

**Michael P. Gallagher, PE**  
Vice President  
License Renewal Projects

Telephone 610.765.5958  
www.exeloncorp.com  
michaelp.gallagher@exeloncorp.com

An Exelon Company

AmerGen  
200 Exelon Way  
KSA/2-E  
Kennett Square, PA 19348

10 CFR 50  
10 CFR 51  
10 CFR 54

5928-08-20001  
January 8, 2008

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

Three Mile Island Nuclear Station, Unit 1 (TMI Unit 1)  
Facility Operating License No. DPR-50  
NRC Docket No.50-289

Subject: Three Mile Island, Unit 1 License Renewal Application

References: Letter from Thomas O'Neill (Exelon Generation Company, LLC) to U.S  
NRC "Notice of intent to Pursue License Renewal," dated November 14<sup>th</sup> 2005  
(ML053290027)

Letter from Michael P. Gallagher (Exelon Generation Company, LLC) to U.S  
NRC "Notice of intent to Pursue License Renewal," dated December 20<sup>th</sup>, 2006.  
(ML063630037)

Pursuant to the *Code of Federal Regulations*, Title 10, Parts 50, 51 and 54, AmerGen Energy Company, LLC. (AmerGen) hereby applies for renewal of TMI Unit1 Facility Operating License No. DPR-50, which expires at midnight on April 19, 2014. By this application, AmerGen requests that the TMI Unit 1 Facility Operating License be extended for 20 years beyond the license current expiration date. The application also applies to renewal of the source, special nuclear, and by-product materials licenses that are subsumed in the facility operating license.

The enclosed License Renewal Application (LRA) contains the information required by the License Renewal regulations set forth in 10 CFR Part 54. In addition, it satisfies the Environmental regulations set forth in 10 CFR Part 51. As of the date of this submittal, TMI Unit 1 meets the requirements of 10 CFR 54.17(c). As required by 10 CFR 50.61(b)(1), a pressurized thermal shock assessment was completed which provides projected values for the reference temperature ( $RT_{PTS}$ ), evaluated for end-of-license (EOL) fluence corresponding to the end of the period of extended operation.

A035  
NRB

As required by 10 CFR 54.21 (b), current licensing basis changes which have a material effect on the content of this application will be identified annually while the application is under NRC review, and at least three months prior to the scheduled completion of the NRC review.

Enclosure 1 provides the TMI Unit 1 LRA in hard copy format, Volumes 1, 2 and 3.

To facilitate NRC review, the following items are also provided:

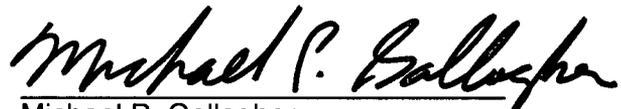
- One (1) CD with the TMI Unit1 LRA in electronic format suitable for posting on the NRC web page.
- Eighty (80) CDs containing the TMI Unit1 LRA, associated boundary drawings, and the Updated Final Safety Analysis Report for TMI-1 in electronic format.
- Three (3) paper copies of the TMI Unit1 LRA and associated boundary drawings

If you have any questions, please contact Fred Polaski, Manager License Renewal, at 610-765-5935.

I declare under penalty of perjury that the foregoing is true and correct.

Respectfully,

Executed on 01/08/2008

  
Michael P. Gallagher  
Vice President, License Renewal  
AmerGen Energy Company, LLC

cc: Regional Administrator, USNRC Region I.  
USNRC Project Manager, NRR - License Renewal, Safety.  
USNRC Project Manager, NRR - License Renewal, Environmental.  
USNRC Project Manager, NRR – TMI Unit 1.  
USNRC Senior Resident Inspector, TMI Unit 1.  
D. Allard, Director, Bureau of Radiation Protection – Pennsylvania Department of Environmental Protection  
Chairman, Board of County Commissioners of Dauphin County, PA  
Chairman, Board of Supervisors of Londonderry Township, Dauphin County, PA

File No. 08001