

CNS OPERATIONS MANUAL SYSTEM OPERATING PROCEDURE 2.2.71 SERVICE WATER SYSTEM	USE: REFERENCE EFFECTIVE: 8/5/04 APPROVAL: SORC/IQA OWNER: OSG SUPV DEPARTMENT: OPS
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REVISION VERIFICATION:
(initial use + every 7 days)

REV.	DATE	CHANGES
73	8/4/04	Revised gland water lineup to ensure MOV open before closing crosstie valve.
74	see above	Revised guidance for SW-21, SW-28, SW-1479, and SW-1480 to be sealed valves.

1. PURPOSE

This procedure provides instructions for Operations personnel to operate the Service Water (SW) System.

2. PRECAUTIONS AND LIMITATIONS

- [] 2.1 Gland water flow to SW pump bearings should be maintained at ≥ 1.5 gpm at all times. Maximum water flow to bearings is 15 gpm.
- [] 2.2 Avoid pump runout; rated full load SW pump motor current is 42 amps.

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- [] 2.3 At river temperatures approaching 95°F, maintain REC HX outlet temperature below 98°F per Procedure 2.2.65.1.©
- [] 2.4 Pump motor may draw high current due to silting if pump has not been operated for an extended period, such as following a pump rebuild. In addition, inadequate clearance between pump impeller and liner may cause pump motor to draw high current. Per CR 94-0530 evaluation, pump motor may operate at a steady state current of up to 48 amps for a maximum of 10 minutes after a cold motor start. If current does not lower to ≤ 42 amps within 10 minutes from time pump motor was started, remove pump from service and wait at least 2 hours from time pump was stopped before attempting another start.
- [] 2.5 Sealed valves shall be controlled per Procedure 2.0.2.
- [] 2.6 Observe following 4160V motor starting restrictions:
 - [] NOTE 1 - A start is closure of motor supply breaker.
 - [] NOTE 2 - A cold motor is a motor which has been idle for at least 2 hours.
 - [] NOTE 3 - A hot motor is a motor which has been energized within last 2 hours.
- [] 2.6.1 A motor shall be at a stop prior to a start attempt.
 - [] 2.6.1.1 A cold motor shall have no more than two initial start attempts. Each additional start shall be preceded by a 1 hour wait.
 - [] 2.6.1.2 A hot motor shall have no more than one initial start attempt. Each additional start attempt shall be preceded by a 1 hour wait.
- [] 2.7 SW-STNR-A(B), SW ZURN STRAINERS, have an administrative out of service time of 10 days. If the out of service time cannot be met, there are no specific actions required. However, increased Management involvement would be prudent to assist in swift resolution of problems which caused the out of service time to be exceeded.©
- [] 2.8 With a SW zurn strainer bypassed and SW System in its normal three pump configuration, pump rotation should be altered to keep two pumps running in subsystem with operable strainer while swapping other two pumps as required.©