# RAS407-2800201

RAS4xx

**RADAR SENSORS**

SICK
Sensor Intelligence.

# RAS407-2800201 | RAS4xx

RADAR SENSORS

## Ordering information

| Type | Part no. |
|------|----------|
| RAS407-2800201 | 1072149 |

Other models and accessories ➜ www.sick.com/RAS4xx

CE

## Detailed technical data

### Features

| | |
|---|---|
| **Measurement principle** | FMCW HF |
| **Radio approval** | China, France [1] |
| **Frequency band** | 24.05 GHz<br>+ 200 MHz |
| **Aperture angle** | 7° x 28° (cone) |
| **Operating range** | 0.2 m ... 20 m |

[1] Fixed installation.

### Performance

| | |
|---|---|
| **Response time** | < 0.5 s |
| **Integrated application** | Collision avoidance |
| **Number of field sets** | 3 |

### Interfaces

| | | |
|---|---|---|
| **USB** | | ✔ |
| | Function | Parameterization |
| **Switching outputs** | | 3 (relays) |

### Mechanics/electronics

| | |
|---|---|
| **Electrical connection** | 1 x Cable open end |
| **Operating voltage** | 10 V DC ... 30 V DC |
| **Power consumption** | 8 W |
| **Housing color** | Gray |
| **Enclosure rating** | IP 65 |
| **Protection class** | III |
| **Weight** | 1,480 g |
| **Dimensions (L x W x H)** | 101 mm x 151 mm x 60 mm [1]<br>101 mm x 151 mm x 60 mm [2] |

[1] Evaluation unit.
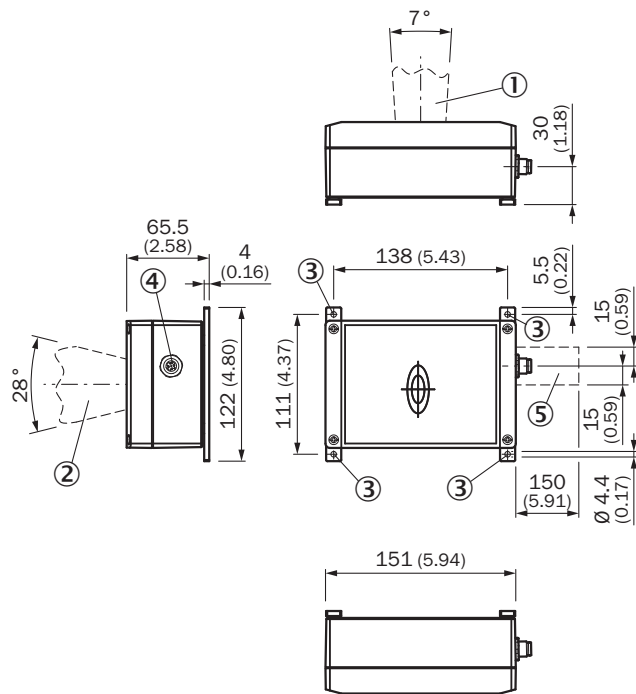[2] Sender/receiver unit.

### Ambient data

| | |
|---|---|
| **Electromagnetic compatibility (EMC)** | ETSI EN 301 489-1 / ETSI EN 301 489-3 |
| **Vibration resistance** | EN 60068-2-6 (1995) |
| **Shock resistance** | EN 60721-3-7 (1965), EN 60068-2-32 (1965) |

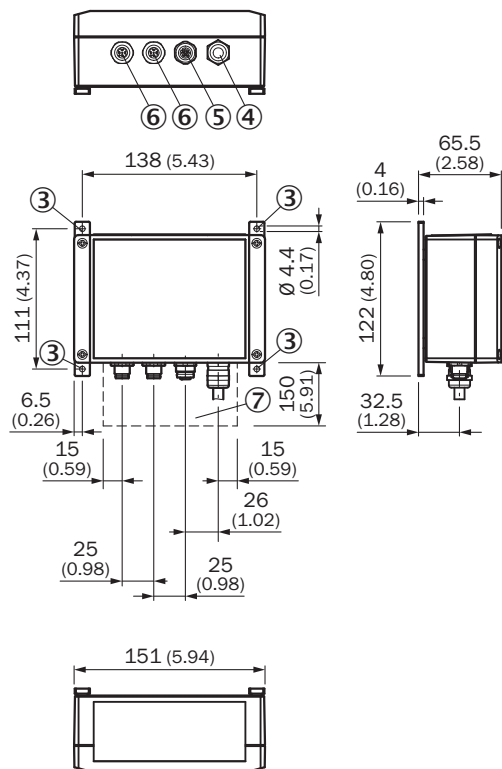| Ambient operating temperature | −20 °C … +60 °C |
|---|---|
| Storage temperature | −20 °C … +60 °C |

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

RAS407-280xxxx



① Angle horizontal
② Angle vertical
③ Mounting holes, 4 x Ø 4.4 mm
④ Connection for controller unit
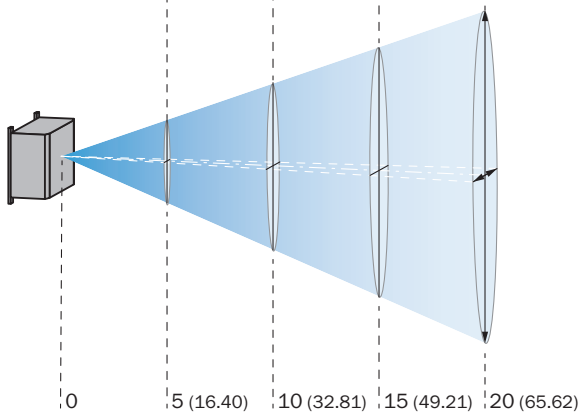⑤ Recommended free space for connections

RAS4xx-xx002xx



③ Mounting holes, 4 x Ø 4.4 mm
④ Power supply
⑤ USB port
⑥ Sensor unit connection
⑦ Recommended free space for connections

## Detection area

RAS407

Dimensions in m (feet)

| | | | | | |
|---|---|---|---|---|---|
| vertical | 28° | 2.5 (8.20) | 5.0 (16.40) | 7.5 (24.61) | 10.0 (32.81) |
| horizontal | 7° | 0.6 (1.97) | 1.2 (3.94) | 1.4 (4.59) | 2.4 (7.87) |



0    5 (16.40)    10 (32.81)    15 (49.21)    20 (65.62)

Working distance in m (feet)

## Recommended accessories

Other models and accessories ➜ www.sick.com/RAS4xx

| | Brief description | Type | Part no. |
|---|---|---|---|
| **Device protection (mechanical)** | | | |
|  | Dust prevention shield, gray | Weather hood | 2079576 |
| **Mounting brackets and mounting plates** | | | |
|  | Pivot mounting bracket, incl. assembly material | Mounting bracket | 2061737 |
| **Plug connectors and cables** | | | |
|  | Head A: male connector, USB, 5-pin<br>Head B: male connector, M12<br>Cable: USB 2.0, unshielded, 3 m | USB cable | 2079580 |

## 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**

SICK AG  |  Waldkirch  |  Germany  |  www.sick.com

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