

October 27, 2005

LICENSEE: Exelon Generation Company, LLC.

FACILITY: Limerick Generating Station, Units 1 and 2

SUBJECT: SUMMARY OF JULY 14, 2005, MEETING WITH EXELON GENERATION COMPANY, LLC., ON REQUEST FOR LICENSE AMENDMENTS RELATED TO APPLICATION OF ALTERNATIVE SOURCE TERM (TAC NOS. MC2295 AND MC2296)

On July 14, 2005, a Category 1 public meeting was held between the U.S. Nuclear Regulatory Commission (NRC) and representatives of Exelon Generation Company, LLC (Exelon) at NRC Headquarters, One White Flint North, 11555 Rockville Pike, Rockville, Maryland. The meeting was scheduled at the request of Exelon. The purpose of the meeting was to discuss technical issues associated with the NRC staff's review of Exelon's request for license amendments related to application of alternative source term (AST) at the Limerick Generating Station, Units 1 and 2 (LGS), dated February 27, 2004, (Agencywide Documents Access and Management System (ADAMS) Accession Number ML040980153). The meeting agenda is provided as Enclosure 1 and a list of attendees is provided as Enclosure 2. Meeting handouts were documents available in ADAMS and discussed below.

To help facilitate meeting discussions, the NRC provided a number of recommended technical issues identified during the NRC staff's review in a letter to Exelon dated June 30, 2005 (ADAMS Accession Number ML051790103). The meeting began with introductions by the attendees and general opening remarks made by Mr. Travis L. Tate, NRC Project Manager for LGS, Division of Licensing Project Management (DLPM)/Office of Nuclear Reactor Regulation (NRR). Mr. Tate discussed the Category 1 meeting designation, level of public participation, meeting purpose, schedule, and objectives. Following introductions and opening remarks, Mr. Darrell Roberts, Section Chief, DLPM/NRR, discussed the historical issues surrounding the staff's review of the AST request for LGS, including the similarity of the technical issues with those identified during the staff's review of a prior Exelon AST request for the Peach Bottom Atomic Power Station (PBAPS). Following Mr. Roberts' remarks, Mr. Michael Tschiltz, Chief, Division of Systems Safety and Analysis (DSSA)/NRR, discussed the NRC staff's challenges related to the review of AST applications. Mr. Tschiltz discussed the adequacy and importance of appropriately applying NRC Regulatory Guide 1.183, "Alternative Radiological Source Terms for Evaluating Design Basis Accidents at Nuclear Power Reactors," in AST requests and discussed the staff's position on the intent and appropriate use of the request for additional information (RAI) process.

The meeting was turned over to Exelon for discussion. Ms. Pamela Cowan, Licensing and Regulatory Affairs Director, Exelon, opened a discussion of the AST technical issues identified by the NRC staff during the review of a prior request for application of AST at the PBAPS. The purpose of this discussion was to focus on the similar modeling utilized in both of the Exelon requests. The main objective was for the licensee to gain an understanding of the major technical issues identified for the PBAPS application in a letter from the NRC dated

June 16, 2005 (ADAMS Accession Number ML051360278), for consideration in the LGS AST request currently under NRC staff review. Mr. Paul Reichart, Nuclear Analyst, Washington Group; Mr. Mark Blumberg, Senior Reactor Engineer, DSSA/NRR; Mr. Andrzej Drozd, Senior Reactor Engineer; DSSA/NRR; and Mr. Gopal Patel, Nucore Consulting, discussed the technical issues with the main steam line deposition model and the use of average drywell bulk temperature.

Following these discussions, Ms. Cowan then continued discussions on the LGS AST technical issues identified in the NRC's June 30, 2005, letter to Exelon. Mr. Tschiltz began by addressing the status of the NRC staff's review and the expectations for completing the review. Mr. Tschiltz communicated that the technical issues identified for discussion during the meeting are not exhaustive and that the staff had not completed its review. Additionally, Mr. Tschiltz communicated the NRC staff's intent to issue RAIs with an expectation of a response within 60 days. Exelon agreed to respond within 60 days. Additionally, Mr. Tschiltz stressed the importance that Exelon's RAI response adequately addresses the staff's concerns and that an inadequate RAI response may result in the NRC denying the application in accordance with Title 10 of the *Code of Federal Regulations* (10 CFR) Part 2.108. Ms. Cowan facilitated the discussion of the technical issues identified in the June 30, 2005, letter. Along with Mr. Reichart, other meeting attendees that participated in this discussion included Mr. Ed Forrest, Engineer, DSSA/NRR; Mr. Brad Harvey, Physical Scientist, DSSA/NRR; and Mr. Tom Mscisz, Senior Engineer, Exelon. An understanding of each technical issue was obtained between the NRC and Exelon prior to moving to the next issue. Exelon committed to reflect this understanding in its response to the RAIs issued following the meeting.

Pursuant to the Commission's Policy Statement on "Enhancing Public Participation in NRC Meetings," (67 FR 36920), dated May 28, 2002, the meeting was open to the public for observation and opportunity to communicate with the NRC staff following the business portion of the meeting. Members of the public were in attendance. Following closing remarks by both Exelon and the NRC, members of the public in attendance were given the opportunity to ask the NRC staff questions. There were no questions from the public. The meeting adjourned at approximately 2:00 p.m.

A Public Meeting Feedback form was received which provided favorable feedback on the information available prior to the meeting as well as on the conduct of the meeting. No other comments or suggestions were provided. The feedback form has been forwarded to the NRR Senior Communications Analyst who will forward it to the Office of the Executive Director for Operations.

Please direct any inquiries to me at (301) 415-8474, or [TLT@nrc.gov](mailto:TLT@nrc.gov).

**/RA/**

Travis L. Tate, Project Manager, Section 2  
Project Directorate I  
Division of Licensing Project Management  
Office of Nuclear Reactor Regulation

Docket Nos. 50-352 and 50-353

Enclosures: As stated

cc w/encls: See next page

Please direct any inquiries to me at (301) 415-8474, or [TLT@nrc.gov](mailto:TLT@nrc.gov).

**/RA/**

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NAME	TTate	SLittle for MO'Brien	DRoberts
DATE	10/27/05	10/27/05	10/27/05

**OFFICIAL RECORD COPY**

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Dr. Judith Johnsrud  
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**U.S. Nuclear Regulatory Commission Meeting  
with Exelon Nuclear**

Limerick Generating Station, Units 1 and 2  
Application of Alternative Source Term

July 14, 2005  
Room - O10B4  
10:00 a.m. to 3:00 p.m.

**Purpose:** To discuss technical issues associated with the NRC staff's review of the Limerick request for license amendments related to application of alternative source term (AST) dated February 27, 2004 (ML040980153).

**Objective:** To clarify information provided to date for the AST application and establish a clear understanding of the technical issues provided in a letter to Exelon dated June 30, 2005 (ML051790103).

**Introductory Remarks** ..... 10:00 to 10:15 a.m.  
Travis Tate - Limerick Project Manager, NRR/DLPM  
Darrell Roberts - Section Chief, NRR/DLPM  
Michael Tschiltz - Chief, NRR/DSSA

**Discussion of Peach Bottom AST** ..... 10:15 to 11:00 a.m.  
Pam Cowan - Licensing and Regulatory Affairs Director, Exelon Nuclear

**Discussion of Limerick AST** ..... 11:00 a.m. to noon.  
Pam Cowan

**Break** ..... noon to 12:30 p.m.

**Discussion of Limerick AST** ..... 12:30 to 2:30 p.m.  
Pam Cowan

**Public Comments/Questions** ..... 2:30 to 3:00 p.m.

**Adjourn** ..... 3:00 p.m.

The NRC staff will be available immediately following the meeting to speak with members of the public.

## MEETING ATTENDANCE LIST

Licensee: Exelon Nuclear  
 Plant : Limerick Generating Station, Units 1 and 2  
 Subject: Application for Alternative Source Term

Date: July 14, 2005 Time: 10:00 a.m. - 3:00 p.m.

Location: NRC Offices, OWFN, Room O-10B4

Name (print)	Title	Organization
George Wunder	PM	NRR/DLPM
Mark Blumberg	Dose	NRR/SPSB
Ed Forrest	HVAC	NRR/DSSA/SPSB
David Helker	Manager-Licensing	EXELON
Pam Cowen	Director, Licensing	EXELON
Elliott Flick	Sr. Manager-Corp.Program Eng.	EXELON
Paul Reichart	Nuclear Analyst	Washington Group Int.
Tom Mscisz	Sr. Engineer	EXELON
Jennifer Uhle	Project Director, PDI (A)	NRR/DLPM
Michael Tschiltz	PRA Branch Chief	NRR/DSSA/SPSB
Darrell Roberts	Section Chief, PDI-2	NRC/NRR/DLPM
Travis Tate	Project Manager	NRC/NRR/DLPM
Kirsi Alm-Lytz	Foreign Assignee	NRC/NRR
Andrzej Drozd	Sr. Reactor Engineer	NRR/DSSA/SPSB
Ronald Vazquies	Sr. Engineering	PPL
Gopal Patel	Senior Consultant	NUCORE
Brad Harvey	Physical Scientist	NRR/DSSA/SPSB-C
Kahtan Jabbour	Clinton Project Manager	NRC/NRR/DLPM
Micheal J. McGill	Sr. Engineer	EXELON - LGS
Ronald R. Hess	Consulting Engineer - LGS	EXELON - LGS
Haimonot Yilma	Sr. Engineer	EXELON - PB
Harold Rothstein	Manager - Nuclear Engineering	Washington Group Int'l
Aleem Boatright	Engineer (Nuclear)	Washington Group Int'l
James Metcalf	Project Manager	Polestar (Public)
Doug Walker	License Engineer	EXELON