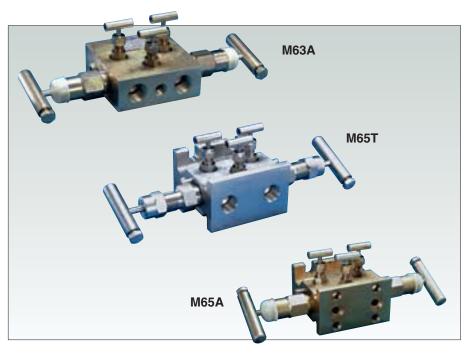


Natural Gas Manifolds – M63A, M65T and M65A 5-Valve Manifolds



Product Overview 3/8-inch [9.5 mm] Orifice

This product series parallels the M6A series but with the larger ³/₈-inch [9.5 mm] orifices. The series was developed to answer two needs: 1) a larger valve orifice to assure positive line drainage where wet gas and hydrates are a problem; and 2) to match the flange tap drilling of ³/₈-inch [9.5 mm] reducing signal variance when pulsating flow is experienced and the manifold (M65A) is mounted as close to the flange outlet as practical.

Features and Benefits

- The valves are identical for all three manifold configurations:
 - M63A pipe x pipe
 - M65T pipe x flange
 - M65A flange x flange
- As with the M6A series, the M63A is generally mounted and supported by the ³/₈-inch or ¹/₂-inch tubing lines for orifice meter applications.
- The M65T and M65A may be pipestand mounted with the appropriate AGCO Mount Kit to support a differential transmitter. Advantages of AGCO Mount are: that installation may be made prior to availability of the transmitter; and, easier and faster removal of transmitter for maintenance since transmitter is supported only by the manifold.
- Soft seats are available in a variety of materials to suit sweet or sour gas.
- The seats are field replaceable without removing the manifold.
- Bonnet assemblies have blow-out proof stems that seal and isolate the packing when the valve is fully open.
- Packing is below the stem threads for corrosion protection.

Natural Gas Manifolds - M63A Specifications

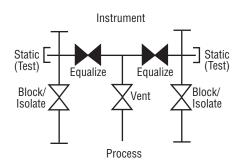
M63A Dimensions, inches [mm] ¹/₂ - 14 NPT 3.88 [98.6] -Instrument Connection 2 Places 1/4 - 18 NPT Static (Test) Ports 2 Places 4.00 [101.6] 1.44 [36.6] Block/Isolate 2.12 [53.8] 1/2 - 14 NPT Valve Process Connection 2 Places A Max. Open Vent Valve Equalize Valve 3.35 1.50 [38.1] 0.75 [19.1] -[85.1] Max. Open 1/4 - 18 NPT Port

M63A Dimensions, inches [mm]

Packing	A			
Teflon®	11.90 [302.3]			
O-ring	11.36 [288.5]			

Notes

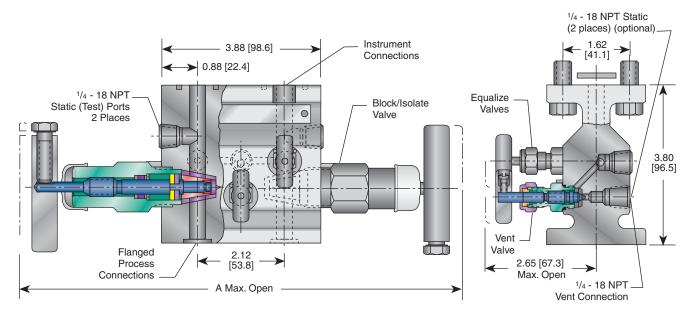
- Approximate valve weight: 8.0 lb [3.6 kg]. 0.375-inch [9.5 mm] diameter orifice. Valve C_v 3.0 maximum.
- Bottom static (test) connections available. See options, page 137.



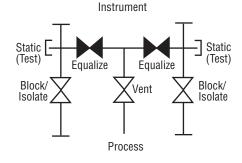
Vent Connection

Natural Gas Manifolds - M65A Specifications

Dimensions, inches [mm]



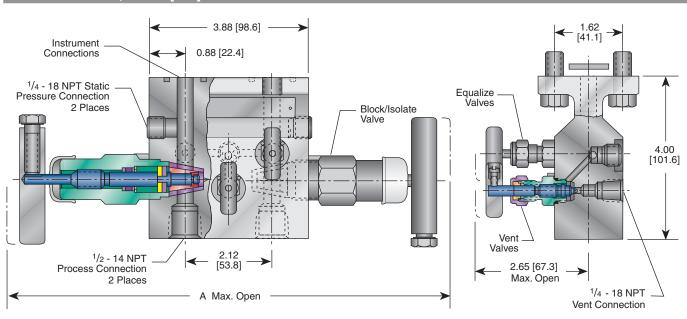
Dimensions, inches [mm]				
Packing	A			
Teflon®	11.90	[302.3]		
O-ring	11.36	[288.5]		



- Approximate valve weight: 7.6 lb [3.4 kg]. 0.375-inch [9.5 mm] diameter orifice. Valve C_v 3.0 maximum.
- Bottom static pressure connections ¹/₄-inch -18 NPT available (see options page 137).
- PCTFE (Polychlorotrifluoroethylene) is the exact equivalent of Kel-F®.
- M65A Installation Kit consists of 4 bolts
 ⁷/16-inch 20 x 1-inch A193-B7, 4 washers,
 and 2 Teflon® gaskets.

Natural Gas Manifolds - M65T Specifications

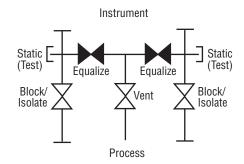
M65T Dimensions, inches [mm]



M65T Dimensions, inches [mm]

Packing	A
Teflon®	11.90 [302.3]
O-ring	11.36 [288.5]

- 1. Approximate valve weight: 7.6 lb [3.4 kg]. 0.375-inch [9.5 mm] diameter orifice. Valve $C_{\rm V}$ 3.0 maximum.
- Bottom static pressure connections 1/4-inch - 18 NPT available (see options page 137).
- M65T Installation Kit consists of 4 bolts
 ⁷/₁₆-inch-20 x 1-inch A193-B7, 4 washers,
 and 2 Teflon® gaskets.



Natural Gas Manifolds – M63A, M65T and M65A Specifications

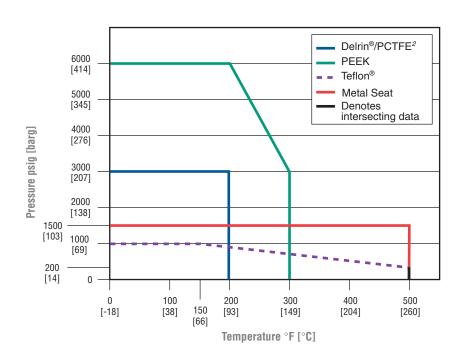
Standard Materials					
Valve	Seat	Body	Bonnet	Stem	Flow Washer
CS1	Soft	A1052	A108	A582-303	316
SS	Soft	A479-316 ³	A479-316	A276-316	316
SG4	Soft	A479-316	A479-316	Monel® R405	316
SG36	Soft	Hastelloy® C-276	Hastelloy® C-276	Hastelloy® C-276	Hastelloy®

Pressure and Temperature Ratings						
Packing	Seat Material	Seat	Standard Bolting		SS Bolting	
Teflon®, O-ring	Delrin® PCTFE5	Soft	3000 psig @ 200°F	[207 barg @ 93°C]	3000 psig @ 200°F	[207 barg @ 93°C]
Teflon®, O-ring	PEEK	Soft	6000 psig @ 200°F 3000 psig @ 300°F	[414 barg @ 93°C] [207 barg @ 149°C]	4500 psig @ 100°F 3000 psig @ 300°F	[310 barg @ 38°C] [207 barg @ 149°C]
Teflon®	Teflon®	Soft	1000 psig @ 150°F 200 psig @ 500°F	[69 barg @ 66°C] [14 barg @ 260°C]	1000 psig @ 150°F 200 psig @ 500°F	[69 barg @ 66°C] [14 barg @ 260°C]
Teflon®	SS	Metal	1500 psig @ 500°F	[103 barg @ 260°C]	1500 psig @ 500°F	[103 barg @ 260°C]

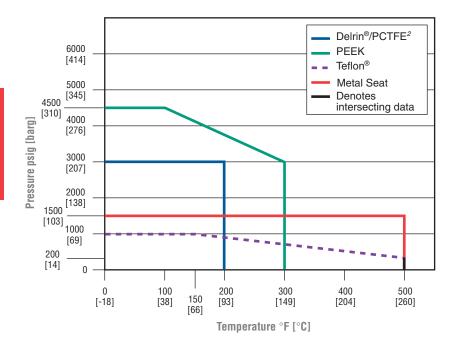
- 1. CS parts are zinc cobalt plated.
- 2. M63A body material is A108
- 3. M63A body material is A240-316.
- 4. SG (Sour Gas) meets the requirements of NACE MR0175-2002.
- 5. PCTFE (Polychlorotrifluoroethylene) is the exact equivalent of Kel-F $^{\circledR}$.
- 6. SG3 (Sour Gas) meets the requirements of NACE MR0175-2003.

Natural Gas Manifolds – M63A¹, M65T and M65A Specifications

Pressure vs. Temperature – Standard Bolting



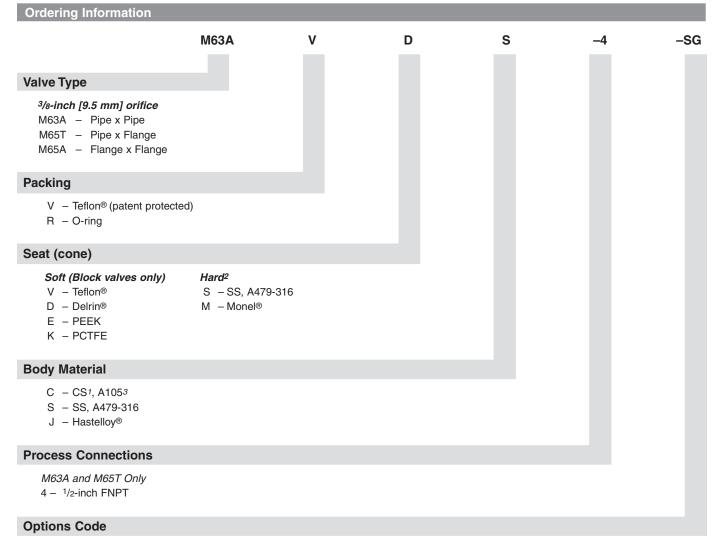
Pressure vs. Temperature – SS Bolting³



Note

- 1. Use left Pressure Temperature Ratings column for M63A.
- 2. PCTFE (Polychlorotrifluoroethylene) is the exact equivalent of Kel-F®.
- 316 SS bolts lower pressure ratings to a maximum of 4500 psi [310 barg]. Consult factory for full rating with 316 SS bolts.

Natural Gas Manifolds – M63A, M65T and M65A Specifications



- -AM AGCO Mount Kit for 2-inch pipestand mounting of manifold (page 138).
- -BC Accessory bracket for mounting conduit with AGCO Mount
- Accessory bracket for mounting purge meters with AGCO Mount
- -CL Cleaned for Chlorine Service.
- -OC Cleaned for Oxygen Service.
- -HD Hydrostatic testing includes test report (MSS-SP-61)
- -R3V Add when mounting to Rosemount® Model 3051C, 2024, 3095, specify on all components, use SS columns for rating except for M63A.
- -SG Sour Gas meets the requirements of NACE MR0175-2002. (SS valves only) (Not available for O-ring packed valves)
- -SG3 Sour Gas meets the requirements of NACE MR0175-2003
- -SSA SS flange bolts (grade 18-8) Maximum pressure rating 4500 psi [310 barg]
- -SSC SS flange bolts (316 SS) Maximum pressure rating 4500 psi [310 barg]
- Test/Calibration Ports (bottom of manifold) ¹/₄-inch -18 NPT, 2 places, M65T, M65A only.
- -EL () Installed street elbows in static test ports (M65T and M65A only) Elbows provided with ¹/4-inch NPT Plugs
 - EL1 Elbow facing bottom of manifold
 - EL2 Elbow facing outlet of manifold
 - EL3 Elbow facing top of manifold
- -SP Special Requirements provide complete description of requirements.

- 1. CS is zinc cobalt plated to resist corrosion.
- 2. Equalizer valve is ball seated. Ball material is 316 SS for SS body, 17-4 PH for CS body.
- 3. M63A is A108-1018.