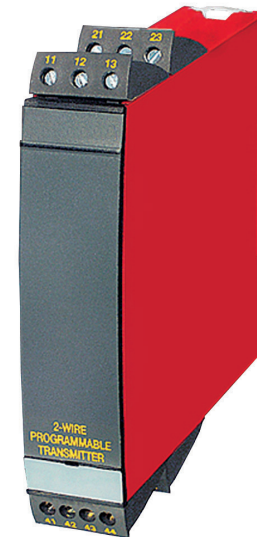


2-Wire Programmable Transmitter

Model 6334B

- TC or mV Input
- Extremely High Measurement Accuracy
- 1.5 kVAC Galvanic Isolation
- Programmable Sensor Error Value
- 1- or 2-Channel Version
- Complies with European ATEX Requirements for Hazardous Location Installation



Application:

- Linearized temperature measurement with TC sensor.
- Amplification of bipolar mV signals to a 4...20 mA signal, optionally linearized according to a defined linearization function.

Technical Characteristics:

- Within seconds the user can program a 6334B to measure temperatures within all standard TC ranges.
- Cold junction compensation (CJC) via a built in temperature sensor.
- A limit can be programmed on the output signal.
- Continuous check of vital stored data.

Mounting/Installation:

- Mounted vertically or horizontally on a DIN rail. Using the 2-channel version up to 84 channels per meter can be mounted.

TC to 4...20mA



2-wire installation in control room



Voltage to 4...20 mA



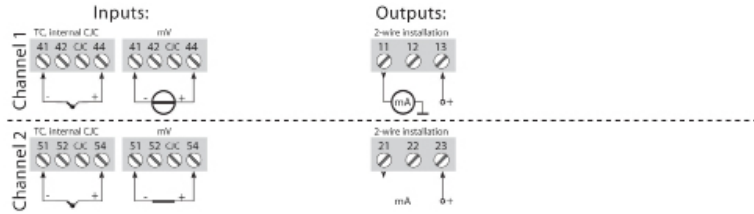
2-wire installation in control room



Ideas. Solutions. Success.

Specifications

**Order: 6334B2A (Single Channel)
6334B2B (Dual Channel)**



Electrical Specifications

Specifications Range:

-40°C to +60°C

Common Specifications:

Supply voltage, DC.....7.2...30 VDC
 Internal consumption0.17...0.8 W
 Voltage drop7.2 VDC
 Isolation voltage, test / operation1.5 kVAC / 50 VAC
 Isolation voltage, ch. 1 / ch. 2.....1500 VAC
 Warm-up time.....5 min.
 Communications interfaceLoop Link
 Signal/noise ratioMin. 60 dB
 Response time (programmable).....1...60 s
 EEPROM error check< 3.5 s
 Signal dynamics, input.....18 bit
 Signal dynamics, output.....16 bit
 Calibration temperature20...28°C

Accuracy, the greater of general and basic values:

General Values		
Input Type	Absolute Accuracy	Temperature Coefficient
All	≤ ± 0.05% of span	≤ ± 0.01% of span / °C

Basic Values		
Input Type	Basic Accuracy	Temperature Coefficient
Volt	≤ ± 10 µV	≤ ± 1 µV / °C
TC Type; E, J, K, L, N, T, U	≤ ± 1°C	≤ ± 0.05°C / °C
TC type: B, R, S, W3, W5, LR	≤ ± 2 °C	≤ ± 0.2°C / °C

EMC immunity influence	< ± 0.5% of span
Extended EMC immunity: NAMUR NE 21, A criterion, burst.....	< ± 1% of span

Effect of supply voltage variation< 0.005% of span / VDC
 Max. wire size.....1 x 1.5 mm² (16 AWG) stranded wire
 Humidity< 95% RH (non-cond.)
 Dimensions (H x W x D).....109 x 23.5 x 104 mm
 Protection degreeIP20
 Weight (1 / 2 channels).....145 / 185 g

Electrical Specifications, Input:

Max. offset.....50% of selected max. value

TC Input:

Type	Min. Temp.	Max. Temp.	Min. Span	Standard
B	+400°C	+1820°C	200°C	IECS84
E	-100°C	+1000°C	50°C	IECS84
J	-100°C	+1200°C	50°C	IECS84
K	-180°C	+1372°C	50°C	IECS84
L	-100°C	+900°C	50°C	DIN 43710
N	-180°C	+1300°C	100°C	IECS84
R	-50°C	+1760°C	200°C	IECS84
S	-50°C	+1760°C	200°C	IECS84
T	-200°C	+400°C	50°C	IECS84
U	-200°C	+600°C	75°C	DIN43710
W3	0°C	+2300°C	200°C	ASTM E988-90
W5	0°C	+2300°C	200°C	ASTM E988-90
LR	-200°C	+800°C	50°C	GOST 3044-84

Cold junction compensation.....< ±1.0 °C

Voltage Input:

Measurement range.....-12...150 mV
 Min. span5 mV
 Input resistance.....10 MΩ

Current Output:

Signal range4...20 mA
 Min. signal range.....16 mA
 Updating time440 ms
 Load resistance.....≤ (Vsupply - 7.2) / 0.023[Ω]

Sensor Error Detection:

Programmable3.5...23 mA

EEx / I.S. Approval*:

KEMA 06ATEX0115 X.....II 1 G
 EEX ia IIC T6...T5
 Max. ambient temperature.....T6: -40°C ≤ Ta ≤ 40°C
 T5: -40°C ≤ Ta ≤ 60°C
 Applicable in zone0, 1 or 2

Ex / I.S. data*:

Output, terminal 11...13, (21...23):
 U_o.....:30 VDC
 I_o.....:120 mA DC
 P_o.....:0.84 W
 L_i.....:10 µH
 C_i.....:1.0 nF
 Input, terminal 41...44, (51...54):
 U_o.....:9.6 VDC
 I_o.....:25 mA DC
 P_o.....:60 mW
 L_i.....:33 mH
 C_o.....:2.4 µF

GOST R Approval*.....Available upon request.

Observed Authority Requirements: Standard:

EMC 2004/108/ECEN 61326-1
 ATEX 94/9/EC.....EN 50014, EN 50020
 EN 50284

Of Span = Of the presently selected range

Loop Link = PC compatible programming software

IS = Intrinsically Safe

*The transmitter is manufactured by PR electronics. All approvals listed are recognized under the PR name.

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