Decommissioning
Division of Licensing Project Management
Office of Nuclear Reactor Regulation

Docket No. 50-483

Enclosures: 1. Letter dated March 10, 2000 from Ms. Kay Drey
2. Table of Questions

cc w/encls: See next page

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Callaway Plant, Unit 1

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April 10, 2000

TABLE OF MARCH 10, 2000 LETTER FROM MS. KAY DREY QUESTIONS

Question No./ Letter Page No.	Subject	Summary of Question	Licensee/NRC Response
A.1/page 3	Electrical transmission	Did any of the components fail independently, or was it a common-mode failure?	Licensee response
A.1/page 3	Electrical transmission	Did the grid system fluctuations cause only one power supply breaker to fail, or were other electrical controls affected?	Licensee response
A.1/page 3	Electrical transmission	Has NRC confirmed whether or not the grid system fluctuations caused only one breaker to fail?	NRC will address
A.2/page 3	Electrical transmission	How frequently has NRC been informed of similar disruptions in power?	NRC will address
A.2/page 3	Electrical transmission	Have fluctuating voltages frequently affected the operability of safety systems?	Licensee response
A.3/page 3	Electrical transmission	To what extent are surge protectors required on safety related equipment?	Licensee response
A.4/page 3	Electrical transmission	Did any of the warning sirens become inoperable during the period of fluctuating voltages?	Licensee response
A.5/page 3	Electrical transmission	Related to grid problems being anticipated by NRC.	NRC will address
A.6/page 3	Electrical transmission	Will NRC conduct a special inspection of Callaway for February 13 th event?	NRC will address

Question No./ Letter Page No.	Subject	Summary of Question	Licensee/NRC Response
A.6/page 3	Electrical transmission	Question on August 11, 1999 event and failure to verify operability of the offsite power sources.	Licensee response
A.6/page 3	Electrical transmission	Sequence of environmental, economic, and human error conditions involving offsite and onsite systems.	Licensee response
A.6/page 3	Electrical transmission	Voltage problems caused by near-peak summertime power wheeling.	Licensee response
B.1/page 4	Steam generators (SGs)	How much the licensee knew, when he knew it, and the amount of radioactivity in the secondary water when SG atmospheric dump valves (ADVs) opened.	Licensee response
B.1(a)/page 4	Steam generators	Concentration of radioactivity prior to 2/13 event.	Licensee response
B.1(b)/page 4	Steam generators	How much in advance of the 2/13 event had the secondary coolant sample been analyzed and reported to NRC?	Licensee response
B.2/page 4	Steam generators	Pounds of steam released from opened SG ADVs. How many per SG were open? Was this noisy?	Licensee response
B.3/page 4	Steam generators	Was radioactivity released from paths other than the ADVs?	Licensee response
B.4/page 5	Steam generators	Did the fluctuating voltages affect any electronic radiation detectors?	Licensee response

Question No./ Letter Page No.	Subject	Summary of Question	Licensee/NRC Response
B.5/page 5	Steam generators	Has any condenser cooling water leaked into the SGs over the years and caused any damage?	Licensee response
B.6/page 5	Steam generators	Three questions on pressurizer power operated relief valve (PORV) that opened.	Licensee response
B.7/page 5	Steam generators	Current permissible primary-to-secondary leak rate limit.	Licensee response
B.7/page 5	Steam generators	The Technical Specification leak rate that NRC is confident will not result in a sudden tube rupture.	NRC will address
B.8/page 5	Steam generators	The report that describes the predominant tube wall deformation and defects detected in the SGs that lead to the application for the electrosleeve amendment.	Licensee response
B.8/page 5	Steam generators	The reports the NRC has on such SG defects.	NRC will address
B.9/page 5	Steam generators	Justification for NRC decision to approve electrosleeve amendment.	NRC will address
B.10/page 5	Steam generators	Test results provided to NRC to justify electrosleeve process.	Licensee response
B.10/page 5	Steam generators	Test results used by NRC to justify its decision to approve electrosleeve amendment.	NRC will address

Question No./ Letter Page No.	Subject	Summary of Question	Licensee/NRC Response
B.11/page 6	Steam generators	Did Argonne National Laboratory resolve staff's concerns about electrosleeved tube failures under severe accident conditions?	NRC will address
B.12/page 6	Steam generators	Any examination of integrity of electrosleeved tubes.	Licensee response
B.13/page 6	Steam generators	Two-operating cycle limit in electrosleeve amendment and will electrosleeved tubes be removed then. What is the experience on removing such tubes?	Licensee response
B.14/page 6	Steam generators	Percentage of SG tubes that are not operable, that are electrosleeved, and that are sleeved.	Licensee response
B.15/page 6	Steam generators	Percentage of SG tubes that are plugged. Any plugs removed or dislodged?	Licensee response
B.16/page 6	Steam generators	Has sleeving and plugging SG tubes reduced SG heat removal capacity and, if not, why not?	Licensee response
B.17/page 6	Steam generators	Inspection of SG tube plates. There are 4 parts to question.	Licensee response
B.18/page 7	Steam generators	Occupational exposure of workers doing electrosleeving (including possible removal) versus SG replacement.	Licensee response
B.19/page 7	Steam generators.	Estimate and schedule for SG replacement.	Licensee response

Question No./ Letter Page No.	Subject	Summary of Question	Licensee/NRC Response
B.20/page 7	Steam generators.	NRC criteria on permissible SG tube cracks.	NRC will address
B.21/page 7	Waterhammer	Did the February 13, 2000 event caused by voltage fluctuations result in mechanical damage to the cooling water systems?	Licensee response
B.22/page 7	Callaway machine shop	What are the quality assurance/quality control procedures imposed on the machine shop?	Licensee response
B.22/page 7	Callaway machine shop	Extent of NRC oversight of machine shop.	NRC will address