

Kevin Cimorelli
Site Vice President

Susquehanna Nuclear, LLC
769 Salem Boulevard
Berwick, PA 18603
Tel. 570.542.3795 Fax 570.542.1504
Kevin.Cimorelli@TalenEnergy.com



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

10 CFR 50.90

**SUSQUEHANNA STEAM ELECTRIC STATION
RESPONSE TO REQUEST FOR ADDITIONAL
INFORMATION REGARDING PROPOSED
LICENSE AMENDMENT REQUESTING A
TEMPORARY CHANGE TO THE TECHNICAL
SPECIFICATIONS TO ALLOW REPLACEMENT
OF EMERGENCY SERVICE WATER SYSTEM
PIPING
PLA-7793**

JUN 03 2019

**Docket No. 50-387
and 50-388**

- References: 1) Susquehanna letter to NRC, "Proposed Amendment to Licenses NPF-14 and NPF-22: Temporary Change to the Technical Specifications to Allow Replacement of Emergency Service Water System Piping (PLA-7751)," dated January 9, 2019 (ADAMS Accession No. ML19009A431)
- 2) NRC email to Susquehanna, "Request for Additional Information Re: License Amendment Request to Replace Emergency Service Water Piping (EPID: L-2019-LLA-0004)," dated May 7, 2019 (ADAMS Accession No. ML19128A023)

Pursuant to 10 CFR 50.90, Susquehanna Nuclear, LLC (Susquehanna), submitted, in Reference 1, a request for an amendment to the Technical Specifications (TS) for Susquehanna Steam Electric Station (SSES), Units 1 and 2, Facility Operating License numbers NPF-14 and NPF-22. The proposed amendment would allow temporary changes to TS 3.7.1, "Residual Heat Removal Service Water (RHRSW) System and the Ultimate Heat Sink (UHS)" and TS 3.7.2, "Emergency Service Water (ESW) System," to allow for replacement of ESW System piping.

The NRC provided a Request for Additional Information (RAI) in Reference 2. Enclosure 1 to this letter provides Susquehanna's response to the NRC's RAI. Based on Susquehanna's response to the RAI in Enclosure 1, the TS markups provided in Reference 1 have been revised. The revised TS markup pages are provided in Enclosure 2 and the revised clean TS pages are provided in Enclosure 3. The TS pages provided in Enclosures 2 and 3 of this letter supersede the TS pages provided in Enclosures 2 and 3 to Reference 1 in their entirety.

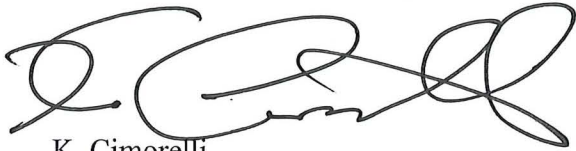
Susquehanna has reviewed the information supporting a finding of No Significant Hazards Consideration and the Environmental Consideration provided to the NRC in Reference 1 and determined the information provided herein does not impact the original conclusions in Reference 1.

There are no new or revised regulatory commitments contained in this submittal.

Should you have any questions regarding this submittal, please contact Ms. Melisa Krick, Manager – Nuclear Regulatory Affairs, at (570) 542-1818.

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

Executed on: 6/3/2019



K. Cimorelli

Enclosure:

1. Response to Request for Additional Information
2. Revised Markup Technical Specification Pages
3. Revised Clean Technical Specification Pages

Copy: NRC Region I
Ms. L. H. Micewski, NRC Sr. Resident Inspector
Ms. T. E. Hood, NRC Project Manager
Ms. J. C. Tobin, NRC Project Manager
Mr. M. Shields, PA DEP/BRP

Enclosure 1 to PLA-7793

Response to Request for Additional Information

Response to Request for Additional Information

On January 9, 2019, Susquehanna Nuclear, LLC (Susquehanna), submitted a license amendment request (LAR) for the Susquehanna Steam Electric Station (SSES). Specifically, Susquehanna requested a temporary extension to select Completion Times in Technical Specification (TS) 3.7.1, “Residual Heat Removal Service Water (RHRSW) System and the Ultimate Heat Sink (UHS)” and TS 3.7.2, “Emergency Service Water (ESW) System,” to allow for replacement of ESW System piping. By email dated May 7, 2019, the NRC requested the following additional information. The response to this request for additional information (RAI) is provided below.

NRC RAI

10 CFR 50.36(c)(2) requires that, when an Limiting Conditions for Operation (LCO) of a nuclear reactor plant is not met, the licensee shall shut down the reactor or follow any remedial action permitted by the technical specification until the condition can be met. Susquehanna Technical Specifications (TSs) list remedial actions according to described Conditions in an ACTIONS table for each TS. Each Condition has Required Actions that must be completed within a given Completion Time (CT).

The licensee proposed a CT of 14 days for TS 3.7.1 Condition B and TS 3.7.2 Conditions B and C during the replacement of ESW piping for the opposite unit. The proposed CTs are modified by footnotes which identifies that the temporary extension is only applicable during ESW piping replacement and will expire in 2026 for Unit 2 and 2027 for Unit 1.

In Enclosure 1 of the LAR, the licensee provided an evaluation of the proposed changes. Section 3.3 of this enclosure contains a list of compensatory measures the licensee will implement during the evolution to replace the ESW piping. In Enclosure 5 of the LAR, the licensee made a regulatory commitment to implement the compensatory measures identified in Section 3.3 of Enclosure 1. It appears that part of the justification for the proposed temporary CTs relies on the compensatory measures in Section 3.3.

Provide justification for the proposed CT language and footnote language that does not mention the compensatory measures. Alternatively, consider rewording the proposed CT language and footnote language to indicate that the 14 day CT is contingent on implementation of the compensatory measures in Section 3.3 of Enclosure 1 to the LAR.

Susquehanna Response

Susquehanna has determined it is necessary to revise the wording of the footnotes modifying Condition B to TS 3.7.1 and Conditions B and C to TS 3.7.2. Specifically, the wording for all

such footnotes has been revised to state, “This Completion Time is only applicable during the Unit [1/2, as appropriate] ‘A’ and ‘B’ ESW piping replacement while the compensatory measures identified in Section 3.3 of Enclosure 1 to letter PLA-7751 are in place. Upon completion of pipe replacement activities, this temporary extension is no longer applicable and will expire on June 25, [2026/2027, as appropriate].”

The revised TS markup pages are provided in Enclosure 2 and the revised clean TS pages are provided in Enclosure 3. The TS pages provided in Enclosures 2 and 3 of this letter supersede the TS pages provided in Enclosures 2 and 3 to the Susquehanna letter dated January 9, 2019 (ADAMS Accession No. ML19009A431), in their entirety.

Enclosure 2 of PLA-7793

Revised Markup Technical Specification Pages

Revised Technical Specifications Pages

Unit 1 TS Pages

3.7-2, 3.7-4, and 3.7-5

Unit 2 TS Pages

3.7-1, 3.7-2, 3.7-3, 3.7-3a, 3.7-3b, 3.7-3c, 3.7-3d, 3.7-3e, and 3.7-4

ACTIONS (continued)

CONDITION	REQUIRED ACTION	COMPLETION TIME
<p>B. One Unit 1 RHRSW subsystem inoperable.</p>	<p>B.1 Restore the Unit 1 RHRSW subsystem to OPERABLE status.</p>	<p>14 days during the replacement of the Unit 2 ESW piping⁽¹⁾</p> <p><u>OR</u></p> <p>72 hours from discovery of the associated Unit 2 RHRSW subsystem inoperable</p> <p><u>AND</u></p> <p>7 days</p>
<p>C. Both Unit 1 RHRSW subsystems inoperable.</p>	<p>C.1 Restore one Unit 1 RHRSW subsystem to OPERABLE status.</p>	<p>8 hours from discovery of one Unit 2 RHRSW subsystem not capable of supporting associated Unit 1 RHRSW subsystem</p> <p><u>AND</u></p> <p>72 hours</p>
<p>D. Required Action and associated Completion Time not met.</p> <p><u>OR</u></p> <p>UHS inoperable.</p>	<p>D.1 Be in MODE 3.</p> <p><u>AND</u></p> <p>D.2 Be in MODE 4.</p>	<p>12 hours</p> <p>36 hours</p>

⁽¹⁾[This Completion Time is only applicable during the Unit 2 'A' and 'B' ESW piping replacement while the compensatory measures identified in Section 3.3 of Enclosure 1 to letter PLA-7751 are in place. Upon completion of pipe replacement activities, this temporary extension is no longer applicable and will expire on June 25, 2027.](#)

3.7 PLANT SYSTEMS

3.7.2 Emergency Service Water (ESW) System

LCO 3.7.2 Two ESW subsystems shall be OPERABLE.

APPLICABILITY: MODES 1, 2, and 3.

ACTIONS

-----NOTE-----
Enter applicable Conditions and Required Actions of LCO 3.8.1, "AC Sources," for DGs made inoperable by ESW.

CONDITION	REQUIRED ACTION	COMPLETION TIME
A. One ESW pump in each subsystem inoperable.	A.1 Restore both ESW pumps to OPERABLE status.	7 days
B. One or two ESW subsystems not capable of supplying ESW flow to at least three required DGs.	B.1 Restore ESW flow to the required DGs to ensure that each ESW subsystem is supplying at least three DGs.	14 days during the replacement of the Unit 2 ESW piping⁽¹⁾ OR 7 days
C. One ESW subsystem inoperable for reasons other than Condition B.	C.1 Restore the ESW subsystem to OPERABLE status.	14 days during the replacement of the Unit 2 ESW piping⁽¹⁾ OR 7 days

[\(1\)This Completion Time is only applicable during the Unit 2 'A' and 'B' ESW piping replacement while the compensatory measures identified in Section 3.3 of Enclosure 1 to letter PLA-7751 are in place. Upon completion of pipe replacement activities, this temporary extension is no longer applicable and will expire on June 25, 2027.](#)

ACTIONS (continued)

CONDITION	REQUIRED ACTION	COMPLETION TIME
<p>D. Required Action and associated Completion Time of Condition A, B or C not met.</p> <p><u>OR</u></p> <p>Both ESW subsystems inoperable for reasons other than Conditions A and B.</p>	<p>D.1 Be in MODE 3.</p> <p><u>AND</u></p> <p>D.2 Be in MODE 4.</p>	<p>12 hours</p> <p>36 hours</p>

SURVEILLANCE REQUIREMENTS

SURVEILLANCE	FREQUENCY
<p>SR 3.7.2.1 -----NOTE----- Isolation of flow to individual components does not render ESW System inoperable. -----</p> <p>Verify each ESW subsystem manual, power operated, and automatic valve in the flow paths servicing safety related systems or components, that is not locked, sealed, or otherwise secured in position, is in the correct position.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>
<p>SR 3.7.2.2 Verify each ESW subsystem actuates on an actual or simulated initiation signal.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>

3.7 PLANT SYSTEMS

3.7.1 Residual Heat Removal Service Water (RHRSW) System and the Ultimate Heat Sink (UHS)

LCO 3.7.1 Two RHRSW subsystems and the UHS shall be OPERABLE.

APPLICABILITY: MODES 1, 2, and 3.

ACTIONS

-----NOTE-----
Enter applicable Conditions and Required Actions of LCO 3.4.8, "Residual Heat Removal (RHR) Shutdown Cooling System-Hot Shutdown," for RHR shutdown cooling made inoperable by RHRSW System.

CONDITION	REQUIRED ACTION	COMPLETION TIME
<p>A. -----NOTE----- Separate Condition entry is allowed for each valve. -----</p> <p>One valve in Table 3.7.1-1 inoperable.</p> <p><u>OR</u></p> <p>One valve in Table 3.7.1-2 inoperable.</p> <p><u>OR</u></p> <p>One valve in Table 3.7.1-3 inoperable.</p>	<p>A.1 Declare the associated RHRSW subsystems inoperable.</p> <p><u>AND</u></p> <p>A.2 Establish an open flow path to the UHS.</p> <p><u>AND</u></p> <p>A.3 Restore the inoperable valve(s) to OPERABLE status.</p>	<p>Immediately</p> <p>8 hours</p> <p>8 hours from the discovery of an inoperable RHRSW subsystem in the opposite loop from the inoperable valve(s)</p> <p><u>AND</u></p> <p>72 hours</p> <p>(continued)</p>

ACTIONS (continued)

CONDITION	REQUIRED ACTION	COMPLETION TIME
<p><u>OR</u></p> <p>Any combination of valves in Table 3.7.1-1, Table 3.7.1-2, or Table 3.7.1-3 in the same return loop inoperable.</p>		<p><u>OR</u></p> <p>7 days during the replacement of 480 V ESS Load Center Transformers 1X210 and 1X220 in Unit 1⁽¹⁾</p>
<p>B. One Unit 2 RHRSW subsystem inoperable.</p>	<p>B.1 Restore the Unit 2 RHRSW subsystem to OPERABLE status.</p>	<p>7 days during the replacement of 480 V ESS Load Center Transformers 1X210 and 1X220 in Unit 1⁽¹⁾</p> <p><u>OR</u></p> <p>14 days during the replacement of the Unit 1 ESW piping⁽²⁾</p> <p><u>OR</u></p> <p>72 hours from discovery of the associated Unit 1 RHRSW subsystem inoperable</p> <p><u>AND</u></p> <p>7 days</p>

⁽¹⁾Upon completion of the replacement of the 480 V ESS Load Center Transformers 1X210 and 1X220 in Unit 1, this temporary extension is no longer applicable and will expire on June 15, 2020.

⁽²⁾[This Completion Time is only applicable during the Unit 1 'A' and 'B' ESW piping replacement while the compensatory measures identified in Section 3.3 of Enclosure 1 to letter PLA-7751 are in place. Upon completion of pipe replacement activities, this temporary extension is no longer applicable and will expire on June 25, 2026.](#)

ACTIONS (continued)

CONDITION	REQUIRED ACTION	COMPLETION TIME
C. Both Unit 2 RHRSW subsystems inoperable.	C.1 Restore one Unit 2 RHRSW subsystem to OPERABLE status.	8 hours from discovery of one Unit 1 RHRSW subsystem not capable of supporting associated Unit 2 RHRSW subsystem <u>AND</u> 72 hours
D. Required Action and associated Completion Time not met. <u>OR</u> UHS inoperable.	D.1 Be in MODE 3. <u>AND</u> D.2 Be in MODE 4.	12 hours 36 hours

SURVEILLANCE REQUIREMENTS

SURVEILLANCE	FREQUENCY
SR 3.7.1.1 Verify the water level is greater than or equal to 678 feet 1 inch above Mean Sea Level.	In accordance with the Surveillance Frequency Control Program

SURVEILLANCE REQUIREMENTS (continued)

SURVEILLANCE	FREQUENCY
<p>SR 3.7.1.2 Verify the average water temperature of the UHS is:</p> <p>a. -----NOTE----- Only applicable with both units in MODE 1 or 2, or with either unit in MODE 3 for less than twelve (12) hours. ----- ≤ 85°F; or</p> <p>b. -----NOTE----- Only applicable when either unit has been in MODE 3 for at least twelve (12) hours but not more than twenty-four (24) hours. ----- ≤ 87°F; or</p> <p>c. -----NOTE----- Only applicable when either unit has been in MODE 3 for at least twenty-four (24) hours. ----- ≤ 88°F.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>
<p>SR 3.7.1.3 Verify each RHRSW manual, power operated, and automatic valve in the flow path, that is not locked, sealed, or otherwise secured in position, is in the correct position or can be aligned to the correct position.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>
<p>SR 3.7.1.4 Verify that valves HV-01222A and B (the spray array bypass valves) close upon receipt of a closing signal and open upon receipt of an opening signal.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>
<p>SR 3.7.1.5 Verify that valves HV-01224A1 and B1 (the large spray array valves) close upon receipt of a closing signal and open upon receipt of an opening signal.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>

SURVEILLANCE REQUIREMENTS (continued)

SURVEILLANCE	FREQUENCY
SR 3.7.1.6 Verify that valves HV-01224A2 and B2 (the small spray array valves) close upon receipt of a closing signal and open upon receipt of an opening signal.	In accordance with the Surveillance Frequency Control Program
SR 3.7.1.7 Verify that valves 012287A and 012287B (the spray array bypass manual valves) are capable of being opened and closed.	In accordance with the Surveillance Frequency Control Program

TABLE 3.7.1-1

Ultimate Heat Sink Spray Array Valves

VALVE NUMBER	VALVE DESCRIPTION
HV-01224A1	Loop A large spray array valve
HV-01224B1	Loop B large spray array valve
HV-01224A2	Loop A small spray array valve
HV-01224B2	Loop B small spray array valve

TABLE 3.7.1-2

Ultimate Heat Sink Spray Array Bypass Valves

VALVE NUMBER	VALVE DESCRIPTION
HV-01222A	Loop A spray array bypass valve
HV-01222B	Loop B spray array bypass valve

TABLE 3.7.1-3

Ultimate Heat Sink Spray Array Bypass Manual Valves

VALVE NUMBER	VALVE DESCRIPTION
012287A	Loop A spray array bypass manual valve
012287B	Loop B spray array bypass manual valve

3.7 PLANT SYSTEMS

3.7.2 Emergency Service Water (ESW) System

LCO 3.7.2 Two ESW subsystems shall be OPERABLE.

APPLICABILITY: MODES 1, 2, and 3.

ACTIONS

-----NOTE-----
Enter applicable Conditions and Required Actions of LCO 3.8.1, "AC Sources," for DGs made inoperable by ESW.

CONDITION	REQUIRED ACTION	COMPLETION TIME
A. One ESW pump in each subsystem inoperable.	A.1 Restore both ESW pumps to OPERABLE status.	7 days
B. One or two ESW subsystems not capable of supplying ESW flow to at least three required DGs.	B.1 Restore ESW flow to the required DGs to ensure that each ESW subsystem is supplying at least three DGs.	14 days during the replacement of the Unit 1 ESW piping⁽¹⁾ OR 7 days
C. One ESW subsystem inoperable for reasons other than Condition B.	C.1 Restore the ESW subsystem to OPERABLE status.	14 days during the replacement of the Unit 1 ESW piping⁽¹⁾ OR 7 days

[\(1\)This Completion Time is only applicable during the Unit 1 'A' and 'B' ESW piping replacement while the compensatory measures identified in Section 3.3 of Enclosure 1 to letter PLA-7751 are in place. Upon completion of pipe replacement activities, this temporary extension is no longer applicable and will expire on June 25, 2026.](#)

Enclosure 3 of PLA-7793

Revised Clean Technical Specification Pages

Revised Technical Specifications Pages

Unit 1 TS Pages

3.7-2, 3.7-4, and 3.7-5

Unit 2 TS Pages

3.7-1, 3.7-2, 3.7-3, 3.7-3a, 3.7-3b, 3.7-3c, 3.7-3d, 3.7-3e, and 3.7-4

ACTIONS (continued)

CONDITION	REQUIRED ACTION	COMPLETION TIME
<p>B. One Unit 1 RHRSW subsystem inoperable.</p>	<p>B.1 Restore the Unit 1 RHRSW subsystem to OPERABLE status.</p>	<p>14 days during the replacement of the Unit 2 ESW piping⁽¹⁾</p> <p><u>OR</u></p> <p>72 hours from discovery of the associated Unit 2 RHRSW subsystem inoperable</p> <p><u>AND</u></p> <p>7 days</p>
<p>C. Both Unit 1 RHRSW subsystems inoperable.</p>	<p>C.1 Restore one Unit 1 RHRSW subsystem to OPERABLE status.</p>	<p>8 hours from discovery of one Unit 2 RHRSW subsystem not capable of supporting associated Unit 1 RHRSW subsystem</p> <p><u>AND</u></p> <p>72 hours</p>
<p>D. Required Action and associated Completion Time not met.</p> <p><u>OR</u></p> <p>UHS inoperable.</p>	<p>D.1 Be in MODE 3.</p> <p><u>AND</u></p> <p>D.2 Be in MODE 4.</p>	<p>12 hours</p> <p>36 hours</p>

⁽¹⁾This Completion Time is only applicable during the Unit 2 'A' and 'B' ESW piping replacement while the compensatory measures identified in Section 3.3 of Enclosure 1 to letter PLA-7751 are in place. Upon completion of pipe replacement activities, this temporary extension is no longer applicable and will expire on June 25, 2027.

3.7 PLANT SYSTEMS

3.7.2 Emergency Service Water (ESW) System

LCO 3.7.2 Two ESW subsystems shall be OPERABLE.

APPLICABILITY: MODES 1, 2, and 3.

ACTIONS

-----NOTE-----
Enter applicable Conditions and Required Actions of LCO 3.8.1, "AC Sources," for DGs made inoperable by ESW.

CONDITION	REQUIRED ACTION	COMPLETION TIME
A. One ESW pump in each subsystem inoperable.	A.1 Restore both ESW pumps to OPERABLE status.	7 days
B. One or two ESW subsystems not capable of supplying ESW flow to at least three required DGs.	B.1 Restore ESW flow to the required DGs to ensure that each ESW subsystem is supplying at least three DGs.	14 days during the replacement of the Unit 2 ESW piping ⁽¹⁾ <u>OR</u> 7 days
C. One ESW subsystem inoperable for reasons other than Condition B.	C.1 Restore the ESW subsystem to OPERABLE status.	14 days during the replacement of the Unit 2 ESW piping ⁽¹⁾ <u>OR</u> 7 days

⁽¹⁾This Completion Time is only applicable during the Unit 2 'A' and 'B' ESW piping replacement while the compensatory measures identified in Section 3.3 of Enclosure 1 to letter PLA-7751 are in place. Upon completion of pipe replacement activities, this temporary extension is no longer applicable and will expire on June 25, 2027.

ACTIONS (continued)

CONDITION	REQUIRED ACTION	COMPLETION TIME
<p>D. Required Action and associated Completion Time of Condition A, B or C not met.</p> <p><u>OR</u></p> <p>Both ESW subsystems inoperable for reasons other than Conditions A and B.</p>	<p>D.1 Be in MODE 3.</p> <p><u>AND</u></p> <p>D.2 Be in MODE 4.</p>	<p>12 hours</p> <p>36 hours</p>

SURVEILLANCE REQUIREMENTS

SURVEILLANCE	FREQUENCY
<p>SR 3.7.2.1 -----NOTE----- Isolation of flow to individual components does not render ESW System inoperable. -----</p> <p>Verify each ESW subsystem manual, power operated, and automatic valve in the flow paths servicing safety related systems or components, that is not locked, sealed, or otherwise secured in position, is in the correct position.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>
<p>SR 3.7.2.2 Verify each ESW subsystem actuates on an actual or simulated initiation signal.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>

3.7 PLANT SYSTEMS

3.7.1 Residual Heat Removal Service Water (RHRSW) System and the Ultimate Heat Sink (UHS)

LCO 3.7.1 Two RHRSW subsystems and the UHS shall be OPERABLE.

APPLICABILITY: MODES 1, 2, and 3.

ACTIONS

-----NOTE-----
Enter applicable Conditions and Required Actions of LCO 3.4.8, "Residual Heat Removal (RHR) Shutdown Cooling System-Hot Shutdown," for RHR shutdown cooling made inoperable by RHRSW System.

CONDITION	REQUIRED ACTION	COMPLETION TIME
<p>A. -----NOTE----- Separate Condition entry is allowed for each valve. -----</p> <p>One valve in Table 3.7.1-1 inoperable.</p> <p><u>OR</u></p> <p>One valve in Table 3.7.1-2 inoperable.</p> <p><u>OR</u></p> <p>One valve in Table 3.7.1-3 inoperable.</p>	<p>A.1 Declare the associated RHRSW subsystems inoperable.</p> <p><u>AND</u></p> <p>A.2 Establish an open flow path to the UHS.</p> <p><u>AND</u></p> <p>A.3 Restore the inoperable valve(s) to OPERABLE status.</p>	<p>Immediately</p> <p>8 hours</p> <p>8 hours from the discovery of an inoperable RHRSW subsystem in the opposite loop from the inoperable valve(s)</p> <p><u>AND</u></p> <p>72 hours</p> <p>(continued)</p>

ACTIONS (continued)

CONDITION	REQUIRED ACTION	COMPLETION TIME
<p><u>OR</u></p> <p>Any combination of valves in Table 3.7.1-1, Table 3.7.1-2, or Table 3.7.1-3 in the same return loop inoperable.</p>		<p><u>OR</u></p> <p>7 days during the replacement of 480 V ESS Load Center Transformers 1X210 and 1X220 in Unit 1⁽¹⁾</p>
<p>B. One Unit 2 RHRWS subsystem inoperable.</p>	<p>B.1 Restore the Unit 2 RHRWS subsystem to OPERABLE status.</p>	<p>7 days during the replacement of 480 V ESS Load Center Transformers 1X210 and 1X220 in Unit 1⁽¹⁾</p> <p><u>OR</u></p> <p>14 days during the replacement of the Unit 1 ESW piping⁽²⁾</p> <p><u>OR</u></p> <p>72 hours from discovery of the associated Unit 1 RHRWS subsystem inoperable</p> <p><u>AND</u></p> <p>7 days</p>

⁽¹⁾Upon completion of the replacement of the 480 V ESS Load Center Transformers 1X210 and 1X220 in Unit 1, this temporary extension is no longer applicable and will expire on June 15, 2020.

⁽²⁾This Completion Time is only applicable during the Unit 1 'A' and 'B' ESW piping replacement while the compensatory measures identified in Section 3.3 of Enclosure 1 to letter PLA-7751 are in place. Upon completion of pipe replacement activities, this temporary extension is no longer applicable and will expire on June 25, 2026.

ACTIONS (continued)

CONDITION	REQUIRED ACTION	COMPLETION TIME
C. Both Unit 2 RHRSW subsystems inoperable.	C.1 Restore one Unit 2 RHRSW subsystem to OPERABLE status.	8 hours from discovery of one Unit 1 RHRSW subsystem not capable of supporting associated Unit 2 RHRSW subsystem <u>AND</u> 72 hours
D. Required Action and associated Completion Time not met. <u>OR</u> UHS inoperable.	D.1 Be in MODE 3. <u>AND</u> D.2 Be in MODE 4.	12 hours 36 hours

SURVEILLANCE REQUIREMENTS

SURVEILLANCE	FREQUENCY
SR 3.7.1.1 Verify the water level is greater than or equal to 678 feet 1 inch above Mean Sea Level.	In accordance with the Surveillance Frequency Control Program

SURVEILLANCE REQUIREMENTS (continued)

SURVEILLANCE	FREQUENCY
<p>SR 3.7.1.2 Verify the average water temperature of the UHS is:</p> <p>a. -----NOTE----- Only applicable with both units in MODE 1 or 2, or with either unit in MODE 3 for less than twelve (12) hours. ----- ≤ 85°F; or</p> <p>b. -----NOTE----- Only applicable when either unit has been in MODE 3 for at least twelve (12) hours but not more than twenty-four (24) hours. ----- ≤ 87°F; or</p> <p>c. -----NOTE----- Only applicable when either unit has been in MODE 3 for at least twenty-four (24) hours. ----- ≤ 88°F.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>
<p>SR 3.7.1.3 Verify each RHRWS manual, power operated, and automatic valve in the flow path, that is not locked, sealed, or otherwise secured in position, is in the correct position or can be aligned to the correct position.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>
<p>SR 3.7.1.4 Verify that valves HV-01222A and B (the spray array bypass valves) close upon receipt of a closing signal and open upon receipt of an opening signal.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>
<p>SR 3.7.1.5 Verify that valves HV-01224A1 and B1 (the large spray array valves) close upon receipt of a closing signal and open upon receipt of an opening signal.</p>	<p>In accordance with the Surveillance Frequency Control Program</p>

SURVEILLANCE REQUIREMENTS (continued)

SURVEILLANCE	FREQUENCY
SR 3.7.1.6 Verify that valves HV-01224A2 and B2 (the small spray array valves) close upon receipt of a closing signal and open upon receipt of an opening signal.	In accordance with the Surveillance Frequency Control Program
SR 3.7.1.7 Verify that valves 012287A and 012287B (the spray array bypass manual valves) are capable of being opened and closed.	In accordance with the Surveillance Frequency Control Program

TABLE 3.7.1-1

Ultimate Heat Sink Spray Array Valves

VALVE NUMBER	VALVE DESCRIPTION
HV-01224A1	Loop A large spray array valve
HV-01224B1	Loop B large spray array valve
HV-01224A2	Loop A small spray array valve
HV-01224B2	Loop B small spray array valve

TABLE 3.7.1-2

Ultimate Heat Sink Spray Array Bypass Valves

VALVE NUMBER	VALVE DESCRIPTION
HV-01222A	Loop A spray array bypass valve
HV-01222B	Loop B spray array bypass valve

TABLE 3.7.1-3

Ultimate Heat Sink Spray Array Bypass Manual Valves

VALVE NUMBER	VALVE DESCRIPTION
012287A	Loop A spray array bypass manual valve
012287B	Loop B spray array bypass manual valve

3.7 PLANT SYSTEMS

3.7.2 Emergency Service Water (ESW) System

LCO 3.7.2 Two ESW subsystems shall be OPERABLE.

APPLICABILITY: MODES 1, 2, and 3.

ACTIONS

-----NOTE-----
Enter applicable Conditions and Required Actions of LCO 3.8.1, "AC Sources," for DGs made inoperable by ESW.

CONDITION	REQUIRED ACTION	COMPLETION TIME
A. One ESW pump in each subsystem inoperable.	A.1 Restore both ESW pumps to OPERABLE status.	7 days
B. One or two ESW subsystems not capable of supplying ESW flow to at least three required DGs.	B.1 Restore ESW flow to the required DGs to ensure that each ESW subsystem is supplying at least three DGs.	14 days during the replacement of the Unit 1 ESW piping ⁽¹⁾ <u>OR</u> 7 days
C. One ESW subsystem inoperable for reasons other than Condition B.	C.1 Restore the ESW subsystem to OPERABLE status.	14 days during the replacement of the Unit 1 ESW piping ⁽¹⁾ <u>OR</u> 7 days

⁽¹⁾This Completion Time is only applicable during the Unit 1 'A' and 'B' ESW piping replacement while the compensatory measures identified in Section 3.3 of Enclosure 1 to letter PLA-7751 are in place. Upon completion of pipe replacement activities, this temporary extension is no longer applicable and will expire on June 25, 2026.