

September 29, 2005

Mr. Christopher M. Crane
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Exelon Generation Company, LLC
200 Exelon Way, KSA 3-E
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SUBJECT: LIMERICK GENERATING STATION, UNITS 1 AND 2 - CORRECTION OF
TECHNICAL SPECIFICATIONS AND SAFETY EVALUATION ERRORS,
AMENDMENT NOS. 177 AND 139 (TAC NOS. MC3430 AND MC3431)

Dear Mr. Crane:

On August 26, 2005, the U.S. Nuclear Regulatory Commission (NRC) issued Amendment No. 177 to Facility Operating License (FOL) No. NPF-39 and Amendment No. 139 to FOL No. NPF-85 (Agencywide Documents Access and Management System (ADAMS) Accession Number ML052420112) for the Limerick Generating Station, Units 1 and 2, respectively. The amendments consisted of changes to the Technical Specifications (TSs) associated with the activation of the trip outputs of the oscillation power range neutron monitor portion of the power range neutron monitoring system.

One of the changes approved by Amendment Nos. 177 and 139 involved an administrative change to TS Index page xi, as described on pages 11-12 of the NRC's Safety Evaluation (SE) dated August 26, 2005. It has come to the attention of the NRC staff that when issuing Amendment Nos. 177 and 139, the listings for TS 3/4.4.4, "Chemistry" on TS page 3/4 4-12 and associated TS Table 3.4.4-1, "Reactor Coolant System Chemistry Limits" on TS page 3/4 4-14 were erroneously included on the revised TS Index page xi. These Index page listings were previously deleted from the TSs when the NRC issued Amendment Nos. 174 and 136 to FOL Nos. NPF-39 and NPF-85, respectively, on April 18, 2005 (ADAMS Accession Number ML051110065). Amendment Nos. 174 and 136 approved replacing the listings with the wording:

(Deleted) The information from pages 3/4 4-12 through 3/4 4-14 has been intentionally omitted. Refer to note on page 3/4 4-12.

The NRC staff has determined that the errors were introduced inadvertently due to changes to the same TS pages made by separate overlapping license amendment applications. As such, the staff concludes that the changes made by error when issuing Amendment Nos. 177 and 139 were not requested by the licensee, were not addressed in the notice to the public, nor approved by the NRC.

It has also come to the attention of the NRC staff that the revised TS Index page xi approved by Amendment No. 136 erroneously omitted the page number 3/4 4-12 associated with the deleted listing for TS 3/4.4.4.4, "Chemistry." The NRC staff has determined that the error was introduced inadvertently on the revised TS change page submitted with the license amendment

application. As such, the staff concludes that the change made by error was not requested by the licensee, was not addressed in the notice to the public, nor approved by the NRC.

Additionally, when issuing Amendment No. 177, the word “and” following the equation “#0.66W + 55.7%” in the Allowable Value column for Item 2.a was erroneously omitted from the approved revised TS Table 3.3.6-2 on page 3/4 3-60. The NRC staff has determined that the error was introduced inadvertently on the revised TS change page submitted with the license amendment application. As such, the staff concludes that the change made by error was not requested by the licensee, was not addressed in the notice to the public, nor approved by the NRC.

Finally, a typographical error has been identified on the NRC’s SE issued for Amendment Nos. 177 and 139. On page 10 of the SE, under the heading “TS Table 4.3.1.1-1,” the sentence “.....and for recirculation drive flow is >60%.” should read “.....and for recirculation drive flow is <60%.” The NRC staff has determined that the correction is appropriate based on the TS changes and the staff’s SE for the amendments.

The NRC staff is issuing the enclosed corrections to the errors on the Units 1 and 2 TS Index page xi, the Unit 1 TS page 3/4 3-60, and page 10 of the staff’s SE. The electronic versions of the documents will also be corrected in ADAMS.

Sincerely,

/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

Since the OPRM Upscale trip outputs are in series with the APRM high-inop trip outputs, the staff determined that no change is required to the 2-out-of-4 voter function response time testing requirements. The staff also determined that the modification to the table note to add the statement; "but the OPRM and APRM outputs are considered to be separate channels, so N=8. Testing of OPRM and APRM outputs shall alternate," is necessary to account for the implementation of the OPRM Upscale Function outputs. Therefore, the staff determined that the proposed changes to TS Table 3.3.1-2 are acceptable.

TS Table 4.3.1.1-1

The licensee proposed changes to TS Table 4.3.1.1-1 to add the OPRM Upscale Function, associated SRs, and modifications to the table notes. The staff determined that the proposed addition of the OPRM Upscale Function to TS Table 4.3.1.1-2 is consistent with the changes necessary to implement the function in accordance with NEDC-32410P-A, Supplement 1. The licensee proposed SRs (channel check once-per-24 hours); channel functional testing (once-per-184 days) that includes the flow input function, but excludes the flow transmitter; and channel calibrations that include the flow input function. This provides verification that the OPRM Upscale trip auto-enable (not-bypass) setpoint for APRM simulated thermal power is $\geq 30\%$ and for recirculation drive flow is $< 60\%$. The LGS units have a 24-month refueling interval and surveillances are required with thermal power $\geq 25\%$ rated thermal power. The staff determined that these surveillances are equivalent to or more conservative than the corresponding SRs in NEDC-32410P-A, Supplement 1; therefore, the staff finds the proposed surveillance intervals acceptable.

3.3 TS 3/4.3.6, Control Rod Block Instrumentation

To support the implementation of the OPRM Upscale Function, the licensee provided the following discussion related to the proposed changes to TS 3/4.3.6.

- C.1 A minor non-OPRM related change is being made to Table 3.3.6-2 to show the [SLO] equation in the form $0.66(W - \Delta W) + \text{offset value}$, with the offset value the same for both SLO and [TLO]. Currently, the equations are shown in the form $0.66W + \text{offset value}$, with 5% difference in offset values for SLO vs. TLO. In the reformatted representation, ΔW equals zero for TLO and 7.6% for SLO ($7.6\% = 5\%/0.66$). The revised representation, while mathematically equivalent, states the equation in the same form that is actually implemented in the equipment. In addition, a notation has been added to Table 3.3.6-2 addressing the limits of application of the flow offset. No change related to SLO is required for the OPRM Upscale Function implementation. However, the form of this setpoint expression is being modified to address a TS concern identified during the system's installation at LGS. The concern involves the system's miscalculation of this equation when indicated recirculation drive flow (W) becomes less than ΔW . Although this flow condition is not operationally possible, proper description of the system's calculation of the single loop setpoint was deemed to be warranted.
- C.2 To make the Intermediate Range Monitor (IRM) rod block OPERATIONAL CONDITION (OPCON) 5 operability requirements consistent with the current

Limerick Generating Station, Unit Nos. 1 and 2

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application. As such, the staff concludes that the change made by error was not requested by the licensee, was not addressed in the notice to the public, nor approved by the NRC.

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