

BTT 22

"Thin-Film Steel Diaphragm, Suitable for Chemical Applications, Resistant to Vibrations"



- Completely welded thin-film steel diaphragm structure that does not require o-ring
- 23 mm diameter stainless steel housing
- Different options up to 1000 Bar
- Resistant to vibrations
- Resistant to chemicals
- 4...20mA / 0...10VDC etc. different analogue output options
- G1/4, G1/2, NPT1/4, NPT1/2, M14x1 mechanical connection options
- EMC and reverse polarity protection
- High accuracy and stability
- Excellent long-term operation

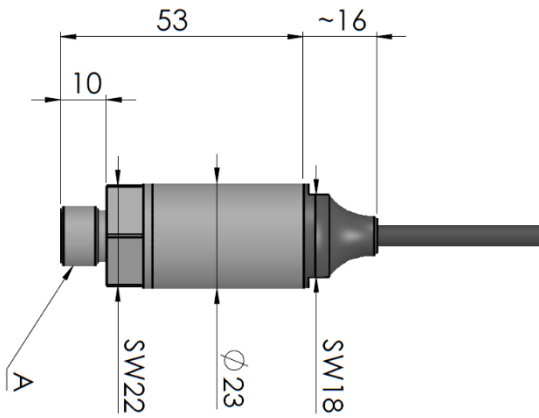
BTT 22 series pressure transmitter is resistant to vibrations and ideal for use in difficult areas such as chemical applications with its completely welded thin-film steel diaphragm structure that does not require o-ring. Various analog output, mechanical connection and connector options are optionally available.

APPLICATIONS

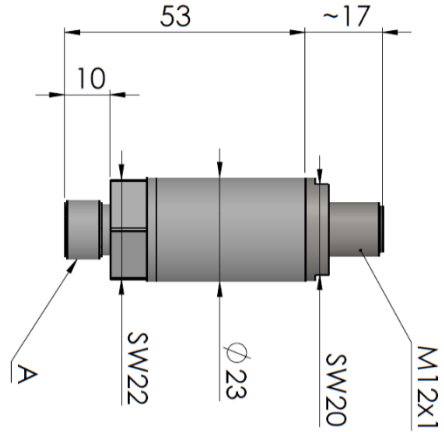
- Machine tools
- HVAC
- Process technology
- Hydraulics
- Refrigeration
- Water treatment

MECHANICAL DIMENSIONS (mm)

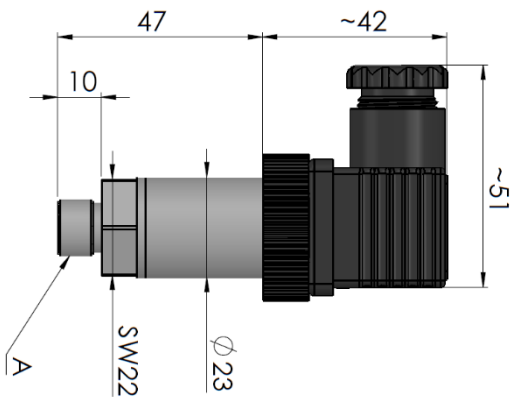
CABLE



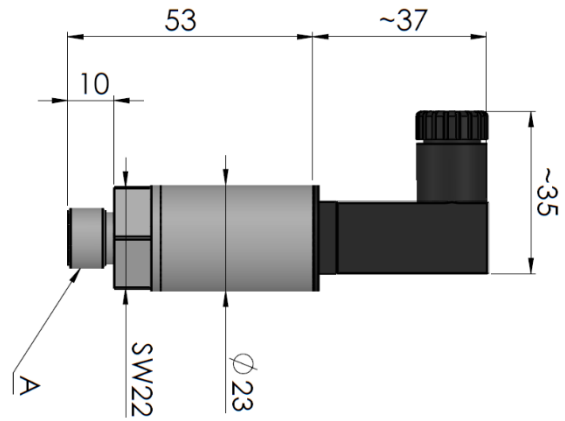
M12 CONNECTOR



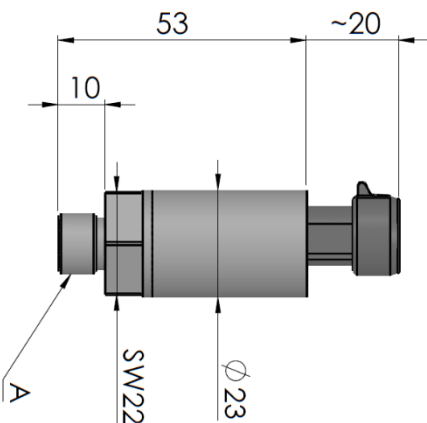
DIN43650-A CONNECTOR



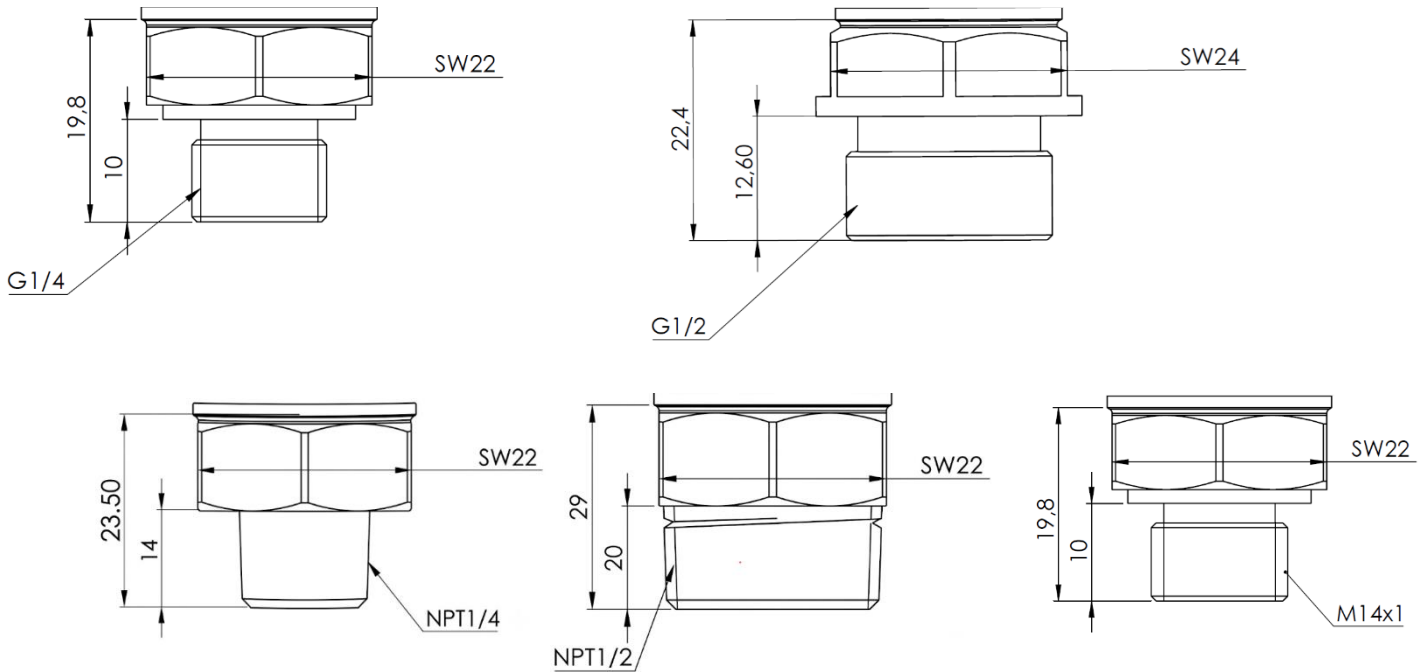
DIN43650-C CONNECTOR



PACKARD CONNECTOR



PROCESS CONNECTION (A)

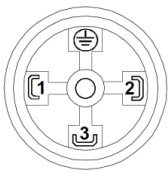
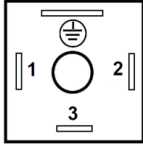
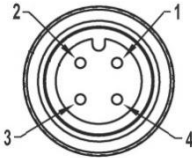
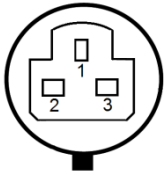
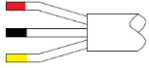


- * In the case of the G1/2 model, the dimension of key slot is 24mm. All other models are 22mm.
- ** Do not turn the product by holding from socket during installation. Otherwise, the product may be damaged.

TECHNICAL FEATURES

Measuring Principle	Thin-film on steel diaphragm					
Measuring Range	6, 10, 16, 25, 40, 100, 250, 400, 600 and 1000 bar					
Over Pressure	%300FS <1000Bar, %150FS ≥1000Bar					
Burst Pressure	%500FS (Max. 4000 bar)					
Output Signal	4...20mA (2 wire)	0...20mA (3 wire)	0...10VDC	1...6VDC	0...5VDC	Ratiometric
Supply Voltage	8 ... 32 VDC	12 ... 30 VDC	12 ... 30 VDC	12 ... 30 VDC	12 ... 30 VDC	5 VDC
Operating Current	30 mA max.					
Accuracy	±0.5%FS (@0°C~70°C)					
Long Term Stability	≤±%0.1 FS/ year					
Zero temperature drift	±%0.03FS/°C					
Full scale temperature drift	±%0.03FS/°C					
Response time	25ms (standard) %10...%90 nominal pressure 1ms, 5ms, 125ms (optional, only available on models with current output)					
Life Time	1x10 ⁸ cycles					
Operating Temperature	-40°C ... +85°C					
Storage Temperature	-40°C ... +85°C					
EMC Protection	Immunity	IEC 61000-6-2				
	Emission	IEC 61000-6-3				
Insulation Resistance	≥1000MΩ/500V AC					
Electrical Connection	DIN43650-A, DIN43650-C, M12, Packard or cable					
Process Connection	G1/4, G1/2, NPT1/4, NPT1/2, M14x1					
Mounting Torque	15 ... 20 Nm					
Material	Pressure	316L Stainless Steel				
	Process	316L Stainless Steel				
	Body	304L Stainless Steel				
Protection	IP65 or IP67 **IP67 protection is provided if M12 connector models are equipped with press-printed					

ELECTRICAL CONNECTIONS

							
		DIN D43650-A	DIN D43650-C	M12 / 4 pin		PACKARD	CABLE
		S30	S31	S12	S15	S32	COLOR
		PIN NO	PIN NO	PIN NO		PIN NO	
CURRENT OUTPUT	+Vcc	2	2	2	1	B	RED
	Analog Out	1	1	1	3	C	BLACK
VOLTAGE OUTPUT	+Vcc	2	2	2	1	B	RED
	GND	1	1	1	3	C	BLACK
	Analog Out	3	3	3	2	A	YELLOW

- * For IP67 protection at model with M12 socket, press-printed cable should be used. Otherwise, it can not be used under IP67 conditions.
- ** PVC cable is used as standard in the model with cable.
- *** On models with the PACKARD socket, the letter of pin numbers are 1(C), 2(B), 3(A).
- **** Only S30 socket type can be selected for 3-wire 0-20mA analog output. Other socket types or wired models cannot be selected.

PRESSURE RANGE SELECTION

Code	Pressure Range	Overpressure	Burst Pressure
6Bar	0~6Bar	%300FS	%500FS
10Bar	0~10 Bar	%300FS	%500FS
16Bar	0~16Bar	%300FS	%500FS
25Bar	0~25Bar	%300FS	%500FS
40Bar	0~40Bar	%300FS	%500FS
100Bar	0~100Bar	%300FS	%500FS
250Bar	0~250Bar	%300FS	%500FS
400Bar	0~400Bar	%300FS	%500FS
600Bar	0~600Bar	%300FS	%500FS
1000Bar	0~1000Bar	%150FS	%500FS

ORDER CODE

Output Signal

Voltage Output Product
V : 0-10VDC (standard)
V1 : 0-5VDC
V2 : 1-6VDC
V3 : 0,5-4,5VDC
V4 : 0,5-5,5VDC
V5 : 1-5VDC
V6 : 1-10VDC

Ratiometric Products
V8 : Ratiometric 0.5-4.5VDC
V9 : Ratiometric 0-5VDC

Current Output Products
A : 4-20mA (2-wire) (standard)
A0 : 0-20mA (3-wire)

* Ask for other options.

Electrical Connection

S12 : M12x1 4 pin
S13 : M12x1 5 pin (for CANopen output)
S15 : M12x1 4 pin (1 supply, 3 output)
S30 : DIN43650-A type large type socket
S31 : DIN43650-C type small type socket
S32 : Packard socket
2M : 2 meters cable

*Only S30 socket can be selected for 3-wire 0-20mA (A0) analog output. Other socket types or wired models cannot be selected.

* Ask for other options.

BTT 22
—
250Bar
—
A
—
G1/4
—
S30

Pressure Range

Different options from 6 Bar to 1000 Bar
*See. "Pressure selection table"

Mechanical Connection

G1/4
G1/4F (female)
G1/2
NPT1/4
NPT1/2
M14

* Ask for other options.

Sample Order Code: BTT 22 250Bar A G1/4 S30