

Model C, F, and P Pig Valve - Manually Operated Flow Direction Change

Created: Aicel De Vera	Reviewed: Andrew Neehall	Approved: Alisdair Blackley	ECN No.
Date: 13 May 2022	Date: 17 Mar 2023	Date: 17 Mar 2023	02711

The information on this document is strictly confidential and may not be reproduced in any way without prior written permission of Argus
 PRINTED COPIES ARE UNCONTROLLED

1.0 PURPOSE

To outline a work instruction for the safe and proper reversal of flow direction for Model C, F, and P manually operated Pig Valves.

2.0 SCOPE

To outline the resources, steps, and precautions required to ensure safe and proper assembly and disassembly of the Model C, F, and P manually operated Pig Valves for stem stop repositioning when changing flow direction. This only applies to Pig Valves without an external equalization line.

As of the 25th edition of API 6D, valves with a right-to-left flow direction are not considered compliant and cannot receive the API monogram. For further details see GB-PV-002.

3.0 REFERENCE STANDARDS

ASTM B16.34	Valves - Flanged, Threaded and Welding End
API 6D	Specification for Pipeline Valves
API 6DR	Recommended Practice for the Repair and Remanufacture of Pipeline Valves

4.0 PREPARATION

- 4.1 Required tools
 - 4.1.1 Snap ring pliers
 - 4.1.2 Engraving/stamping tools

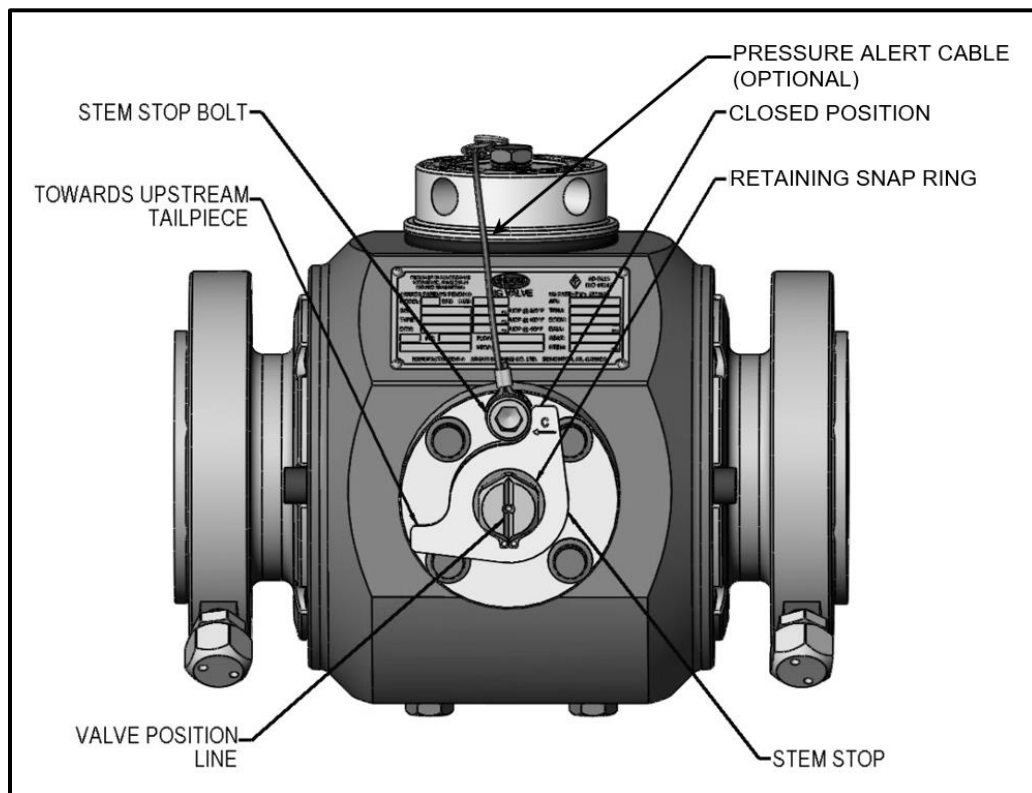
5.0 STEM STOP ORIENTATION


Figure 1: Stem Stop Orientation for Wrench Operated Valves

**Model C, F, and P Pig Valve - Manually Operated Flow Direction Change**

The information on this document is strictly confidential and may not be reproduced in any way without prior written permission of Argus
PRINTED COPIES ARE UNCONTROLLED

6.0 FLOW DIRECTION CHANGE FOR MANUALLY OPERATED VALVES

Warning: Pig Valves with exposure to sour media should only be serviced or disassembled within a certified facility by a company certified to handle sour valves.

Note: This procedure only applies to Pig Valves that **do not have external equalization lines**.

- 6.1 Pig Valve must be in **closed** position.
- 6.2 Remove retaining snap ring from stem.
- 6.3 Observe position of stem stop: one lobe (stamped with "C--->") is shouldered against stem stop bolt, while other lobe is pointed in direction of **upstream** tailpiece.
- 6.4 Remove stem stop and flip over.
- 6.5 Install stem stop so that one lobe (lobe stamped with "C--->" if applicable) is shouldered against other side of stem stop bolt, and other lobe is pointed in direction of **new upstream** tailpiece.
- 6.6 Reinstall retaining ring.

7.0 NAMEPLATE MODIFICATIONS

Note: A repair nameplate must be ordered from Argus sales and affixed to Pig Valve. This will enable proper documentation of any changes made to Pig Valve's configuration. Argus will update history of Pig Valve to ensure future inquiries or trouble shooting are accurately addressed.

- 7.1 In section of original nameplate labeled "S/N" serial number must be updated with addition of an "M" following current number to signify that it has been modified.
- 7.2 If lower left box on original nameplate is blank, stamp "MODIFIED" in this field.
- 7.3 If changes were made to Pig Valve's flow direction, sender/receiver configuration, or pig stopper location, strike out information contained in "FLOW", "TYPE", and/or "STOP" fields of original nameplate, respectively.

Note: The following steps apply to repair nameplate.

- 7.4 In box labeled "REPAIRED BY" stamp name of company performing repair/modification.
- 7.5 In box labeled "DATE" stamp date when repair/modification was performed.

Note: Leave all remaining boxes blank unless there has been a change made to specification of Pig Valve during repair/modification.

- 7.6 In box labelled "SEAT" stamp seat material used.
- 7.7 In box labeled "FLOW" stamp either "L--->R", or "L<---R" to reflect any change to flow direction of Pig Valve.
- 7.8 In box labeled "TYPE" stamp either "SENDER" or "SNDR", or "RECEIVER" or "RCVR".
- 7.9 In box labeled "STOP" stamp either "NONE", "UPSTREAM" or "DOWNSTREAM" to reflect position of pig stopper in relation to flow.
- 7.10 For 2" and 3" Pig Valves, repair nameplate shall be affixed to right side of back of Pig Valve, opposite original nameplate. For 4" and 6" Pig Valves, repair nameplate shall be affixed directly to right of original nameplate.

8.0 MARKING MODIFICATIONS

Note: The following steps only apply if information is stenciled on tailpieces (e.g. flow direction). Tailpieces may or may not be stenciled depending on date of manufacture of Pig Valve.

- 8.1 Flow direction arrow will need to be either removed or painted over on both tailpieces.
- 8.2 If function of Pig Valve has changed, text "SENDER" or "RECEIVER" should also be either removed or painted over.