Product data sheet



# System VICOTEC450

## VICOTEC450

**VISUAL RANGE MEASURING DEVICES**

SICK
Sensor Intelligence.



## Ordering information

| Type | Part no. |
|---|---|
| System VICOTEC450 | On request |

Our regional sales organization will help you to select the optimum device configuration.

Other models and accessories ➜ www.sick.com/VICOTEC450

CE

## Detailed technical data

### Technical specifications

| | |
|---|---|
| **Measured values** | Visibility (K-value) |
| **Maximum number of measurands** | 1 |
| **Measurement principles** | Scattered light forward |
| **Spectral range** | 640 mm ... 660 mm<br>Laser, protection class 2, power < 1 mW |
| **Gas flow rate** | 30 l/min ... 35 l/min |
| **Measuring ranges** | |
| K-value | 0 ... 15 $km^{-1}$ / 0 ... 5,000 $km^{-1}$ |
| Temperature | –50 ... +250 °C |
| **Response time ($t_{90}$)** | 0 s ... 600 s<br>Freely adjustable; without measuring delay due to suction line |
| **Accuracy** | |
| Temperature: | ± 2 °C |
| **Resolution** | |
| Visibility (K-value) | 0.1 $km^{-1}$ |
| **Repeatability** | |
| Visibility (K-value) | ± 2 %: of measuring range full scale |
| **Ambient temperature** | –30 °C ... +55 °C |
| **Storage temperature** | –40 °C ... +60 °C |
| **Electrical safety** | CE |
| **Enclosure rating** | IP66 |
| **Dimensions (W x H x D)** | |
| Measuring unit | 300 mm x 340 mm x 215 mm (for details see dimensional drawings) |

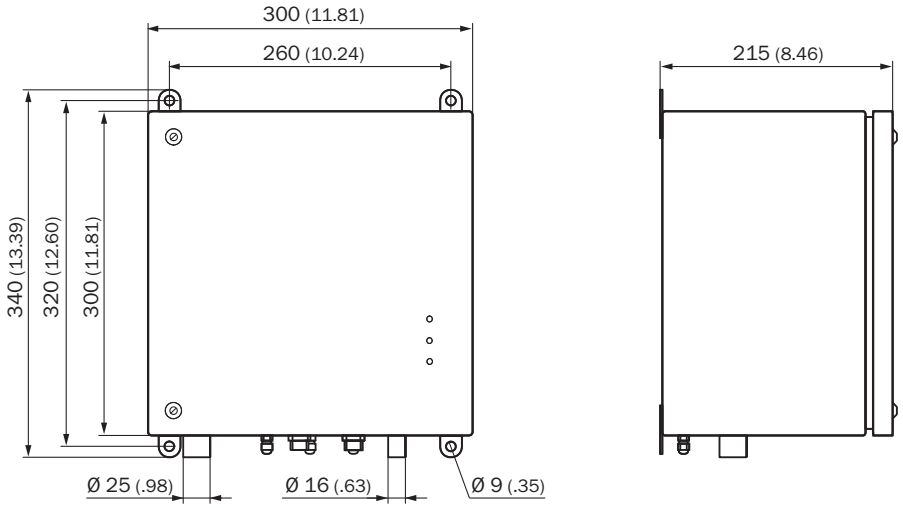
| | |
|---|---|
| **Weight** | |
| | 12 kg |
| **Energy supply** | |
| Voltage | 90 V AC ... 250 V AC |
| Frequency | 50 Hz / 60 Hz |
| Power consumption | ≤ 35 VA |
| **Test functions** | Automatic self-test<br>Contamination limits: at 30% warning, at 50% failure<br>Manual linearity test with reference filter |
| **Options** | Temperature measurement |

## Classifications

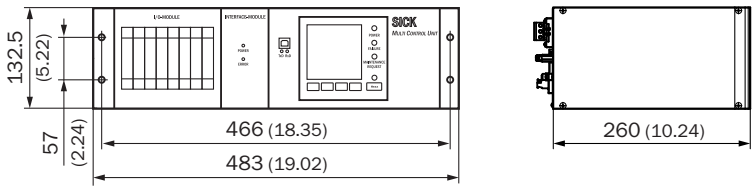
| | |
|---|---|
| **ECLASS 5.0** | 27150306 |
| **ECLASS 5.1.4** | 27150306 |
| **ECLASS 6.0** | 27150306 |
| **ECLASS 6.2** | 27150306 |
| **ECLASS 7.0** | 27150306 |
| **ECLASS 8.0** | 27150306 |
| **ECLASS 8.1** | 27150306 |
| **ECLASS 9.0** | 27150306 |
| **ECLASS 10.0** | 27150306 |
| **ECLASS 11.0** | 27150306 |
| **ETIM 5.0** | EC001190 |
| **ETIM 6.0** | EC001190 |
| **ETIM 7.0** | EC001190 |
| **ETIM 8.0** | EC001190 |
| **UNSPSC 16.0901** | 41115406 |

## Dimensional drawing (Dimensions in mm (inch))

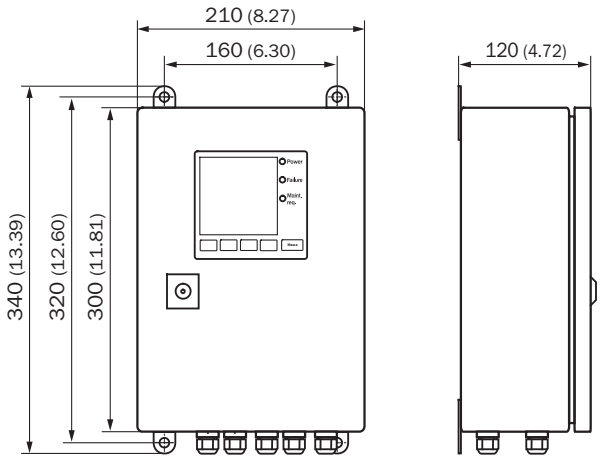
VICOTEC450 measuring unit



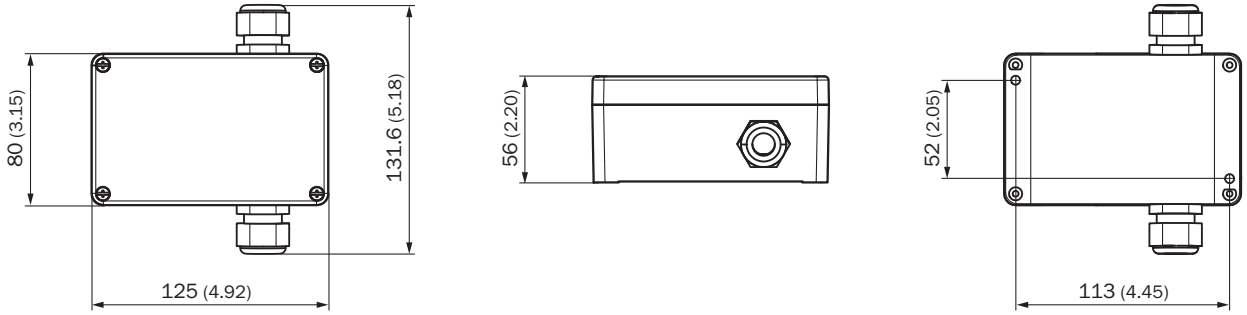

MCUP control unit; 19″-rack enclosure (for non-hazardous areas only)



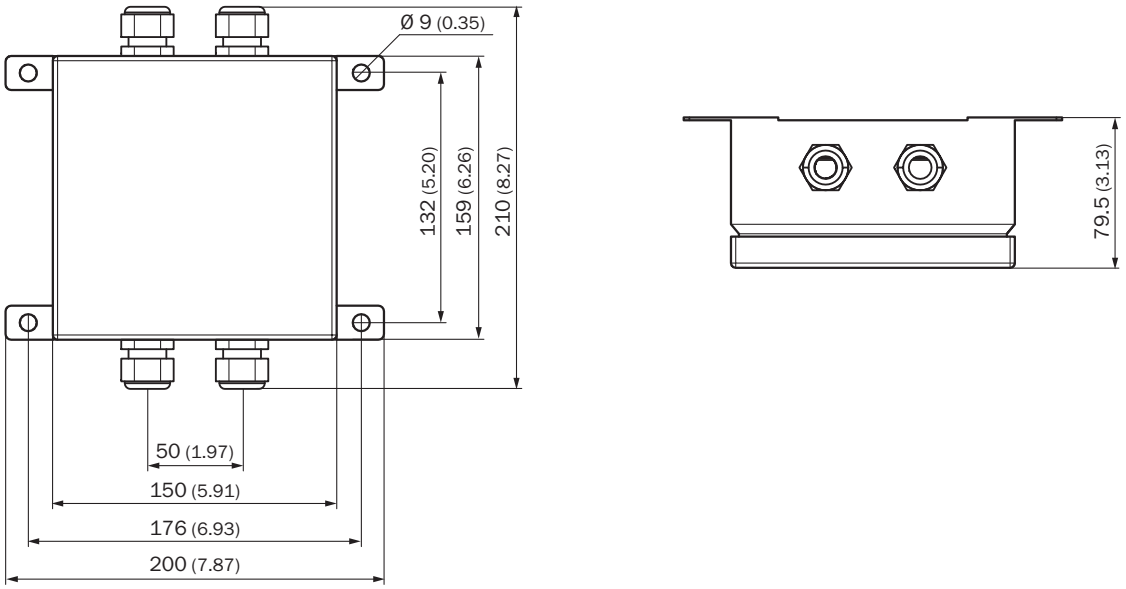

MCU-N control unit; wall-mounting enclosure, compact version (for non-hazardous areas only)



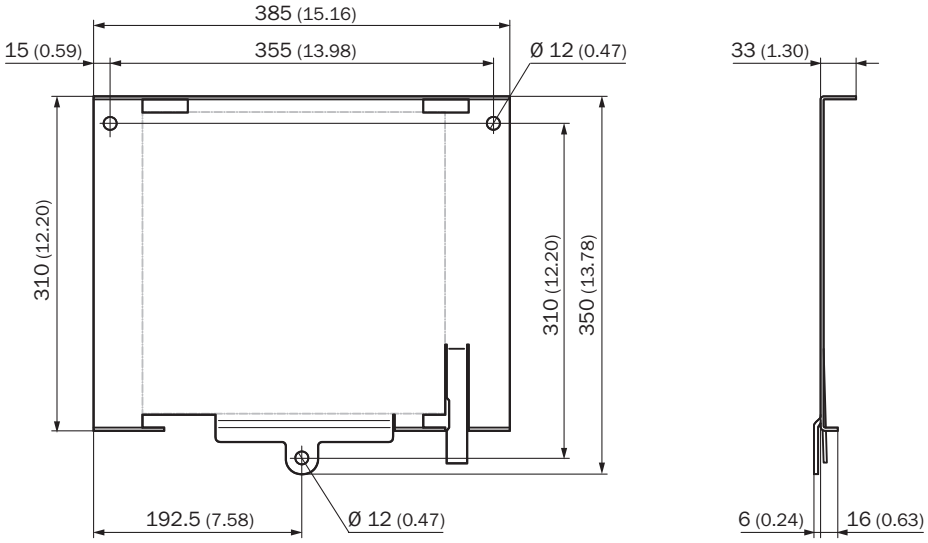
Connection unit; standard version



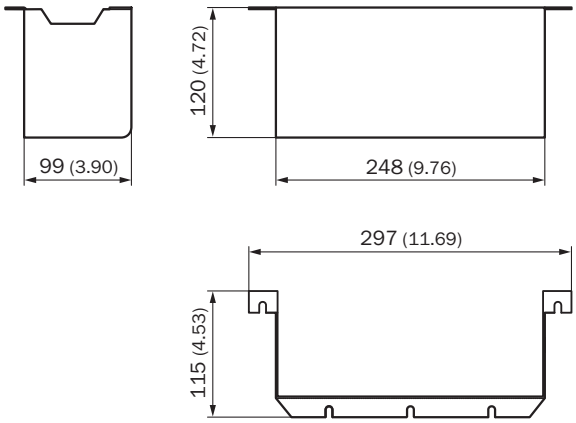

Connection unit; stainless steel version



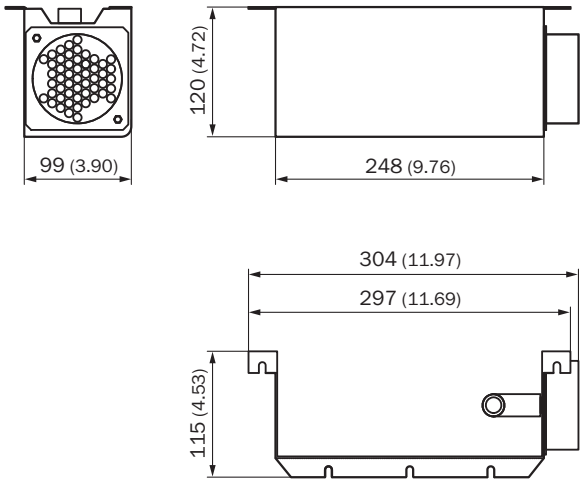
Mounting plate



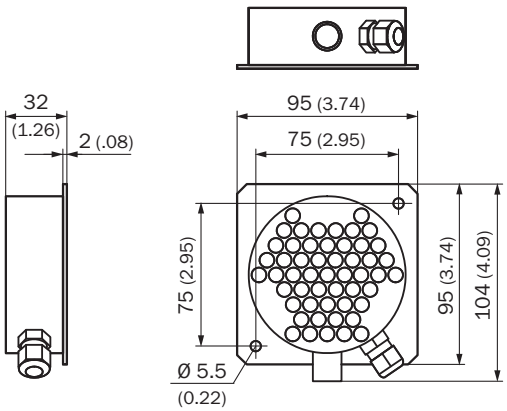

Cover for connections



Cover for connections; with air inlet at the side




Air inlet with protective grading for wall mounting



# SICK AT A GLANCE

SICK is one of the leading manufacturers of intelligent sensors and sensor solutions for industrial applications. A unique range of products and services creates the perfect basis for controlling processes securely and efficiently, protecting individuals from accidents and preventing damage to the environment.

We have extensive experience in a wide range of industries and understand their processes and requirements. With intelligent sensors, we can deliver exactly what our customers need. In application centers in Europe, Asia and North America, system solutions are tested and optimized in accordance with customer specifications. All this makes us a reliable supplier and development partner.

Comprehensive services complete our offering: SICK LifeTime Services provide support throughout the machine life cycle and ensure safety and productivity.

**For us, that is “Sensor Intelligence.”**

# WORLDWIDE PRESENCE:

Contacts and other locations –www.sick.com