



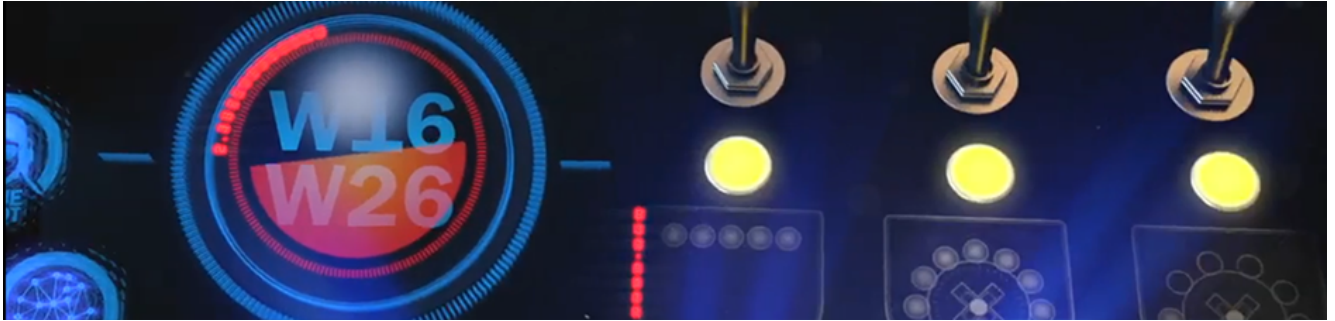
## W26

Stars in object detection

PHOTOELECTRIC SENSORS

**SICK**  
Sensor Intelligence.

Advantages



**Easy and quick sensor alignment using BluePilot**

Using the innovative BluePilot alignment aid, the sensors in the W16 product family can be commissioned in seconds. The blue LED display provides direct feedback to assist you with optimally aligning the sensors and reflectors as well as senders and receivers. In the case of the photoelectric proximity sensors, a push-and-turn mechanism enables the sensor to be adjusted quickly and precisely, thereby eliminating the customary time-consuming fine adjustment using rotary controls.

BluePilot also reports any change in detection quality, e.g., due to contamination or vibrations, which ensures faults are detected in a timely manner, long before a production downtime occurs.

**Faster, convenient start-up**



**Through-beam and photoelectric retro-reflective sensors**

The blue LED alignment aid speeds up the process of optimally aligning the sensors and reflectors as well as senders and receivers. Any changes in the operational safety due to contamination or vibrations can be recognized at a glance.



**Photoelectric retro-reflective sensor for detecting transparent objects**

The appropriate detection mode for the object characteristics can be set by means of a rotary control. The LED display of the W16 and W26 indicates immediately what mode the sensor is in.



**Photoelectric retro-reflective sensor for detecting transparent objects**

The appropriate detection mode for the object characteristics can be set by means of a rotary control. The LED display of the W16 and W26 indicates immediately what mode the sensor is in.



**With the new BluePilot operating concept, you will save valuable time commissioning the sensor, and avoid production downtimes thanks to the timely reporting of faults.**



### Smart sensors for efficient machine communication

The sensors from the W16 product family are particularly rugged and reliable.

If optical contamination exists on the sensor or reflector and after cleaning, the sensors automatically adjust their switching thresholds thanks to AutoAdapt, meaning they always keep a clear view. With the OptoFilter, the sensors see what they have to see: they are immune to LED lights, reflections from safety vests and the influence of depolarizing objects.

The sensors can also withstand many chemical, thermal and mechanical environmental influences thanks to the ultra-rugged VISTAL housing.

### From raw signals to customized information



Thanks to the OptoFilter, the sensors feature high ambient light immunity.



If there is contamination, the W16 sensors automatically adjust their switching thresholds.



Thanks to the VISTAL housing, the sensors can also withstand extreme loads.

**+** Interconnectivity and efficient processing of data ensure leaner structures and cost benefits for your process.

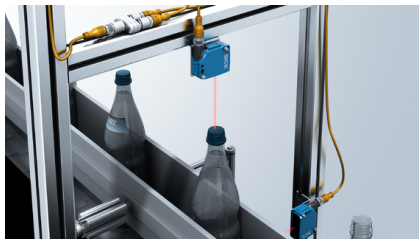


### Rugged and reliable

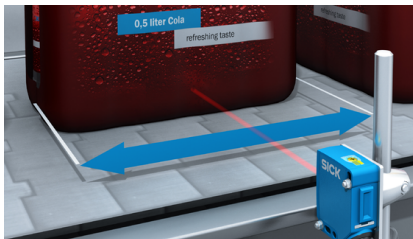
Smart Sensors provide essential input for every process chain. They support dynamic, real-time-optimized, and self-organized industry processes. The W16 range of smart sensors capture real-life situations, and generate and receive data and information beyond traditional switching signals or measured process parameters.

Link to [www.sick.com/smart-sensors](http://www.sick.com/smart-sensors)

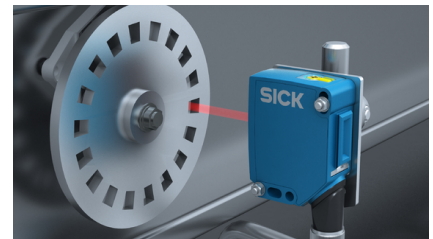
### Everything reliably detected



Base logic: User-definable logic functions with trigger sensors and switching signal delays



Time measurement and debouncing with the aid of the Time Measurement and Debouncing Smart Task



W16 with the Counter and Debouncing Smart Task counts and evaluates detection signals



**The rugged design ensures high system availability and reduces down-times.**



### Technical data overview

<b>Dimensions (W x H x D)</b>	24.6 mm x 82.5 mm x 53.3 mm
<b>Sensing range max.</b>	30 mm ... 1,600 mm <sup>1)</sup> 30 mm ... 3,000 mm <sup>1)</sup> 30 mm ... 2,000 mm <sup>1)</sup> 0 mm ... 800 mm <sup>1)</sup> 10 mm ... 1,000 mm <sup>1)</sup> 0 m ... 18 m <sup>2)</sup> 0.25 m ... 19 m <sup>2)</sup> 0.25 m ... 3 m <sup>2)</sup> 0 m ... 60 m
<b>Light source</b>	PinPoint LED / LED (depending on type)
<b>Type of light</b>	Visible red light / Infrared light (depending on type)
<b>Enclosure rating</b>	IP66 (According to EN 60529) IP67 (According to EN 60529) IP69 (According to EN 60529) <sup>3)</sup> IP65 (According to EN 60529)
<b>Housing material</b>	Plastic VISTAL®

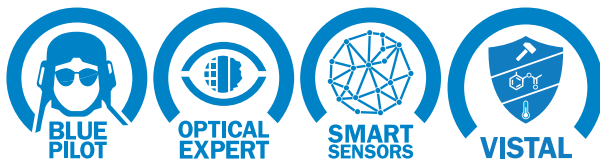
<sup>1)</sup> Object with 90 % reflectance (referred to standard white, DIN 5033).

<sup>2)</sup> Reflector PL80A.

<sup>3)</sup> Replaces IP69K with ISO 20653: 2013-03.

### Product description

The W26 is equipped with new technologies such as TwinEye, LineSpot, ClearSens and OptoFilter for reliable object detection. It can be quickly and conveniently adjusted via the BluePilot operating and display concept. Since every W26 is designed as a Smart Sensor, it can be configured to fit the application via IO-Link and offers additional diagnostic functions and Smart Tasks. It is therefore a trailblazer on the path to Industry 4.0. The highly-visible PinPoint LED and the infrared LED are available as the light source. The durable laser inscription ensures device identification in the long run. Thanks to the very rugged VISTAL® housing and the predictive maintenance, the W26 offers very high reliability and prevents unplanned machine downtimes.



### At a glance

- Technologies: ClearSens, LineSpot, TwinEye with OptoFilter
- BluePilot: Optical alignment aid, adjustment of the sensing range via Teach-Turn adjustment with optical sensing range indicator or via IO-Link
- PinPoint LED: Light-intensive red sender LED
- Smart Sensor: Enhanced Sensing, IO-Link, Diagnostics, Smart Tasks

### Your benefits

- Usability and uniform operation thanks to optical quality display on the housing or conveniently via IO-Link
- Simplification when aligning the light beam to the reflector, the receiver or to an object thanks to the highly-visible light spot of the PinPoint LED combined with the optical LED display
- Very high reliability thanks to new detection technologies as well as high optical ruggedness
- The Smart Sensor makes machine processes quicker, more efficient and transparent, enables predictive maintenance and is thereby a trailblazer for Industry 4.0 applications

### Fields of application

- Consumer goods
- Automotive and parts suppliers
- Wood
- Storage and conveyor
- Handling and assembly
- Metal and steel
- Stone, ceramic, glass
- Textile

## Ordering information

Other models and accessories → [www.sick.com/W26](http://www.sick.com/W26)

- **Sensor principle:** Photoelectric proximity sensor
- **Detection principle:** Background suppression
- **Switching output:** push-pull: PNP/NPN

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
30 mm ... 1,600 mm	Dark/light switching	PinPoint LED	Visible red light	Cable, 4-wire, 2 m <sup>1)</sup>	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTB26P-1H162120A00	1222744
				Cable with connector Q6, 6-pin, DC-coding, 270 mm <sup>1)</sup>	For setting the sensing range, for configuring the time function, for activating the test input	WTB26P-39422122ZZZ	1222809
				Male connector M12, 4-pin	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTB26P-24162120A00	1221002
	Light switching	PinPoint LED	Visible red light	Male connector M12, 4-pin	For setting the sensing range	WTB26P-24113520ZZZ	1222813
	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin, 270 mm <sup>1)</sup>	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTB26P-34161120A00	1218806
				Cable, 4-wire, 2 m <sup>1)</sup>		WTB26P-1H161120A00	1218824
				Cable with connector Q6, 6-pin, DC-coding, 270 mm <sup>1)</sup>	For setting the sensing range, for configuring the time function, for activating the test input	WTB26P-39721122ZZZ	1222804
				Cable with connector Q7, 7-pin, DC-coding, 270 mm <sup>1)</sup>	For setting the sensing range	WTB26P-3B111120ZZZ	1222816
				Male connector M12, 4-pin	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTB26P-24161120A00	1218666
					WTB26P-24161120A00	1222286	
					WTB26P-24161120A00	1222710	
	WTB26P-24161520A00	1222705					

<sup>1)</sup> Do not bend below 0 °C.



Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.					
30 mm ... 2,000 mm	Dark switching	LED	Infrared light	Male connector M12, 4-pin	For setting the sensing range	WTB26I-24115120ZZZ	1222815					
						WTB26I-24116120ZZZ	1222814					
	Dark/light switching	LED	Infrared light	Cable with connector Q6, 6-pin, DC-coding, 270 mm <sup>1)</sup>	For setting the sensing range, for configuring the time function, for activating the test input	WTB26I-39422122ZZZ	1222810					
						Male connector M12, 4-pin	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTB26I-24162120A00	1221726			
							For setting the sensing range, for configuring the time function, for configuring the sensor parameters and Smart Task functions	WTB26I-24162122A00	1222796			
						Light/dark switching	LED	Infrared light	Cable with M12 male connector, 4-pin, 270 mm <sup>1)</sup>	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTB26I-34161120A00	1218827
											Cable, 4-wire, 2 m <sup>1)</sup>	WTB26I-1H161120A00
									Cable with connector Q6, 6-pin, DC-coding, 270 mm <sup>1)</sup>	For setting the sensing range, for configuring the time function, for activating the test input	WTB26I-39721122ZZZ	1222808
	Cable with connector Q7, 7-pin, DC-coding, 270 mm <sup>1)</sup>	For setting the sensing range	WTB26I-3B111120ZZZ	1222817								
	Male connector M12, 4-pin	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTB26I-24161120A00	1218667								
		For setting the sensing range, for configuring the time function, for configuring the	WTB26I-24161122A00	1222797								

<sup>1)</sup> Do not bend below 0 °C.



Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
					sensor parameters and Smart Task functions		
30 mm ... 3,000 mm	Dark/light switching	LED	Infrared light	Cable, 4-wire, 2 m <sup>1)</sup>	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTB26I-1H162420A00	1222712
				Male connector M12, 4-pin		WTB26I-24162420A00	1222675
	Light/dark switching	LED	Infrared light	Cable, 4-wire, 2 m <sup>1)</sup>	For setting the sensing range, for configuring the time function, for configuring the sensor parameters and Smart Task functions	WTB26I-1H161420A00	1222713
				Male connector M12, 4-pin		WTB26I-24161420A00	1222711
						WTB26I-24161422A00	1109760
						WTB26P-24161420A00	1222709
	PinPoint LED	Visible red light	Male connector M12, 4-pin	For setting the sensing range, for configuring the sensor parameters and Smart Task functions			

<sup>1)</sup> Do not bend below 0 °C.

- **Sensor principle:** Photoelectric proximity sensor
- **Detection principle:** Background suppression
- **Switching output:** PNP

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
30 mm ... 1,600 mm	Light/dark switching	PinPoint LED	Visible red light	Male connector M12, 4-pin	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTB26P-24861120A00	1115766
30 mm ... 3,000 mm	Light/dark switching	LED	Infrared light	Male connector M12, 4-pin		WTB26I-24861420A00	1123835

- **Sensor principle:** Photoelectric proximity sensor
- **Detection principle:** Background suppression
- **Switching output:** NPN

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
30 mm ... 3,000 mm	Light/dark switching	LED	Infrared light	Male connector M12, 4-pin	For setting the sensing range	WTB26I-24G11420ZZZ	1124859

- **Sensor principle:** Photoelectric proximity sensor
- **Detection principle:** Foreground suppression
- **Switching output:** push-pull: PNP/NPN

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
0 mm ... 800 mm	Light/dark switching	PinPoint LED	Visible red light	Male connector M12, 4-pin	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTF26P-24161420A00	1113470

- **Sensor principle:** Photoelectric proximity sensor
- **Detection principle:** Background suppression, TwinEye technology
- **Switching output:** push-pull: PNP/NPN

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
10 mm ... 1,000 mm	–	PinPoint LED	Visible red light	Male connector M12, 4-pin	For setting the sensing range, for configuring the sensor parameters and Smart Task functions	WTS26P- 24161120A70	1219799
						WTS26P- 2416H120A71	1219800
	Dark/light switching	PinPoint LED	Visible red light	Male connector M12, 4-pin		WTS26P- 24162120A00	1221727
	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4- pin, 270 mm <sup>1)</sup>		WTS26P- 34161120A00	1218949
				Cable, 4- wire, 2 m <sup>1)</sup>		WTS26P- 1H161120A00	1218950
				Male connector M12, 4-pin		WTS26P- 24161120A00	1218668

<sup>1)</sup> Do not bend below 0 °C.

- **Sensor principle:** Photoelectric retro-reflective sensor
- **Detection principle:** autocollimation
- **Switching output:** push-pull: PNP/NPN

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.		
0 m ... 18 m	Dark switching	PinPoint LED	Visible red light	Male connector M12, 4-pin	-	WLA26P-24114100ZZZ	1222793		
					For configuring the sensor parameters and Smart Task functions	WLA26P-2416A100A00	1222697		
	Dark/light switching	PinPoint LED	Visible red light	Cable with connector Q6, 6-pin, DC-coding, 270 mm <sup>1)</sup>	For configuring the time function, for activating the test input	WLA26P-39721102ZZZ	1222790		
					For configuring the sensor parameters and Smart Task functions	WLA26P-24161100A00	1221732		
	Light switching	PinPoint LED	Visible red light	Male connector M12, 4-pin	-	WLA26P-24116100ZZZ	1222792		
	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin, 270 mm <sup>1)</sup>	For configuring the sensor parameters and Smart Task functions	WLA26P-34162100A00	1218823		
						Cable, 4-wire, 2 m <sup>1)</sup>	WLA26P-1H162100A00	1218822	
						Cable with connector Q6, 6-pin, DC-coding, 270 mm <sup>1)</sup>	WLA26P-39722102ZZZ	1222819	
						Cable with connector Q7, 7-pin, DC-coding, 270 mm <sup>1)</sup>	WLA26P-3B112100ZZZ	1222791	
						Male connector M12, 4-pin	For configuring the sensor parameters and Smart Task functions	WLA26P-24162100A00	1218664

<sup>1)</sup> Do not bend below 0 °C.

- **Sensor principle:** Photoelectric retro-reflective sensor
- **Detection principle:** Dual lens
- **Switching output:** push-pull: PNP/NPN

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
0.25 m ... 19 m	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin, 270 mm	-	WLD26P-341121A0ZZZ	1221733
				Cable, 4-wire, 2 m <sup>1)</sup>	-	WLD26P-1H1121A0ZZZ	1218805
				Male connector M12, 4-pin	-	WLD26P-241121A0ZZZ	1218699
0.25 m ... 3 m	Light/dark switching	PinPoint LED	Visible red light	Male connector M12, 4-pin	-	WLD26P-241122A0ZZZ	1113466

<sup>1)</sup> Do not bend below 0 °C.

- **Sensor principle:** Through-beam photoelectric sensor
- **Switching output:** push-pull: PNP/NPN

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
0 m ... 60 m	Dark/light switching	PinPoint LED	Visible red light	Cable, 4-wire, 2 m <sup>1)</sup>	For configuring the sensor parameters and Smart Task functions, for activating the test input	WSE26P-1H161100A00	1099457
	Light/dark switching	LED	Infrared light	Cable with M12 male connector, 4-pin, 270 mm <sup>1)</sup>		WSE26I-34162100A00	1088333
				Cable, 4-wire, 2 m <sup>1)</sup>		WSE26I-1H162100A00	1088334
				Male connector M12, 4-pin		WSE26I-24162100A00	1088332
				PinPoint LED		Visible red light	Cable with M12 male connector, 4-pin, 270 mm <sup>1)</sup>
		Cable, 4-wire, 2 m <sup>1)</sup>	WSE26P-1H162100A00	1088337			
		Cable with connector Q6, 6-pin, DC-coding, 270 mm <sup>1)</sup>	For configuring the time function, for activating the test input	WSE26P-39112102ZZZ		1102912	
		Cable with connector Q7, 7-pin, DC-coding, 270 mm <sup>1)</sup>	-	WSE26P-3B112100ZZZ		1102913	
		Male connector M12, 4-pin	For configuring the sensor parameters and Smart Task functions	WSE26P-24162100A00		1102909	
	Male connector M12, 4-pin	For configuring the sensor parameters and Smart Task functions, for activating the test input	WSE26P-24162100A00	1088335			
		WSE26P-24165100A00	1118267				

<sup>1)</sup> Do not bend below 0 °C.

## 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)