



Tennessee Valley Authority, 1101 Market Street, Chattanooga, TN 37402

CNL-16-103

June 23, 2016

10 CFR 2.101
10 CFR 52.15

ATTN: Document Control Desk
U.S. Nuclear Regulatory Commission
Washington, DC 20555-0001

Clinch River Nuclear Site
NRC Project No. 785

Subject: Submittal of Calculation Input and Output Files in Support of Early Site Permit Application for Clinch River Nuclear Site

Reference: Letter from TVA to NRC, CNL-16-081, "Application for Early Site Permit for Clinch River Nuclear Site," dated May 12, 2016

In the referenced letter, Tennessee Valley Authority (TVA) submitted an application for an early site permit for the Clinch River Nuclear (CRN) Site in Oak Ridge, TN. In addition to the contents of the application, TVA is also providing the following enclosed calculation input and output files in support of the NRC staff's review:

- XOQDOQ input and output data used to determine atmospheric dispersion and relative deposition, as discussed in Site Safety Analysis Report (SSAR) Section 2.3.5 and Environmental Report (ER) Section 2.7.6.
- PAVAN input and output data used to determine the atmospheric dispersion factors, as discussed in SSAR Section 2.3.4.
- CALMET and CALPUFF input and output data used to evaluate atmospheric dispersion characteristics at the CRN Site, and CALPOST output files used to support a confirmatory analysis of the CRN Site terrain, as discussed in SSAR Section 2.3.5 and ER Section 2.7.6.
- LADTAP II input and output data used to evaluate doses to members of the public from liquid effluents, as discussed in SSAR Sections 2.4 and 11.2 and ER Section 5.4.
- GASPARI input and output data used to evaluate doses to members of the public from gaseous effluents, as discussed in SSAR Section 11.3 and ER Sections 4.5 and 5.4.
- MACCS2 input and output data used to approximate the consequences of severe accidents, as discussed in ER Section 7.2.
- RADTRAN input and output data used to estimate the radiological doses and dose risks to populations and transportation workers resulting from incident-free transportation and to the general population from accident scenarios, as discussed in ER Sections 5.7 and 7.4.
- SACTI input and output data used to determine the potential salt deposition impacts on native vegetation due to operation of the proposed CRN Site cooling towers (SSAR Section 2.3.2.2) and the potential for plume formation (ER Section 5.3.3).

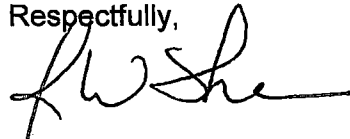
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There are no new regulatory commitments associated with this submittal. If any additional information is needed, please contact Dan Stout at (423) 751-7642.

I declare under penalty of perjury that the foregoing is true and correct. Executed on this 23rd day of June 2016.

Respectfully,



J. W. Shea
Vice President, Nuclear Licensing

Enclosure:

CD-ROM: Calculation Input and Output Files (1 copy)

cc: (Enclosure)

Project Manager, Division of New Reactor Licensing (2 copies)

cc (without enclosure):

Executive Director of Operations
Regional Administrator, Region II
Deputy Executive Director for Reactor and Preparedness Programs
Director, Office of New Reactor Licensing
Director, Office of New Reactors
Branch Chief, Division of New Reactor Licensing
Project Manager, Division of New Reactor Licensing
Project Manager, Division of New Reactor Licensing
Acting Assistant Secretary, Office of Nuclear Energy, Department of Energy
Deputy Assistant Secretary, Nuclear Reactor Technologies, Department of Energy
Light Water Reactor Technologies, Department of Energy
Program Manager, Licensing Technical Support Program, Department of Energy
Project Manager, Licensing Technical Support Program, Department of Energy
Regulatory Specialist, Eastern Regulatory Field Office, Nashville District,
U.S. Army Corp of Engineers