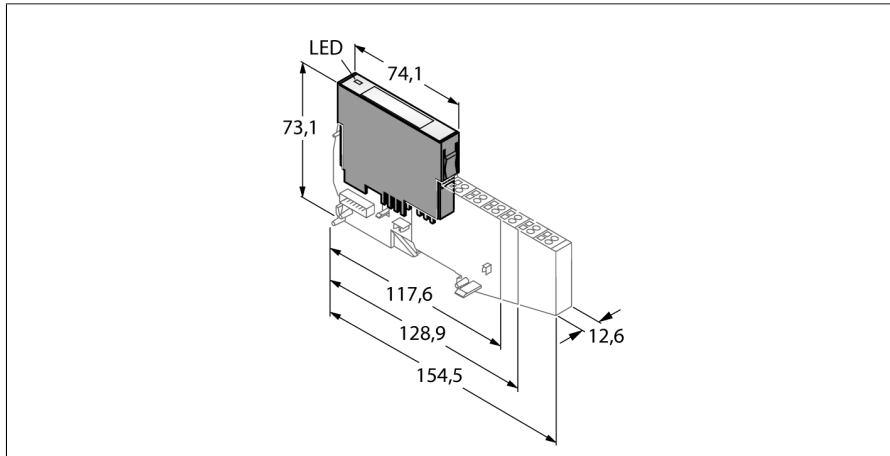


# BL20 electronic module

## 2 Analog Inputs for Pt and Ni Sensors

### BL20-2AI-PT/NI-2/3



- Fieldbus and connection technology independent
- Protection class IP20
- LEDs indicate status and diagnostic
- Electronics galvanically separated from the field level via optocouplers
- 2 analog inputs for Pt100, Pt500 and Pt1000 as well as for Ni100 and Ni1000

#### Functional principle

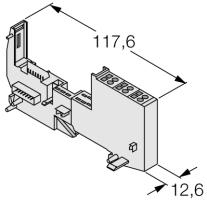
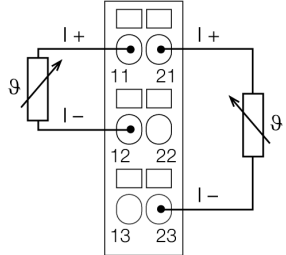
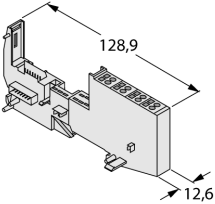
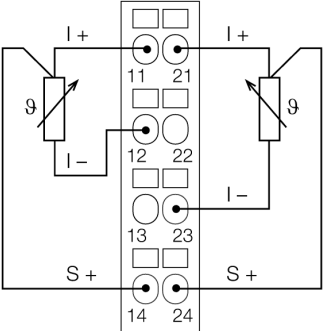
BL20 electronic modules are plugged into the purely passive base modules which are used for connection of field devices. Maintenance is significantly facilitated due to separation of the connection level from the module electronics. Furthermore flexibility is enhanced because the base modules provide a choice of tension spring or screw connection technology.

The electronic modules are completely independent of the type of higher level field bus through the use of gateways.

Type	BL20-2AI-PT/NI-2/3
ID	6827017
Number of channels	2
Rated voltage from the supply terminal	24 VDC
Nominal current from field supply	≤ 30 mA
Nominal current from module bus	≤ 45 mA
Power dissipation, typical	≤ 1 W
<b>Inputs</b>	
Input type	Pt100, Pt200, Pt500, Pt1000, Ni100, Ni1000
Electrical isolation	electronics for the field level
Output connectivity	Screw, tension spring
Maximum limiting frequency analog	2 Hz
Linearity	≤ 0.1 %
Basic fault limit at 23 °C	< 0.2 %
Repeatability	0.05 %
Temperature coefficient	< 300 ppm/°C of full scale
Resolution	16 Bit
Measured-value display	16 bit signed integer 12 bit full range left-justified
Cycle time	≤ 200 ms
Measuring current	< 1 mA
Number of diagnostics bytes	2
Number of parameter bytes	4

Dimensions (W x L x H)	12.6 x 74.1 x 55.4 mm
Approvals	CE, cULus, zone 2, Class I, Div. 2
Ambient temperature	0...+55 °C
Storage temperature	-25...+85 °C
Relative humidity	15...95 %, no condensation allowed
Vibration test	Acc. to EN 61131
Shock test	Acc. to IEC 60068-2-27
Drop and topple	acc. to IEC 68-2-31 and free fall to IEC 68-2-32
Electromagnetic compatibility	Acc. to EN 50082-2
Protection class	IP20
MTTF	576 years acc. to SN 29500 (Ed. 99) 20 °C

## Compatible base modules

Dimension drawing	Type	Pin configuration
	<p><b>BL20-S3T-SBB</b> 6827044 Tension spring connection</p> <p><b>BL20-S3S-SBB</b> 6827045 Screw connection</p>	<p>2-wire Connection</p> 
	<p><b>BL20-S4T-SBBS</b> 6827046 Tension spring connection</p> <p><b>BL20-S4S-SBBS</b> 6827047 Screw connection</p>	<p>3-wire Connection</p> 

**Accessories**

Type code	Ident no.		Dimension drawing
ZBW5-2BETÄTIGUNGSWE	6827106	Tension spring tool	