January 9, 2007

Mr. James M. Levine
Executive Vice President, Generation
Arizona Public Service Company
P.O. Box 52034
Phoenix, AZ 85072-2034

SUBJECT: PALO VERDE NUCLEAR GENERATING STATION, UNITS 1, 2, AND 3 - CLOSEOUT OF GENERIC LETTER 2003-01 "CONTROL ROOM HABITABILITY" (TAC NOS. MB9834, MB9835, MB9836)

Dear Mr. Levine:

By letters dated December 5, 2003, July 19, 2005, August 28, 2006, and December 8, 2006 (Agencywide Documents Access and Management System (ADAMS) Accession Nos. ML033500344, ML052070713, ML062490502 and ML063530482 respectively), Arizona Public Service Company (the licensee), responded to Generic Letter (GL) 2003-01, "Control Room Habitability," for the Palo Verde Nuclear Generating Station (Palo Verde), Units 1, 2, and 3.

The GL requested that you confirm that your control rooms meet their design bases (e.g., General Design Criterion [GDC] 1, 3, 4, 5, & 19, draft GDC, or principal design criteria), with special attention to: (1) Determination of the most limiting unfiltered and/or filtered inleakage into the control room and comparison to values used in your design bases for meeting control room operator dose limits from accidents (GL 2003-01, Item 1a); (2) Determination that the most limiting unfiltered inleakage is incorporated into your hazardous chemical assessments (GL 2003-01, Item 1b); and, (3) Determination that reactor control capability is maintained in the control room or at the alternate shutdown location in the event of smoke (GL 2003-01, Item 1b). The GL further requested information on any compensatory measures in use to demonstrate control room habitability, and plans to retire them (GL 2003-01, Item 2).

The Palo Verde control rooms are all separate control rooms pressurized for accident mitigation and are designed in accordance with the design criteria contained in GDCs regarding control room habitability, as documented in your Updated Final Safety Analysis Report.

You reported the results of tracer gas tests for the control rooms conducted using the guidance of American Society for Testing Materials E741, "Standard Test Method for Determining Air Change in a Single Zone by Means of a Tracer Gas Dilution."

> For the Unit 1 control room, you determined that the maximum tested value for unfiltered inleakage into the control room envelope (CRE) was 14 standard cubic feet per minute (scfm), which included 10 scfm for ingress and egress. This test result is less than the value of 61 scfm assumed in the design basis radiological analyses for control room habitability (CRH).
>
> For the Unit 2 control room, you determined that the maximum tested value for unfiltered inleakage into the CRE was 10 scfm, which included 10 scfm for ingress and egress.

This test result is less than the value of 61 scfm assumed in the design basis radiological analyses for CRH.

For the Unit 3 control room, you determined that the maximum tested value for unfiltered inleakage into the CRE was 10 scfm, which included 10 scfm for ingress and egress. This test result is less than the value of 61 scfm assumed in the design basis radiological analyses for CRH.

You indicated that the most limiting unfiltered airflow is the normal control room ventilation system flow of 1,200 scfm, and this normal airflow is used for the evaluation of hazardous chemicals to the control room staff. You also indicated that reactor control capability is maintained from either the control room or the remote shutdown room in the event of smoke.

The GL further requested that you assess your Technical Specifications (TS) to determine if they verify the integrity of the CRE, including ongoing verification of the inleakage assumed in the design-basis analysis for control room habitability in light of the demonstrated inadequacy of a delta pressure measurement to alone provide such verification (GL 2003-01, Item 1c). In your December 8, 2006, response you committed to submit a TS amendment request to modify the requirements related to control room envelope habitability in accordance with Technical Specification Task Force Traveler 448 (TSTF-448) within 1 year after the final approved Consolidated Line Item Improvement Process for TSTF-448 is published in the *Federal Register*.

Based on the licensee's letters responding to the GL and its commitment to submit a TS amendment request adopting TSTF-448, the Nuclear Regulatory Commission staff concludes that GL 2003-01 is considered closed for the Palo Verde units. If you have any questions, please contact me at (301) 415-3062.

Sincerely,

/RA/

Mel B. Fields, Senior Project Manager
Plant Licensing Branch IV
Division of Operating Reactor Licensing
Office of Nuclear Reactor Regulation

Docket Nos. STN 50-528, STN 50-529,
and STN 50-530

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This test result is less than the value of 61 scfm assumed in the design basis radiological analyses for CRH.

For the Unit 3 control room, you determined that the maximum tested value for unfiltered inleakage into the CRE was 10 scfm, which included 10 scfm for ingress and egress. This test result is less than the value of 61 scfm assumed in the design basis radiological analyses for CRH.

You indicated that the most limiting unfiltered airflow is the normal control room ventilation system flow of 1,200 scfm, and this normal airflow is used for the evaluation of hazardous chemicals to the control room staff. You also indicated that reactor control capability is maintained from either the control room or the remote shutdown room in the event of smoke.

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