

Signal conditioner - MCR-FL-C-UI-2UI-DCI - 2814854

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MCR signal multiplier, for doubling and electrical isolation of analog signals, unconfigured

Product Features

- ✓ Calibrated selectable input and output signals
- ✓ 4-way isolation



Key Commercial Data

| | |
|--------------------------------------|----------|
| Packing unit | 1 pc |
| Weight per Piece (excluding packing) | 138.1 g |
| Custom tariff number | 85437090 |
| Country of origin | Germany |

Technical data

Note

| | |
|-------------------------|---|
| Utilization restriction | EMC: class A product, see manufacturer's declaration in the download area |
|-------------------------|---|

Dimensions

| | |
|--------|----------|
| Width | 17.5 mm |
| Height | 99 mm |
| Depth | 114.5 mm |

Ambient conditions

| | |
|---------------------------------|------------------|
| Ambient temperature (operation) | -25 °C ... 55 °C |
| Degree of protection | IP20 |

Input data

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Input data

| | |
|-----------------------------------|--|
| Description of the input | Current input |
| Number of inputs | 1 |
| Configurable/programmable | Yes, preconfigured |
| Current input signal | 0 mA ... 24 mA (freely selectable in 0.1 mA steps) |
| Max. input current | 50 mA |
| Input resistance current input | 50 Ω |
| Description of the input | Voltage input |
| Configurable/programmable | Yes, preconfigured |
| Voltage input signal | 0 V ... 12 V (freely selectable in 0.1 V steps) |
| Max. input voltage | 30 V |
| Input resistance of voltage input | 200 kΩ |

Output data

| | |
|---------------------------------|---|
| Output name | Voltage output |
| Number of outputs | 2 |
| Configurable/programmable | Yes, preconfigured |
| Voltage output signal | 0 V DC ... 10 V DC (refer to the order key) |
| | 2 V DC ... 10 V DC |
| | 0 V DC ... 5 V DC |
| | 1 V DC ... 5 V DC |
| Max. output voltage | 15 V |
| Load/output load voltage output | ≥ 10 kΩ |
| Output name | Current output |
| Configurable/programmable | Yes, preconfigured |
| Current output signal | 0 mA ... 20 mA (refer to the order key) |
| | 4 mA ... 20 mA |
| | 0 mA ... 10 mA |
| Max. output current | 35 mA |
| Load/output load current output | ≤ 600 Ω |

Power supply

| | |
|--------------------------|---------------------|
| Supply voltage range | 20 V DC ... 30 V DC |
| Max. current consumption | < 25 mA |

Connection data

| | |
|------------------------------------|---------------------|
| Connection method | Screw connection |
| Conductor cross section solid min. | 0.2 mm ² |
| Conductor cross section solid max. | 2.5 mm ² |
| Conductor cross section AWG min. | 24 |

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Connection data

| | |
|---------------------------------------|---------------------|
| Conductor cross section AWG max. | 14 |
| Conductor cross section flexible min. | 0.2 mm ² |
| Conductor cross section flexible max. | 2.5 mm ² |
| Stripping length | 8 mm |
| Screw thread | M3 |

General

| | |
|-----------------------------------|---|
| No. of channels | 2 |
| Maximum transmission error | ≤ 0.15 % (of final value) |
| Transmission error, typical | 0.05 % (of final value) |
| Maximum temperature coefficient | < 0.015 %/K |
| Temperature coefficient, typical | 0.0075 %/K |
| Limit frequency (3 dB) | 30 Hz |
| Step response (10-90%) | 12 ms |
| Protective circuit | Transient protection |
| Test voltage, input/output/supply | 1.5 kV (50 Hz, 1 min.) |
| Color | green |
| Housing material | Polyamide PA non-reinforced |
| Mounting position | any |
| Conformance | CE-compliant |
| UL, USA / Canada | Class I, Div. 2, Groups A, B, C, D or Non-Hazardous Locations |

Standards and Regulations

| | |
|----------------------------------|---|
| Order No. | 2814854 |
| Product key | CK1811 |
| Connection in acc. with standard | CUL |
| Conformance | CE-compliant |
| UL, USA / Canada | Class I, Div. 2, Groups A, B, C, D or Non-Hazardous Locations |

Classifications

eCl@ss

| | |
|------------|----------|
| eCl@ss 4.0 | 27210120 |
| eCl@ss 4.1 | 27210120 |
| eCl@ss 5.0 | 27210120 |
| eCl@ss 5.1 | 27210120 |
| eCl@ss 6.0 | 27210120 |
| eCl@ss 7.0 | 27210120 |

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Classifications

eCl@ss

| | |
|------------|----------|
| eCl@ss 8.0 | 27210120 |
|------------|----------|

ETIM

| | |
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| ETIM 2.0 | EC001485 |
| ETIM 3.0 | EC001485 |
| ETIM 4.0 | EC001485 |
| ETIM 5.0 | EC002653 |

UNSPSC

| | |
|---------------|----------|
| UNSPSC 6.01 | 30211506 |
| UNSPSC 7.0901 | 39121008 |
| UNSPSC 11 | 39121008 |
| UNSPSC 12.01 | 39121008 |
| UNSPSC 13.2 | 39121008 |

Approvals

Approvals

Approvals

UL Recognized / cUL Recognized / EAC / cULus Recognized

Ex Approvals

UL Listed / cUL Listed / cULus Listed

Approvals submitted

Approval details

| |
|---------------|
| UL Recognized |
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| cUL Recognized |
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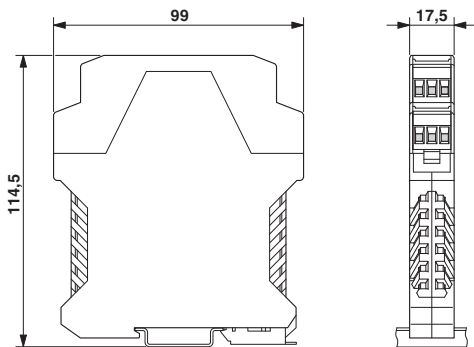
Approvals

EAC

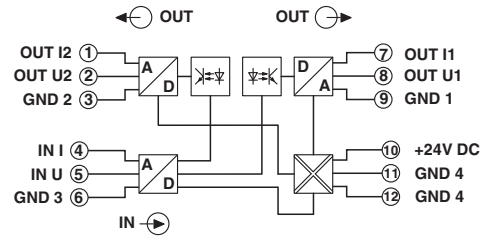
cULus Recognized

Drawings

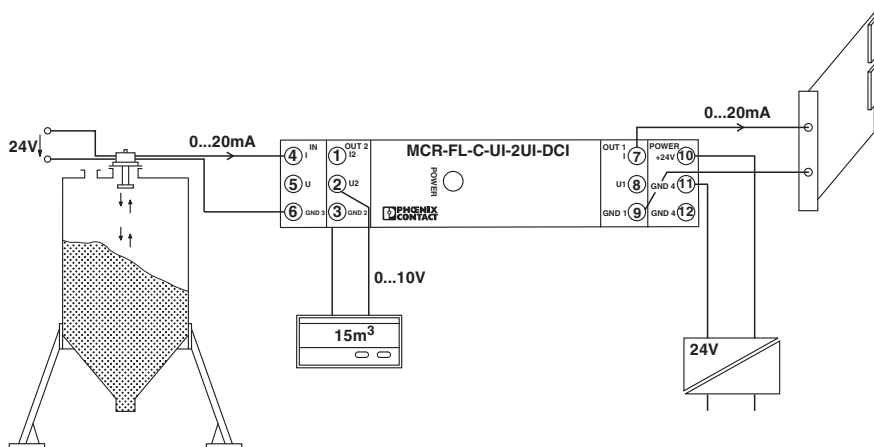
Dimensional drawing



Circuit diagram



Application drawing



Application example: - Level measurement with subsequent signal multiplication

- 1 = filling level sensor
- 2 = control
- 3 = mains voltage

