

# WATERFORD 3 SES PLANT OPERATING MANUAL

VOLUME 9 SECTION 6 MM-6-002 REVISION 0 APPROVAL DATE: 8-12-81

MAINTENANCE PROCEDURE VALVE OPERATOR REPAIR

UNCONTROLLED COPY

DO NOT USE IN ANY SAFETY-RELATED TESTING, MAINTENANCE, OR OPERATIONAL ACTIVITY

PORC Meeting No. 81-25

Reviewed: hairman

Approved:

Flant Manager

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## WATERFORD 3 SES

### PLANT OPERATING MANUAL

## CHANGE/REVISION/DELETION REQUEST

Procedure No. MM-6-002	Title Value Operator Repair	
Effective Date	(if different from approval date)	
Complete A, B, or C A. Change No		
B. Revision No. <u>O</u> C. Deletion <u>N/A</u>		
REASON FOR CHANGE, REVISION, O To delete SAP-09 refer on BI-Annual review	ence and add UNT-5.003 as reference	
REQUIRED SIGNATURES	Summer Data 9-6-83	
Technical Review _ Jany M.	Bagrand Date 9/10/83	
SAFETY EVALUATION		
Does this change, revision, or	deletion: YES	NO
1. Change the facility as des	scribed in the FSAR?	-
2. Change the procedures as d	described in the FSAR?	-
3. Conduct tests/experiments	not described in the FSAR?	-
4. Create a condition or cond	duct an operation which ex-	-
ceeds, or could result in	exceeding, the limits in	
Technical Specifications?		
If the answer to any of the at	bove is yes, complete and at-	
tach a 10 CFR 50.59 Safety Eva	aluation checklist.	
Safety Evaluation film Mr. &	Bergannet Date _ 916 83	-
Group/Dep't. Head Review find	brinantin Date _ S/6/5	-
Temporary Approval*	Date ()	(20W
Temporary Approval*	Date	
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PART Pariau LE M. A. Lun	Date 9-23-83 Meeting No. 83-38	
Plant Manager Nuclear Approva	1 Marshund Date 10/12/22	-
*Temporary approval must be f	followed by Plant Manager-Nuclear approve	ai
within 14 days.		

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Attachment 6.9 (1 of 1)

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LIST OF EFFECTIVE PAGES

Title	Revision 0
1 - 8	Revision 0
2,4	Change 1
2,4	Change 2

## WATERFORD 3 SES PLANT OPERATING MANUAL CHANGE/REVISION/DELETION REQUEST

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Procedure No. MAR-6-172 Title Marte Operation Action
Effective Date (if different from PA-A approval date)
Complete A. B. or C
A. Change No. 1
B. Revision No
C. Deletion NA
REASON FOR CHINGE, REVISION, OR DELETION
Reference to SAP-08, Condition Identification and Corrective Action or UNT5-002,
Condition Identification and Work Authorization, as applicable.
REQUIRED SIGNATURES
Originator Rede Rede Date 10-21-22
Technical Review NIA REK Date NIA REK
SAFETY EVALUATION
Does this change, revision, or deletion: YES NO
1 Change the facility as described in the FSAR?
Change the receives as described in the FS4R?
2. Change the procedures as described in the FSAR?
3. Conduct tests/experiments not described in the tomit
4. Create a condition of conduct an operation white the
ceeds, or could result in exceeding, the limits in
Technical Specifications?
If the answer to any of the above is yes, complete and at-
tach a 10 CFR 50.59 Safety Evaluation checklist.
Safety Evaluation Rutho Date Date
Group/Dep't. Head Review NIA REA Date MIE Tothe
Temporary Approval Ann Aun Date 0-25-82 (NOS)
Temporary Approval & Couldry Date M-17-1
QC Review Date Date Date
PORC Review Milleman Date 10/20/12 Heeting No. \$2-43A
Plant Manager-Nuclear Approval Date Date 10-28-FL
*Temporary approval must be followed by Plant Manager-Nuclear approval
within 14 days.

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#### 1.0 FURPOSE

- 1.1 This procedure provides the instructions for the performance of corrective maintenance on valve operators for safety and nonsafety-related valves at the Waterford 3 SES.
- 1.2 This procedure is intended to provide the overall instuctions for the repair activity with the specific how to instructions to be provided by the procedures referenced in Section 2.0 and the components' technical documents such as vendor manuals, instructions, bulletins and drawings. These instructions shall be delineated on a Condition Identification Work Authorization Form (CIWA) and/or within the procedures referenced in Section 2.0.
- 1.3 The repair activities herein include:

1.3.1 Replacement of the Operator

1.3.2 Replacement of Operator Parts

1.3.3 Operator Installation

1.3.4 Operator Testing

#### 2.0 REFERENCES

- 2.1 MM-1-002, Mechanical Maintenance Practices
- 2.2 MM-1-012, MMD Data Information System
- 2.3 MM-1-054, Weld Documentation Control
- 2.4 MM-6-011, General Torquing and Detensioning
- 2.5 Plant Lubrication Manual

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- 2.6 ASME Boiler and Pressure Vessel Code Section XI, 1977 Edition through Summer 78 Addenda
- 2.7 SAP-08, Condition Identification and Corrective Action
- 2.8 SEP-09, Tassing UNT- 5.003 Cleavance Requests Approval and Release
- 2.9 HP-1-110, Radiation Work Permits
- 2.10 MM-1-003, Solvents and Sealants

2.11 MD-1-006, Control and Repair of Failed Equipment 2.12 Condition Identification and Work Authorization, UNT-5-002 3.0 PREREOUISITES

- 3.1 Prior to the performance of the repair activity ensure the component is shutdown and tagged in accordance with Reference 2.8, Tagging; to prevent personnel injury or equipment damage or both.
- 3.2 Obtain a Radiation Work Permit in accordance with Reference 2.9, Radiation Work Permits, when it's designated on the CIWA of Reference 2.7, Condition Identification and Corrective Action, or Reference 2.12, Condition Identification and Work Authorization, as applicable.
- 3.3 Ascertain the applicable technical documents per the listings of Reference 2.2, MMD Data Information System.
- 4.0 PRECAUTIONS AND LIMITATIONS

4.1 As specified on the applicable CIWA.

5.0 INITIAL CONDITIONS

5.1 As specified on the applicable CIWA

6.0 MATERIAL AND TEST EQUIPMENT

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6.1 As specified on the applicable CIWA

#### 7.0 ACCEPTANCE CRITERIA

7.1 The acceptance criteria is the satisfactory operation of the component during the testing of Section 8.5 and as specified on the CIWA.

#### 8.0 PROCEDURE

8.1 General

- 8.1.1 Welding on or to any of the components or subparts shall be performed in accordance with Reference 2.3, Weld Documentation Control.
- 8.1.2 Torquing and detensioning of any of the components' parts shall be performed in accordance with Reference 2.4, General Torquing and Detensioning, unless otherwise specified in the components' technical documents.
- 8.1.3 Component lubricants shall be those specified for the component in Reference 2.5, Plant Lubrication Manual.
- 8.1.4 Replacement parts should be the same as, or equivalent to, the original part. Safety Class 1, 2, and 3 pressure retaining parts, such as casings, casing holdown nuts, bolts and studs, and seals, shall be replaced with original parts or equivalent as specified through the appropriate plant design control procedures.
- 8.1.5 Component repair documentation, hold point designation, personnel qualification requirements and other

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administrative functions shall be performed in accordance with Reference 2.1, Mechanical Maintenance Practices.

- 8.2 Replacement of the Operator
  - 8.2.1 When operators are determined to be nonrepairable, they are to be removed and replaced with operators that are suitable replacements. Operators for safety class 1, 2, and 3 valves shall be replaced with operators meeting the orginal or equivalent criteria as determined by the Mechnical Assistant Superintendent (MAS) in conjunction with Plant Engineering.
- 8.3 Replacement of Operator Parts
  - 8.3.1 When operator parts are determined to be nonrepairable, they are be removed and replaced with vendorsupplied replacement parts or parts fabricated by this utility from materials meeting the original or equivalent criteria as determined by the MAS in conjunction with Plant Engineering.
  - 8.3.2 Diaphragms, "O" rings, packing, gaskets and other soft materials that are no longer pliable, are cracked, or show signs of dry rot shall be removed and replaced.
  - 8.3.3 When replacing diaphragms, carefully inspect the diaphragm cavity for foreign material or burrs that could damage the new diaphragm.

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- 8.3.4 "O" rings, "O" ring grooves, and "O" ring seating surfaces should be coated with a light coat of an approved lubricant in accordance with Reference 2.5, Plant Lubrication Manual, prior to installation to ease the installation and to guard against abrasive damage during installation.
- 8.3.5 Cylinder barrels and rods of piston type operators should be inspected for scores or burrs that could damage internal "O" rings or packing.
- 8.4 Operator Installation
  - 8.4.1 Clean all pressure ports and piping thoroughly before making pressure connections. Foreign particles in the piping or on the pressure ports can be carried to the positioner. The presence of foreign particles in the positioner can cause the unit to malfunction.
  - 8.4.2 Mounting bolts and nuts for all operators should be tightened evenly after installation. Uneven tightening of bolts and nuts can result in erratic operation and unusual wear on bearing surfaces. Refer to the applicable vendor manual (or if not available, Reference 2.4, General Torquing and Detensioning) for proper torque values and sequence on all mounting bolts and nuts.
  - 8.4.3 Adjusting screw threads, external and internal, should be coated with a light film of an approved lubricant in accordance with Reference 2.5, Plant Lubrication Manual.

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8.4.4 Threaded stainless steel parts turning and/or shouldering on other stainless steel parts should have their surfaces coated with an approved lubricant in accordance with Reference 2.5, Plant Lubrication Manual.

8.5 Operator Testing

- 8.5.1 An operational test should be performed on all operators which have been repaired and data recorded on the applicable CIWA or reference procedure's attachments. The MAS may determine test criteria from the preoperational test procedures, vendor manuals, operational data, and surveillance procedures.
- 8.5.2 Operators for Safety Class 1, 2, and 3 valves, which are governed by Reference 2.6, ASME BPVC Section XI, shall be tested in accordance with an approved procedure.

9.0 SETPOINTS

9.1 As specified on the CIWA

10.0 ATTACHMENTS

11.0 COMMITMENTS AND REFERENCES