



# AS30-PBM434I110ZZZ

AS30

ARRAY SENSORS

**SICK**  
Sensor Intelligence.



Illustration may differ



Ordering information

Type	Part no.
AS30-PBM434I110ZZZ	1095584

Other models and accessories → [www.sick.com/AS30](http://www.sick.com/AS30)

Detailed technical data

Features

<b>Sensor principle</b>	Proximity system
<b>Functional principle</b>	Web guiding, positioning
<b>Principle of operation (default)</b>	Positioning
<b>Dimensions (W x H x D)</b>	31 mm x 62 mm x 52.2 mm
<b>Sensing distance</b>	≤ 100 mm
<b>Housing design</b>	Rectangular
<b>Working range</b>	90 mm ... 110 mm
<b>Measurement range</b>	45 mm
<b>Minimum detectable object (MDO)</b>	1.2 mm
<b>Light source</b>	LED, White
<b>Wave length</b>	400 nm ... 700 nm
<b>Light spot size</b>	62.4 mm x 12.8 mm
<b>Repeatability</b>	0.2 mm <sup>1)</sup>
<b>Linearity (position value)</b>	± 2 %
<b>Resolution</b>	0.1 mm
<b>Adjustment</b>	IO-Link, Display
<b>Teach-in mode</b>	Edge detection Area detection

<sup>1)</sup> With respect to sensing distance.

## Mechanics/electronics

<b>Supply voltage</b>	18 V ... 30 V
<b>Ripple</b>	$\leq 5 \text{ V}^{1)}$
<b>Current consumption</b>	$< 3.1 \text{ W}^{2)}$
<b>Switching frequency</b>	500 Hz
<b>Switching output</b>	Push-pull: PNP/NPN
<b>Switching output (voltage)</b>	Push-pull: PNP/NPN HIGH = $U_V - 3 \text{ V}$ /LOW $\leq 3 \text{ V}$
<b>Analog output</b>	4 mA ... 20 mA
<b>Resolution of analog output</b>	12 bit
<b>Output rate of analog output</b>	1 ms
<b>Output current <math>I_{\text{max}}</math></b>	$< 100 \text{ mA}$
<b>Initialization time</b>	0.48 s
<b>Connection type</b>	Male connector M12, 5-pin
<b>Protection class</b>	III <sup>3)</sup>
<b>Circuit protection</b>	$U_V$ connections, reverse polarity protected Output Q short-circuit protected Interference pulse suppression
<b>Enclosure rating</b>	IP67
<b>Weight</b>	250 g
<b>Housing material</b>	Zinc diecast

<sup>1)</sup> May not fall below or exceed  $U_V$  tolerances.

<sup>2)</sup> Without load.

<sup>3)</sup>  $I_N = 2 \text{ A}$ .

## Communication interface

<b>IO-Link</b>	✓
VendorID	26
DeviceID HEX	0x800207
DeviceID DEC	8389127
<b>Cycle time</b>	$> 1.1 \text{ ms}$

## Ambient data

<b>Ambient operating temperature</b>	$-10 \text{ °C} \dots +55 \text{ °C}$
<b>Ambient temperature, storage</b>	$-25 \text{ °C} \dots +75 \text{ °C}$
<b>Shock load</b>	According to IEC 60068
<b>UL File No.</b>	NRKH.E181493 & NRKH7.E181493

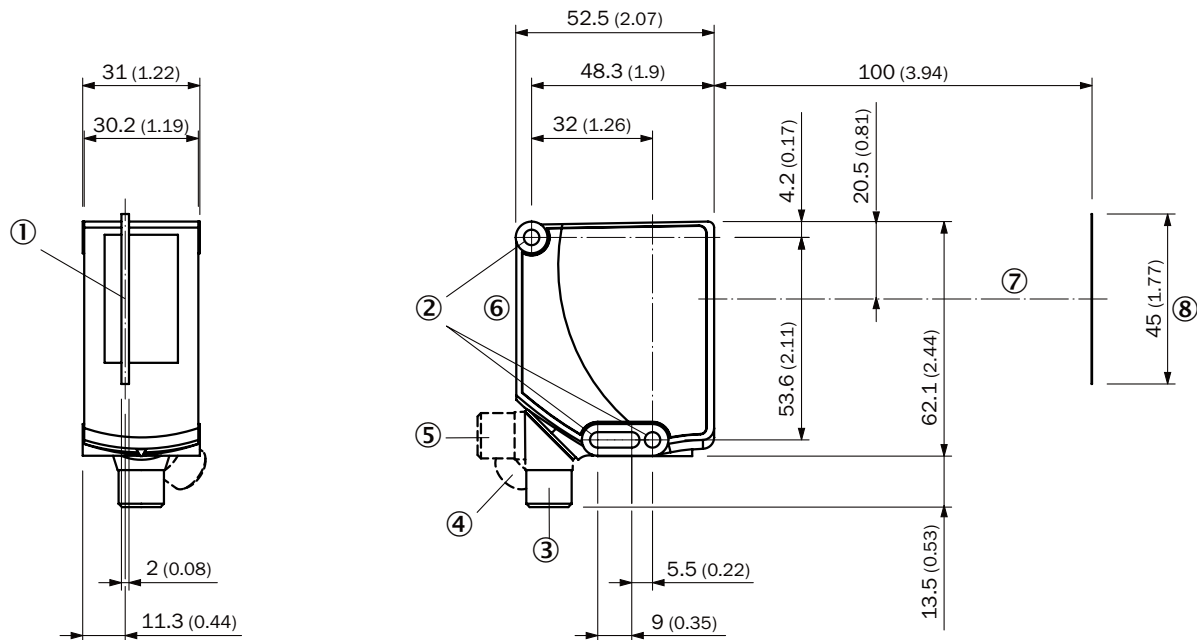
## Classifications

<b>ECLASS 5.0</b>	27270906
<b>ECLASS 5.1.4</b>	27270906
<b>ECLASS 6.0</b>	27270906
<b>ECLASS 6.2</b>	27270906
<b>ECLASS 7.0</b>	27270906
<b>ECLASS 8.0</b>	27270906
<b>ECLASS 8.1</b>	27270906

<b>ECLASS 9.0</b>	27270906
<b>ECLASS 10.0</b>	27270906
<b>ECLASS 11.0</b>	27270906
<b>ECLASS 12.0</b>	27270906
<b>ETIM 5.0</b>	EC001820
<b>ETIM 6.0</b>	EC001820
<b>ETIM 7.0</b>	EC001820
<b>ETIM 8.0</b>	EC001820
<b>UNSPSC 16.0901</b>	39121528

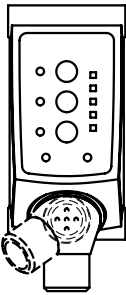
### Dimensional drawing (Dimensions in mm (inch))

AS30-xxx43xxxxxxx



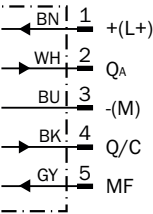
Adjustments

Display and adjustment elements






Connection diagram


Cd-435



Recommended accessories

Other models and accessories → [www.sick.com/AS30](http://www.sick.com/AS30)

	Brief description	Type	Part no.
Others			
	<ul style="list-style-type: none"><li>• <b>Product family:</b> Brackets</li><li>• <b>Description:</b> Bracket for reflective foil (scope of delivery of AS30) or accessory reflector. Simple alignment and adjustment of the correct sensing distance.</li><li>• <b>Details:</b> Steel, zinc coated</li><li>• <b>Items supplied:</b> Reflector holder, screw set for AS30</li><li>• <b>Suitable for:</b> AS30</li></ul>	REFLECTORHOLD-ER SD100	2107379
	<ul style="list-style-type: none"><li>• <b>Product family:</b> Assembly accessories</li><li>• <b>Description:</b> Bracket for easy mounting of ELA external illumination as a backlight. Suitable for all AS30 Prime with sensing distance 100 mm.</li><li>• <b>Details:</b> Steel, zinc coated</li><li>• <b>Items supplied:</b> Reflector holder, screw set for AS30</li><li>• <b>Suitable for:</b> AS30, ELA</li></ul>	SET FORK HOLD-ER ELA SD100	2134661
	<ul style="list-style-type: none"><li>• <b>Connection type head A:</b> Male connector, M12, 5-pin, straight, A-coded</li><li>• <b>Description:</b> Unshielded, Head A: male connector, M12, 5-pin, straight, unshielded, for cable diameter 4 mm ... 6 mm Head B: -</li><li>• <b>Connection systems:</b> Screw-type terminals</li><li>• <b>Permitted cross-section:</b> ≤ 0.75 mm²</li><li>• <b>Note:</b> For field bus technology</li></ul>	STE-1205-G	6022083

	Brief description	Type	Part no.
	<ul style="list-style-type: none"> <li>• <b>Connection type head A:</b> Female connector, M12, 5-pin, straight, A-coded</li> <li>• <b>Connection type head B:</b> Flying leads</li> <li>• <b>Signal type:</b> Sensor/actuator cable</li> <li>• <b>Cable:</b> 5 m, 5-wire, PVC</li> <li>• <b>Description:</b> Sensor/actuator cable, unshielded</li> <li>• <b>Application:</b> Zones with chemicals, Uncontaminated zones</li> </ul>	YF2A15-050VB5XLEAX	2096240
	<ul style="list-style-type: none"> <li>• <b>Product family:</b> Brackets</li> <li>• <b>Description:</b> Plate K for universal clamp bracket</li> <li>• <b>Material:</b> Steel</li> <li>• <b>Details:</b> Steel, zinc coated</li> <li>• <b>Items supplied:</b> Universal clamp (2022726), mounting hardware</li> <li>• <b>Usable for:</b> W11-2, W12-3, W14-2, W18-3, W23-2, W24-2, W27-3, W30, W32, W34, W36, PL50A, PL80A, P250, UC12, LUT3, KT2, KT5-2, KT8, CS8, DT2, DS30, DS40, W12-2 Laser, W16, W26, KT5</li> </ul>	BEF-KHS-K01	2022718
	<ul style="list-style-type: none"> <li>• <b>Product family:</b> Brackets</li> <li>• <b>Description:</b> Mounting bar, straight, 200 mm, steel</li> <li>• <b>Material:</b> Steel</li> <li>• <b>Details:</b> Steel, zinc coated</li> <li>• <b>Items supplied:</b> Without mounting hardware</li> <li>• <b>Usable for:</b> Fiber-optic sensors</li> </ul>	BEF-MS12G-A	4056054
	<ul style="list-style-type: none"> <li>• <b>Product family:</b> Brackets</li> <li>• <b>Description:</b> Mounting bar, L-shaped, 150 mm x 150 mm, steel</li> <li>• <b>Material:</b> Steel</li> <li>• <b>Details:</b> Steel, zinc coated</li> <li>• <b>Items supplied:</b> Without mounting hardware</li> <li>• <b>Usable for:</b> Fiber-optic sensors</li> </ul>	BEF-MS12L-A	4056052
	<ul style="list-style-type: none"> <li>• <b>Product family:</b> Brackets</li> <li>• <b>Material:</b> Aluminum</li> <li>• <b>Details:</b> Aluminum</li> <li>• <b>Items supplied:</b> Mounting hardware for the sensor included</li> <li>• <b>Usable for:</b> Adapter plate for AX20 to AS30</li> </ul>	BEF-AP-AS30	2124602
Sensor Integration Gateway			
	<ul style="list-style-type: none"> <li>• <b>Further functions:</b> Web server integrated, USB connection for easy configuration of the SIG200 Sensor Integration Gateway with SOPAS ET, the engineering tool from SICK, logic editor is available for easy configuration of logic functions</li> <li>• <b>Connection CONFIG:</b> 1 x M8, 4-pin female connector, USB 2.0 (USB-A)</li> <li>• <b>Logic editor:</b> yes</li> <li>• <b>Communication interface:</b> IO-Link, USB, Ethernet, PROFINET, REST API, USB, Ethernet, PROFINET</li> <li>• <b>Product category:</b> IO-Link Master</li> </ul>	SIG200-0A0412200	1089794
	<ul style="list-style-type: none"> <li>• <b>Further functions:</b> Web server integrated, USB connection for easy configuration of the SIG200 Sensor Integration Gateway with SOPAS ET, the engineering tool from SICK, logic editor is available for easy configuration of logic functions</li> <li>• <b>Connection CONFIG:</b> 1 x M8, 4-pin female connector, USB 2.0 (USB-A)</li> <li>• <b>Logic editor:</b> yes</li> <li>• <b>Communication interface:</b> IO-Link, USB, Ethernet, REST API, USB, Ethernet, REST API</li> <li>• <b>Product category:</b> IO-Link Master</li> </ul>	SIG200-0A0G12200	1102605

Recommended services

Additional services → [www.sick.com/AS30](http://www.sick.com/AS30)

	Type	Part no.
Function Block Factory		
<ul style="list-style-type: none"><li>• <b>Description:</b> The Function Block Factory is an engineering tool for creating device and environment-specific function blocks that enable IO-Link sensors to be integrated into programmable logic controllers. The Function Block Factory supports common programmable logic controllers (PLCs) of various manufacturers such as Siemens, Beckhoff, Rockwell Automation B&amp;R and more. More information on the FBF can be found <a href="https://fbf.cloud.sick.com" target="_blank">here</a>.</li><li>• <b>Provision:</b> Customers can obtain access to the Function Block Factory and the license via <a href="https://fbf.cloud.sick.com" target="_blank">https://fbf.cloud.sick.com</a>.</li></ul>	Function Block Factory	On request

## 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](http://www.sick.com)