

DIRECT COUPLED DIAPHRAGM SEAL- BAR STOCK

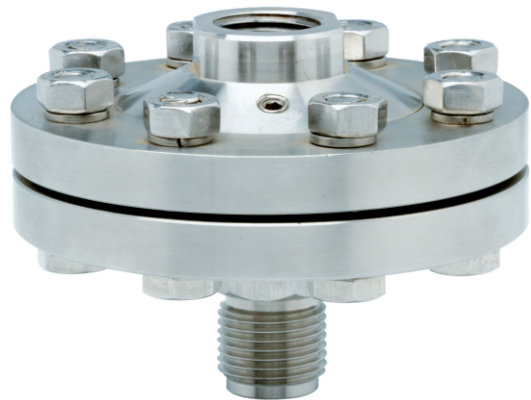
TGI22-1

APPLICATIONS

- Separation systems
- Isolation applications
- Viscous & corrosive media
- High-pressure applications
- High vibration application

FEATURES

- Rigid construction
- Laser welded diaphragm
- Optional exotic materials



DIRECT COUPLED DIAPHRAGM SEAL, TGI22-1

DESCRIPTION

General

Thread design : ANSI B1.20.1 / BS EN ISO 228-1

Storage temperature : -40...+65°C

Service temperature : 370°C max.

Weld joints : Laser welding for Diaphragm and
TIG argon arc welding for other parts

Material of construction

Sensing element : Diaphragm

Top chamber material : ASTM A105 / AISI 304 SS / AISI 316SS-Made from Solid Bar,
Diaphragm : AISI 316L SS / Monel 400 / Hastelloy C-276
Inconel 600 / Titanium / Tantalum

Bottom chamber material : AISI 304SS / AISI 316 SS

AISI 316L SS / Monel / Titanium / Tantalum

Hastelloy C-276 / PVC[#] / PVDF[#] / Polypropylene

PTFE -Made from solid Bar

Hardware : AISI 304 SS

GASKET : PTFE

Capillary : AISI 304 SS / AISI 316 SS

Armour : AISI 304 SS / AISI 316 SS / PVC

Remote distance : 0.25 Mtr. to 25 Mtr.

Check temperature & pressure rating with factory before ordering.

Standard version

Seal type : -1...0...21 bar [Eco] / -1...0...70 bar [Standard] /
100...400 bar [High pressure]

Instrument connection : 1/2" NPT (F) / 1/2" BSP (F)

Sealing fluid : Silicon DC 200 [-40...205°C]

Process connection : 1/2" NPT (M) / 1/2" BSP (M)

Wetted parts protection

Lining on bottom chamber [Code E67]

Material : PTFE - 2 mm thick

Service temperature : 200°C max.

Lining on Diaphragm [Code E68]

Material : PTFE - 100 Micron thick

Service temperature : 150°C max.

Coating on Bottom chamber & diaphragm [Code E69]

Material : PTFE [spray coated & oven baked]

Service temperature : 150°C max.

Filling liquids Vs Temperature range

CODE	Fluid Name	Temperature Range
L1	Silicon DC 200	-40°C to 205°C
L2	Glycerin	10°C to 150°C
L3	Food Grade oil	-20°C to 140°C
L4	Syltherm 800	-40°C to 315°C
L5	Silicon DC 710	7°C to 371°C

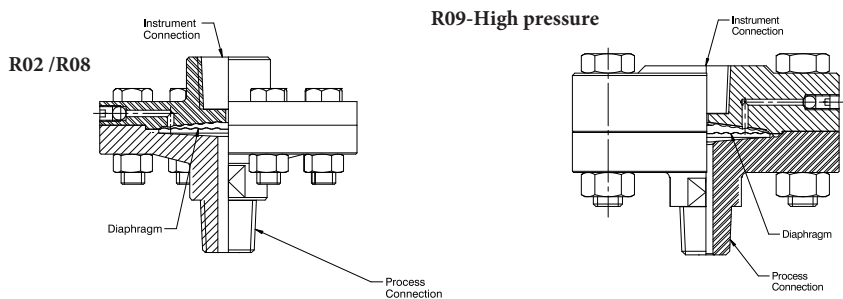
DIRECT COUPLED DIAPHRAGM SEAL - BAR STOCK

TGI22-1

ORDERING CODES						
MODEL						TGI22-1
TGI22-1 Direct coupled diaphragm seal						
SEAL TYPE						R02
R02	-1...0...70 bar [Standard]		R08	100...210 bar [High Pr. 1]	R09 250...400 bar [High Pr. 2]	
TOP CHAMBER						S01
S09	ASTM A105		S01	AISI 304 SS	S02 AISI 316 SS	
DIAPHRAGM						S03
S03	AISI 316L SS		S05	Monel 400	S10 Hastelloy C-276	
S06	Inconel 600		S07	Titanium	S08 Tantalum	
BOTTOM CHAMBER						S02
S01	AISI 304 SS		S02	AISI 316 SS	S03 AISI 316L SS	
S05	Monel 400		S10	Hastelloy C-276	S07 Titanium	
S08	Tantalum		S11	PTFE	S16 PVC	
S18	Polypropylene		S19	PVDF		
INSTRUMENT CONNECTION						P28
P28	½" NPT (F)		P23	¼" BSP (F)	P27 ½" BSP (F)	
P24	¼" NPT (F)					
PROCESS CONNECTION						P08
P04	¼" NPT (M)		P08	½" NPT (M)	P20 M20 X 1.5 mm (M)	
P03	¼" BSP (M)		P05	3/8" BSP (M)	P07 ½" BSP (M)	
P28	½" NPT (F)		P23	¼" BSP (F)	P27 ½" BSP (F)	
P24	¼" NPT (F)					
All other connections are available on request.						L1
SEALING FLUID						
XX As per Filling liquid Vs Temperature Rating table						R1
EXECUTION						
R1	Direct		R2	Remote		
CAPILLARY MATERIAL						XX
S01	AISI 304 SS		S02	AISI 316 SS		
ARMOUR MATERIAL						XX
S01	AISI 304 SS		S02	AISI 316 SS	S16 PVC [Ambient ≤60°C]	
REMOTE DISTANCE						XXXXX
XXXXX	500 mm (Min.) to 25000 mm (Max.)					
OTHER OPTIONS						XXX
E77	Dry Seal		E31	Material test certificate 3.1	E32 Material test certificate 2.2	

Ordering Example : TGI22-1-R02.S01.S03.S02.P28.P08.L1.R1/XX.XX.XXXXX/XXX

GA DRAWING



- NOTES
1. Standard GA Drawing. Not to scale.
 2. Detailed GA Drawings are available, kindly contact factory.