



Description

This low-cost analogue current-output measuring amplifier is intended for amplifying bridge output signals from sensors that employ strain gauges for measurement. A connected sensor is supplied from a voltage source incorporated in the measuring amplifier.

For calibration, there are potentiometers for adjusting the zero setting, the amplification, and the calibration-check signal. During the calibration check, the output signal is checked with no load on the sensor; in that condition, the measuring amplifier should give the same output signal as it would at the nominal load of the sensor. The zero setting of the system consisting of a sensor and a measuring amplifier, can be readjusted even after installation.

The measuring amplifier is supplied in a robust die-cast aluminium housing, which has two holes for simple mounting. Connection and output cables can be adapted to suit the customer's requirements.

In the encapsulated version, the internal connections are soldered and cables are provided for external connection. Optionally, screw terminals can be provided for connecting the customer's leads.

Features

- | Single-channel version
- | Current output 4-20 mA
- | Integral sensor supply
- | Encapsulated version, IP 67
- | Die-cast aluminium housing
- | Optional screw terminals (-> IP 65)

Applications

- | Amplifier for industrial strain gauges

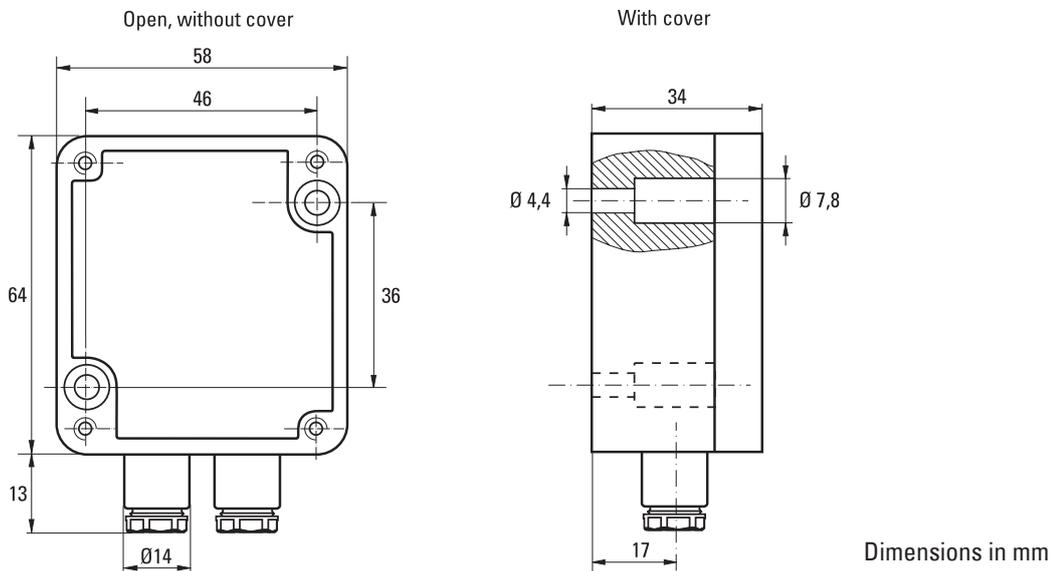
Technical Data

Supply voltage	12-18V, optionally 24V
Input signal	0.5-2 mV/V
Bridge excitation voltage	8V
Bridge resistance	>350 Ω
Cut-off frequency	3 Hz (others on request)
Output signal	4-20 mA (other levels on request)
Linearity	0.5 % f.s.
Nominal temperature range	-10 °C to +50 °C
Operating temperature range	-30 °C to +50 °C
Temperature coeff., amplification	<0.2 % f.s./10 K
Temperature coeff., zero-setting	<0.2 % f.s./10 K
Housing	aluminium die-casting
Dimensions	58 mm x 64 mm x 34 mm
Connections	soldered
Cable	to customer's requirements
Degree of protection	encapsulated, IP 67

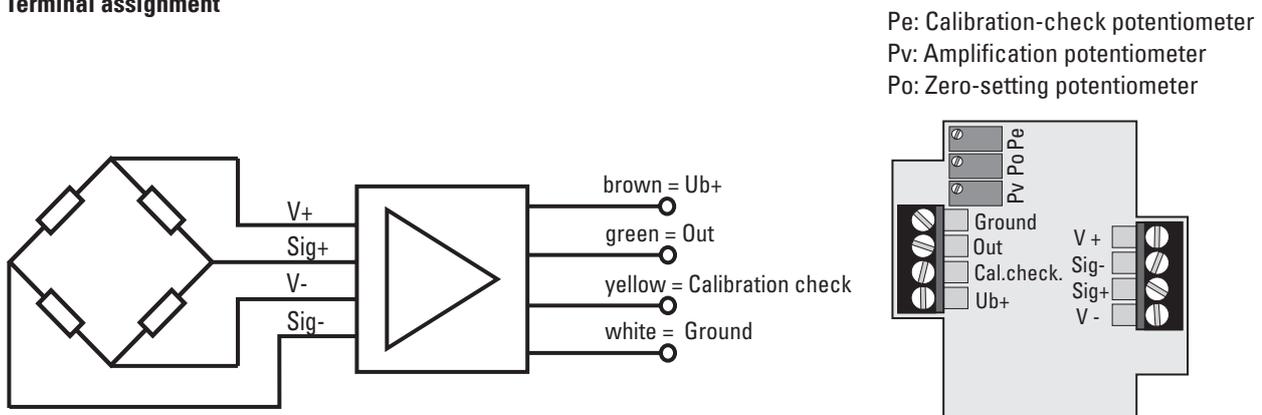
Options

Screw terminals, 2x4 connections
(-> degree of protection IP 65)

Dimensions



Terminal assignment



Calibration check: with no load on sensor, connect calibration check to Ground; the signal output should then have the same value as it would at the nominal load of the sensor.