

April 14, 2015

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

Limerick Generating Station, Units 1 and 2
Renewed Facility Operating License Nos. NPF-39 and NPF-85
NRC Docket Nos. 50-352 and 50-353

Subject: Response to Draft Request for Additional Information Regarding Proposed Change to Add New Limiting Conditions for Operation 3.0.5 and 3.0.6

- References:
- 1) Letter from J. Barstow (Exelon Generation Company, LLC) to the U.S. Nuclear Regulatory Commission, "License Amendment Request Proposed Change to Add New Limiting Conditions for Operation 3.0.5 and 3.0.6" dated November 3, 2014.
 - 2) E-mail from R. Ennis (U.S. Nuclear Regulatory Commission) to S. Hanson (Exelon Generation Company, LLC), "Draft RAIs – Limerick Units 1 and 2 – Add New LCOs 3.0.5 and 3.0.6 (TACs MF5133 & 34)," dated February 19, 2015.

By letter dated November 3, 2014, Exelon Generation Company, LLC (Exelon) submitted a license amendment request (LAR) for Limerick Generating Station, Units 1 and 2 (Reference 1). The LAR proposes to add new Limiting Conditions for Operation 3.0.5 and 3.0.6 to the Technical Specifications.

In the Reference 2 e-mail, the U.S. Nuclear Regulatory Commission requested additional information. Enclosed is Exelon's response to the NRC request for additional information. Attachment 1 contains our response and Attachment 2 contains the revised Technical Specifications page mark-ups.

Exelon has reviewed the information supporting a finding of no significant hazards consideration and the environmental consideration provided to the U.S. Nuclear Regulatory Commission in Reference 1. The additional information provided in this response does not affect the bases for concluding that the proposed license amendment does not involve a significant hazards consideration. Furthermore, the additional

Response to Request for Additional Information
LAR to Add New Limiting Conditions for Operation 3.0.5 and 3.0.6
April 14, 2015
Page 2

information provided in this response does not affect the bases for concluding that neither an environmental impact statement nor an environmental assessment needs to be prepared in connection with the proposed amendment.

There are no regulatory commitments in this letter.

Should you have any questions concerning this letter, please contact Stephanie J. Hanson at 610-765-5143 or Glenn Stewart at 610-765-5529.

I declare under penalty of perjury that the foregoing is true and correct. Executed on the 14th day of April 2015.

Respectfully,



James Barstow
Director, Licensing and Regulatory Affairs
Exelon Generation Company, LLC

Attachments: 1. Response to Draft Request for Additional Information Regarding Proposed License Amendment to Add New Limiting Conditions for Operation 3.0.5 and 3.0.6 for Limerick Generating Station, Units 1 and 2
2. Revised Technical Specifications Page Mark-ups

cc: USNRC Region I, Regional Administrator
USNRC Senior Resident Inspector, LGS, Units 1 and 2
USNRC Project Manager, LGS, Units 1 and 2
Director, Bureau of Radiation Protection - Pennsylvania Department
of Environmental Protection

ATTACHMENT 1

Limerick Generating Station, Units 1 and 2

Renewed Facility Operating License Nos. NPF-39 and NPF-85

Docket Nos. 50-352 and 50-353

**Response to Draft Request for Additional Information Regarding Proposed
License Amendment to Add New Limiting Conditions for Operation 3.0.5 and 3.0.6 for
Limerick Generating Station, Units 1 and 2**

By letter to the U.S. Nuclear Regulatory Commission (USNRC) dated November 3, 2014 (Agencywide Documents Access and Management System (ADAMS) Accession No. ML14308A144), Exelon Generation Company, LLC (Exelon, the licensee), submitted a license amendment request for Limerick Generating Station (LGS), Units 1 and 2 (Reference 1). The proposed amendment would add new Limiting Conditions for Operation (LCOs) 3.0.5 and 3.0.6 to the Applicability Section of the LGS Technical Specifications (TSs). LCO 3.0.5 establishes the allowance for restoring equipment to service under administrative controls when it has been removed from service or declared inoperable to comply with TS Action requirements. LCO 3.0.6 provides appropriate actions to be taken when the inoperability of a support system results in the inoperability of related supported systems. In addition, the proposed changes involve adding new Safety Function Determination Program (SFDP) requirements to the Administrative Section of the TSs to ensure that a loss of safety function is detected and appropriate actions are taken when LCO 3.0.6 is entered.

The USNRC staff has determined that additional information is needed to complete its review. The questions are restated below along with Exelon's response.

RAI

Background

The licensee stated in Section 1.0 of Attachment 1 to the application dated November 3, 2014, that the proposed changes conform to the requirements of 10 CFR 50.36 for the contents of TSs, and are consistent with the improved Standard Technical Specifications (STS) issued by the NRC in NUREG-1433, "Standard Technical Specifications - General Electric BWR/4 Plants."

The licensee is proposing to add new LCOs 3.0.5 and 3.0.6, which would read as follows:

3.0.5 Equipment removed from service or declared inoperable to comply with ACTIONS may be returned to service under administrative control solely to perform testing required to demonstrate its OPERABILITY or the OPERABILITY of other equipment. This is an exception to Specifications 3.0.1 and 3.0.2 for the system returned to service under administrative control to perform the testing required to demonstrate OPERABILITY.

3.0.6 When a supported system Limiting Condition for Operation is not met solely due to a support system Limiting Condition for Operation not being met, the ACTIONS associated with this supported system are not required to be entered. Only the support system Limiting Condition for Operation ACTIONS are required to be entered. This is an exception to Specifications 3.0.1 and 3.0.2 for the supported system. In this event, an evaluation shall be performed in accordance with Specification 6.17, "Safety Function Determination Program (SFDP)." If a loss of safety function is determined to exist by this program, the appropriate ACTIONS of the Limiting Condition for Operation in which the loss of safety function exists are required to be entered.

When a support system's ACTION directs a supported system to be declared inoperable or directs entry into ACTIONS for a supported system, the applicable ACTIONS shall be entered in accordance with Specification 3.0.1.

Current TS LCO 3.0.1 for LGS Units 1 and 2 states:

3.0.1 Compliance with the Limiting Conditions for Operation contained in the succeeding Specifications is required during [the] OPERATIONAL CONDITIONS or other conditions specified therein; except that upon failure to meet the Limiting Conditions for Operation, the associated ACTION requirements shall be met.

Request for Additional Information

STS LCOs 3.0.5 and 3.0.6 only have LCO 3.0.2 identified as an exception. The proposed LCOs 3.0.5 and 3.0.6 for LGS identified LCOs 3.0.1 and 3.0.2 as exceptions. This is not consistent with NUREG-1433, Revision 4. Please explain this discrepancy.

In addition, since your proposed change is not consistent with NUREG-1433, please describe if the language in the proposed LGS TS LCOs 3.0.5 and 3.0.6 introduces any changes, either in technical requirements or in the TS usage rules, from the language used in the STS.

Response:

STS LCO 3.0.1 states: "LCOs shall be met during the MODES or other specified conditions in the Applicability, except as provided in LCO 3.0.2, LCO 3.0.7, LCO 3.0.8, and LCO 3.0.9."

STS LCO 3.0.2 states: "Upon discovery of a failure to meet an LCO, the Required Actions of the associated Conditions shall be met, except as provided in LCO 3.0.5 and LCO 3.0.6."

The existing LGS TS LCO 3.0.1 includes essentially the same requirements as STS LCOs 3.0.1 and 3.0.2. Exelon acknowledges that the addition of LCOs 3.0.5 and 3.0.6 requires an exception to only the second premise of the existing LGS TS LCO 3.0.1 (which correlates to STS LCO 3.0.2), that states: "... except that upon failure to meet the Limiting Conditions for Operation, the associated ACTION requirements shall be met," as well as LGS TS LCO 3.0.2.

The proposed TS Bases for LCO 3.0.5 included in the original license amendment request as Attachment 3 acknowledged this distinction by including a statement that the sole purpose of Specification 3.0.5 is to provide an exception to Specifications 3.0.1 and 3.0.2 (*i.e., to not comply with the applicable ACTION(s)*) to allow the performance of required testing to demonstrate the operability of the equipment being returned to service, or the operability of other equipment.

However, rather than just making a statement in the TS Bases, in order to more clearly make the distinction that the exception only applies to the second premise of TS LCO 3.0.1, Exelon proposes to revise the proposed TS LCO 3.0.5 and 3.0.6 wording to say: "This is an exception to the second premise of Specification 3.0.1 and is an exception to Specification 3.0.2 (i.e., to not comply with the applicable ACTION(s)) ..."

This revision maintains consistency with NUREG-1433, Revision 4. Therefore, the language in the revised LGS TS LCOs 3.0.5 and 3.0.6 do not introduce any changes, either in the technical requirements or in the TS usage rules, from the language used in the STS.

The revised TS mark-ups, involving the proposed change to INSERT B, for both units are provided in Attachment 2. All other TS markups provided in the original license amendment request (Reference 1) remain unchanged.

References:

- 1) Letter from J. Barstow (Exelon Generation Company, LLC) to the U.S. Nuclear Regulatory Commission, "License Amendment Request Proposed Change to Add New Limiting Conditions for Operation 3.0.5 and 3.0.6," dated November 3, 2014

ATTACHMENT 2

Limerick Generating Station, Units 1 and 2

Renewed Facility Operating License Nos. NPF-39 and NPF-85

Docket Nos. 50-352 and 50-353

Revised Technical Specifications Page Mark-ups

Unit 1 TS Page

3/4 0-1

Unit 2 TS Page

3/4 0-1

3/4.0 APPLICABILITY

Add INSERT A

LIMITING CONDITION FOR OPERATION

3.0.1 Compliance with the Limiting Conditions for Operation contained in the succeeding Specifications is required during the OPERATIONAL CONDITIONS or other conditions specified therein; except that upon failure to meet the Limiting Conditions for Operation, the associated ACTION requirements shall be met.

3.0.2 Noncompliance with a Specification shall exist when the requirements of the Limiting Condition for Operation and associated ACTION requirements are not met within the specified time intervals. If the Limiting Condition for Operation is restored prior to expiration of the specified time intervals, completion of the ACTION requirements is not required.

3.0.3 When a Limiting Condition for Operation is not met, except as provided in the associated ACTION requirements, within one hour action shall be initiated to place the unit in an OPERATIONAL CONDITION in which the Specification does not apply by placing it, as applicable, in:

- a. At least STARTUP within the next 6 hours.
- b. At least HOT SHUTDOWN within the following 6 hours, and
- c. At least COLD SHUTDOWN within the subsequent 24 hours.

Where corrective measures are completed that permit operation under the ACTION requirements, the ACTION may be taken in accordance with the specified time limits as measured from the time of failure to meet the Limiting Condition for Operation. Exceptions to these requirements are stated in the individual Specifications.

This Specification is not applicable in OPERATIONAL CONDITION 4 or 5.

3.0.4 When a Limiting Condition for Operation is not met, entry into an OPERATIONAL CONDITION or other specified condition in the Applicability shall only be made:

- a. When the associated ACTION requirements to be entered permit continued operation in the OPERATIONAL CONDITION or other specified condition in the Applicability for an unlimited period of time; or
- b. After performance of a risk assessment addressing inoperable systems and components, consideration of the results, determination of the acceptability of entering the OPERATIONAL CONDITION or other specified condition in the Applicability, and establishment of risk management actions, if appropriate; exceptions to this Specification are stated in the individual Specifications; or
- c. When an allowance is stated in the individual value, parameter, or other Specification.

This Specification shall not prevent changes in OPERATIONAL CONDITIONS or other specified conditions in the Applicability that are required to comply with ACTION requirements or that are part of a shutdown of the unit.

Add INSERT B

3/4.0 APPLICABILITY

Add INSERT A

LIMITING CONDITION FOR OPERATION

3.0.1 Compliance with the Limiting Conditions for Operation contained in the succeeding Specifications is required during the OPERATIONAL CONDITIONS or other conditions specified therein; except that upon failure to meet the Limiting Conditions for Operation, the associated ACTION requirements shall be met.

3.0.2 Noncompliance with a Specification shall exist when the requirements of the Limiting Condition for Operation and associated ACTION requirements are not met within the specified time intervals. If the Limiting Condition for Operation is restored prior to expiration of the specified time intervals, completion of the ACTION requirements is not required.

3.0.3 When a Limiting Condition for Operation is not met, except as provided in the associated ACTION requirements, within one hour action shall be initiated to place the unit in an OPERATIONAL CONDITION in which the Specification does not apply by placing it, as applicable, in:

- a. At least STARTUP within the next 6 hours,
- b. At least HOT SHUTDOWN within the following 6 hours, and
- c. At least COLD SHUTDOWN within the subsequent 24 hours.

Where corrective measures are completed that permit operation under the ACTION requirements, the ACTION may be taken in accordance with the specified time limits as measured from the time of failure to meet the Limiting Condition for Operation. Exceptions to these requirements are stated in the individual Specifications.

This Specification is not applicable in OPERATIONAL CONDITION 4 or 5.

3.0.4 When a Limiting Condition for Operation is not met, entry into an OPERATIONAL CONDITION or other specified condition in the Applicability shall only be made:

- a. When the associated ACTION requirements to be entered permit continued operation in the OPERATIONAL CONDITION or other specified condition in the Applicability for an unlimited period of time; or
- b. After performance of a risk assessment addressing inoperable systems and components, consideration of the results, determination of the acceptability of entering the OPERATIONAL CONDITION or other specified condition in the Applicability, and establishment of risk management actions, if appropriate; exceptions to this Specification are stated in the individual Specifications; or
- c. When an allowance is stated in the individual value, parameter, or other Specification.

This Specification shall not prevent changes in OPERATIONAL CONDITIONS or other specified conditions in the Applicability that are required to comply with ACTION requirements or that are part of a shutdown of the unit.

Add INSERT B

INSERT A

, except as provided in Specifications 3.0.5 and 3.0.6.

INSERT B

3.0.5 Equipment removed from service or declared inoperable to comply with ACTIONS may be returned to service under administrative control solely to perform testing required to demonstrate its OPERABILITY or the OPERABILITY of other equipment. This is an exception to the second premise of Specification 3.0.1 and is an exception to Specification 3.0.2 (i.e., to not comply with the applicable ACTION(s)) for the system returned to service under administrative control to perform the testing required to demonstrate OPERABILITY.

3.0.6 When a supported system Limiting Condition for Operation is not met solely due to a support system Limiting Condition for Operation not being met, the ACTIONS associated with this supported system are not required to be entered. Only the support system Limiting Condition for Operation ACTIONS are required to be entered. This is an exception to the second premise of Specification 3.0.1 and is an exception to Specification 3.0.2 (i.e., to not comply with the applicable ACTION(s)) for the supported system. In this event, an evaluation shall be performed in accordance with Specification 6.17, "Safety Function Determination Program (SFDP)." If a loss of safety function is determined to exist by this program, the appropriate ACTIONS of the Limiting Condition for Operation in which the loss of safety function exists are required to be entered.

When a support system's ACTION directs a supported system to be declared inoperable or directs entry into ACTIONS for a supported system, the applicable ACTIONS shall be entered in accordance with Specification 3.0.1.