Example D47 - Valves – Active Safety Related Function ITAAC Closure Notification

XX/YY/ZZZZ (Date)

To: NRC

From: {Name of Licensee}
{Site Name and Unit #(s)}
{Docket #(s)}

Subject: Completion of ITAAC 2.1 02.12a.i

The purpose of this letter is to notify the Nuclear Regulatory Commission (NRC) of the completion of {Site Name and Unit #(s)} Inspections, Tests, Analyses, and Acceptance Criteria (ITAAC) Item 2.1 02.12a.i for verification that a test report exists and concludes that each motor-operated valve in the Reactor Coolant System changes position as indicated in Table 2.1.2-1 of the Design Control Document (DCD) under design conditions in accordance with 10 CFR 52.99(c)(1). The closure process for this ITAAC is based on the guidance described in NEI 08-01 (Reference 1).

ITAAC Statement

Design Commitment:

The automatic depressurization valves identified in Table 2.1.2-1 perform an active safety-related function to change position as indicated in the table.

Inspections, Tests, Analyses:

i) Tests or type tests of motor-operated valves will be performed that demonstrate the capability of the valve to operate under its design conditions.

Acceptance Criteria:

i) A test report exists and concludes that each motor-operated valve changes position as indicated in Table 2.1.2-1 under design conditions.

ITAAC Determination Basis

Multiple ITAAC are performed to demonstrate that the automatic depressurization valves identified in Table 2.1.2-1 (Attachment A) perform an active safety-related function to change position as indicated in the table. The subject ITAAC requires tests or type tests of motor-operated valves to be performed to demonstrate the capability of the valve to operate under its design conditions.

Testing was performed under the design conditions identified in the design specification for the valves (Reference 4) to demonstrate that each motor-operated valve changes position as required. The qualification of active valve operability was performed in accordance with ASME QME-1-2007 Subarticle QV-7400 (Reference 6) with the exception that no end-loading qualification is required for any AP1000 active valve assembly. AP1000 active valves either fall into QV Category B, meet the two exceptions of ASME QME-1-2007 Subarticles QV-7440 (Reference 6) or are guaranteed by the design of the piping system per QV-7441 (Reference 6). Additional information about the methods used to qualify safety-related equipment is provided in Appendix 3D of the AP1000 DCD (Reference 3).

Equipment Qualification Document Packages XXX (Reference 5) containing applicable test results and documentation for each motor-operated valve exist and conclude that each motor-operated valve changes position as indicated in Table 2.1.2-1 (Attachment A) under design conditions. EQDPs are included in the ITAAC 2.1 02.12a.i Completion Package (Reference 2).

ITAAC-Related Construction Finding Review

In accordance with XXX-XXX-XXX (project specific procedure for ITAAC completion), {Licensee} performed a review of all ITAAC-related construction findings pertaining to the subject ITAAC and associated corrective actions. This review found that there are no relevant ITAAC-related construction findings associated with this ITAAC. The ITAAC completion review is documented in ITAAC Completion Package for ITAAC 2.1 02.12a.i (Reference 2) and available for NRC inspection.

ITAAC Completion Statement

Based on the above information, [Licensee] hereby notifies the NRC that ITAAC 2.1 02.12a.i was performed for Plant/Unit XYZ, and that the prescribed acceptance criteria are met.

Systems, structures, and components verified as part of this ITAAC are being maintained in their as-designed, ITAAC compliant condition in accordance with approved plant programs and procedures.

We request NRC staff confirmation of this determination and publication of the required notice in the Federal Register per 10 CFR 52.99.

If there are any questions, please contact XXX at xxx-xxx-xxxx.

Sincerely,

{Signature of Licensee Representative}
{Typed Name of Licensee Representative}
{Title of Licensee Representative}

References (available for NRC inspection)

1. NEI 08-01, Industry Guideline for the ITAAC Closure Process Under 10 CFR Part 52.
2. ITAAC 2.1 02.12a.i Completion Package
3. APP-GW-GL-700, AP1000 Design Control Document, Appendix 3D
4. deleted
5. Equipment Qualification Document Package(s) (EQDPs) XXX
6. ASME-QME-1-2007, Qualification of Active Mechanical Equipment used in Nuclear Power Plants

Attachment A

Partial Excerpt of AP1000 DCD Tier 1 Table 2.1.2-1

Equipment Name	Tag Number	Active Function	EQDP Report Number
First-stage ADS Motor-operated Valve (MOV)	RCS-PL-V001A	Transfer Open	EQDP PV01
First-stage ADS MOV	RCS-PL-V001B	Transfer Open	EQDP PV01
Second-stage ADS MOV	RCS-PL-V002A	Transfer Open	EQDP PV01
Second-stage ADS MOV	RCS-PL-V002B	Transfer Open	EQDP PV01
Third-stage ADS MOV	RCS-PL-V003A	Transfer Open	EQDP PV01
Third-stage ADS MOV	RCS-PL-V003B	Transfer Open	EQDP PV01
First-stage ADS Isolation MOV	RCS-PL-V011A	Transfer Open	EQDP PV01
First-stage ADS Isolation MOV	RCS-PL-V011B	Transfer Open	EQDP PV01
Second-stage ADS Isolation MOV	RCS-PL-V012A	Transfer Open	EQDP PV01
Second-stage ADS Isolation MOV	RCS-PL-V012B	Transfer Open	EQDP PV01
Third-stage ADS Isolation MOV	RCS-PL-V013A	Transfer Open	EQDP PV01
Third-stage ADS Isolation MOV	RCS-PL-V013B	Transfer Open	EQDP PV01