**Description**

The analogue voltage-output measuring amplifier MV 2.0 is intended for amplifying bridge output signals from sensors that employ strain gauges for measurement. It is suitable for both static and dynamic applications. There is a choice of several different signal variants, including for bi-directional operation. A connected sensor is supplied from a voltage source incorporated in the measuring amplifier.

For calibration, there are potentiometers for adjusting the zero setting and the amplification. 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
- Voltage output in many variants
- Integral sensor supply
- Encapsulated version, IP 67
- Die-cast aluminium housing
- Optional screw terminals (-> IP 65)

**Applications**

- Amplifier for industrial strain gauges
### Selection table

<table>
<thead>
<tr>
<th>Supply voltage</th>
<th>Output, variant A</th>
<th>Output, variant B</th>
</tr>
</thead>
<tbody>
<tr>
<td>5 V</td>
<td>±2.5 V</td>
<td>0 - 2.5 V</td>
</tr>
<tr>
<td>12 V</td>
<td>±2.5 V</td>
<td>0 - 2.5 V</td>
</tr>
<tr>
<td>24 V</td>
<td>±2.5 V</td>
<td>0 - 2.5 V</td>
</tr>
</tbody>
</table>

### Technical Data

- **Input signal**: 2 mV/V (others on request)
- **Bridge excitation voltage**: 5 V
- **Bridge resistance**: 80 - 5000 Ω
- **Current draw / 350 Ω**: ca. 25 mA
- **Cut-off frequency**: 200 Hz (others on request)
- **Linearity**: <0.02 % 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**: <0.15 % 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, 2 x 4 connections
  (-> degree of protection IP 65)

### Dimensions

**Open, without cover**

**With cover**

**Dimensions in mm**

### Terminal assignment

- **Pv**: Amplification potentiometer
- **Po**: Zero-setting potentiometer

- **Sensor side**

### Contact Information

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