

Jerguson™ Gages for Fisher™ Displacer Cages

Jerguson gages are used on the displacer cages of liquid level sensors to provide a visual indication of liquid level interface. Jerguson offers two styles of flat-glass gages (reflex and transparent) and a tubular glass gage. The reflex gage gives a clean line of separation, with the liquid showing black in contrast to the mirror-like surface. The transparent gage shows the level and also the color and/or the interface of the liquid. The flat glass gages have metal enclosures to provide gage glass protection. Standard tubular glass gages are equipped with four guard rods and holders.

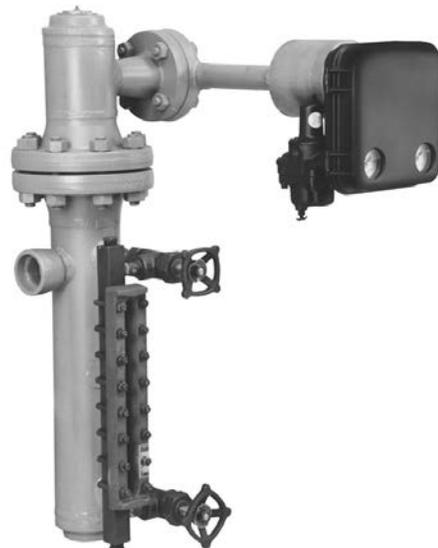
Jerguson steel gage valves are equipped with stainless steel ball checks, located upstream from the seats to immediately shut off the flow in case of gage glass breakage.

Refer to tables 1, 2, and 3 for specific information describing gage types and pressure/temperature limits. For saturated steam ratings above the values listed, consult your [Emerson sales office](#) or Local Business Partner. Dimensions for the reflex, transparent, and tubular gages are shown in figure 1 and tables 4 and 5.



W2252-1

TYPICAL TUBULAR GLASS GAGE



W2269-1

**TYPICAL FLAT GLASS GAGE
(REFLEX OR TRANSPARENT)**

**Table 1. Flat Glass Gages and Gage Valves for Mid-Range Pressure/Temperature Applications
(Used on Fisher 249 and 249B Displacer Gages)**

JERGUSON GAGE		GAGE VALVE TYPE NUMBER	DISPLACER LENGTH	PRESSURE RATINGS AT GIVEN TEMPERATURES						PRESSURE RATINGS FOR SATURATED STEAM ⁽¹⁾
Type Number	Style			38°C (100°F)	93°C (200°F)	150°C (300°F)	205°C (400°F)	260°C (500°F)	315°C (600°F)	
19-RCH-20	Reflex	64	14 Inches (356 mm)	155 bar (2250 psig)	148 bar (2150 psig)	138 bar (2000 psig)	128 bar (1850 psig)	117 bar (1700 psig)	107 bar (1550 psig)	20.7 bar (300 psig)
37-RCH-20	Reflex	67	32 Inches (813 mm)	173 bar (2510 psig)	164 bar (2380 psig)	153 bar (2220 psig)	142 bar (2060 psig)	131 bar (1900 psig)	119 bar (1730 psig)	20.7 bar (300 psig)
19-TMCH-20	Transparent	64	14 Inches (356 mm)	69.0 bar (1000 psig)	65.5 bar (950 psig)	62.1 bar (900 psig)	58.6 bar (850 psig)	51.7 bar (750 psig)	46.5 bar (675 psig)	24.1 bar (350 psig)

1. For saturated steam ratings above the listed values, contact your [Emerson sales office](#) or Local Business Partner.

**Table 2. Flat Glass Gages and Gage Valves for Heavy-Duty High Pressure/Temperature Applications
(Used on Fisher 249 and 249B Displacer Gages)**

JERGUSON GAGE		GAGE VALVE TYPE NUMBER	DISPLACER LENGTH	PRESSURE RATINGS AT GIVEN TEMPERATURES							PRESSURE RATINGS FOR SATURATED STEAM ⁽¹⁾
Type Number	Style			38°C (100°F)	93°C (200°F)	150°C (300°F)	205°C (400°F)	260°C (500°F)	315°C (600°F)	371°C (700°F)	
19-TMCH-32	Transparent	64	14 Inches (356 mm)	207 bar (3000 psig)	201 bar (2920 psig)	197 bar (2850 psig)	192 bar (2780 psig)	179 bar (2600 psig)	159 bar (2310 psig)	139 bar (2020 psig)	51.7 bar (750 psig)

1. For saturated steam ratings above the listed values, contact your Emerson sales office or Local Business Partner.

Table 3. Tubular Glass Gages⁽¹⁾

Jerguson Gage Valve Type Number	Displacer Length	Type of Glass	Pressure/Temperature Ratings
136	14 Inches (356 mm)	Standard Wall Glass	13.8 bar at 65°C (200 psig at 150°F) 6.9 bar at 224°C (100 psig at 425°F)

1. Do not use tubular glass gages on steam service.

Table 4. Dimensions A and B (also see figure 2)

Displacer Length	Type Number	Style	A (Visible Length)	B	
14 Inches (356 mm)	19-RCH-20	Reflex	321 mm (12.62 Inches)	406 mm ⁽¹⁾ (16.00 Inches)	394 mm ⁽²⁾ (15.50 Inches)
	19-TMCH-20	Transparent	321 mm (12.62 Inches)		
	19-TMCH-32		289 mm ⁽¹⁾ (11.38 Inches)		
	---	Tubular Glass	251 mm ⁽²⁾ (9.88 Inches)		
32 Inches (813 mm)	37-RCH-20	Reflex	857 mm (33.75 Inches)	---	851 mm ⁽²⁾ (33.50 Inches)

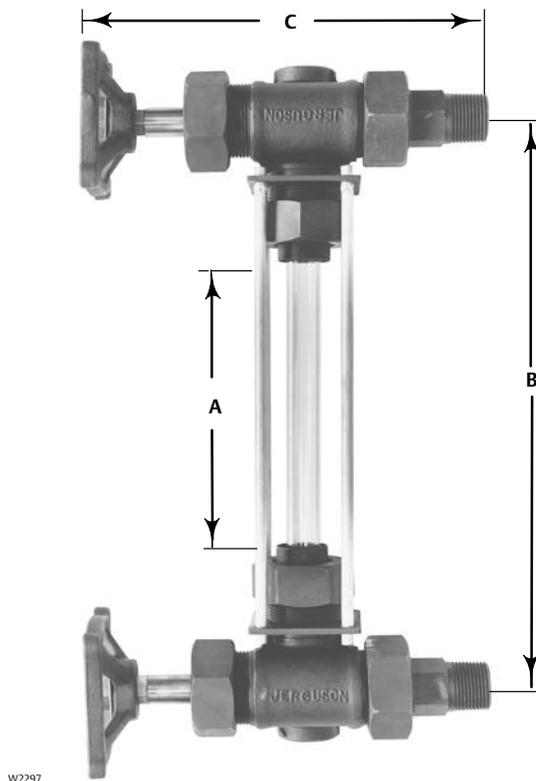
1. For 249 displacer cages.
2. For 249B displacer cages.

Table 5. Dimension C (also see figure 2)

Gage Valve Type Number ⁽¹⁾	Dimension
64	233 mm (9.2 Inches)
67	233 mm (9.2 Inches)

1. Gage valve is in the closed position.

Figure 1. Typical Gage Dimensions (also see tables 4 and 5)



W2297

Ordering Information

Specify the following information when ordering a gage and gage valves:

1. Process temperature and pressure.
2. Jerguson gage type:
 - a. Reflex,
 - b. Transparent, or
 - c. Tubular
3. Jerguson gage valve type number.
4. Fisher displacer type number and length.

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Emerson Automation Solutions
Marshalltown, Iowa 50158 USA
Sorocaba, 18087 Brazil
Cernay 68700 France
Dubai, United Arab Emirates
Singapore 128461 Singapore

www.Fisher.com

