G6

Way above the standard – the economic way to business class

PHOTOELECTRIC SENSORS

SICK
Sensor Intelligence.

Advantages

Way above the standard – the economic way to Business Class

The photoelectric sensors of the G6 product family use both PinPoint LEDs and laser technology. They come in a 1-inch housing mounted using metal inserts with M3 threaded holes. The G6 product portfolio also offers maximum flexibility for solving your application requirements.

Simple alignment using the PinPoint LED Precise, highly visible light spot for easy sensor alignment, even under difficult application conditions
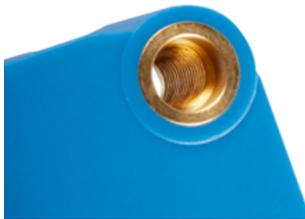
Easy mounting due to metal inserts with M3 thread For quick and easy mounting

Easy adjustment thanks to user-friendly potentiometer Quick installation and commissioning

The G6 product family offers an extensive portfolio of photoelectric sensors for object detection which are suited for a wide range of applications.

Quick to mount and ready to operate right away

Thanks to the reinforced metal inserts with M3 threaded holes, the G6 photoelectric sensor located in the miniature housing can be mounted quickly and securely. This means the photoelectric sensor is ready for use right away to demonstrate its high performance in your manufacturing processes.

Thanks to the PinPoint LED, the singulation of persons at access points is child's play for the G6 miniature photoelectric sensor. Due to its compact design, the G6 also does not need much space. This means several sensors can be used for this application if needed.

The G6 can be adjusted quickly, ensuring smooth processes at transfer points for baggage.

With PinPoint LED and secure mounting, the G6 product family is a low-price and user-friendly solution for countless applications
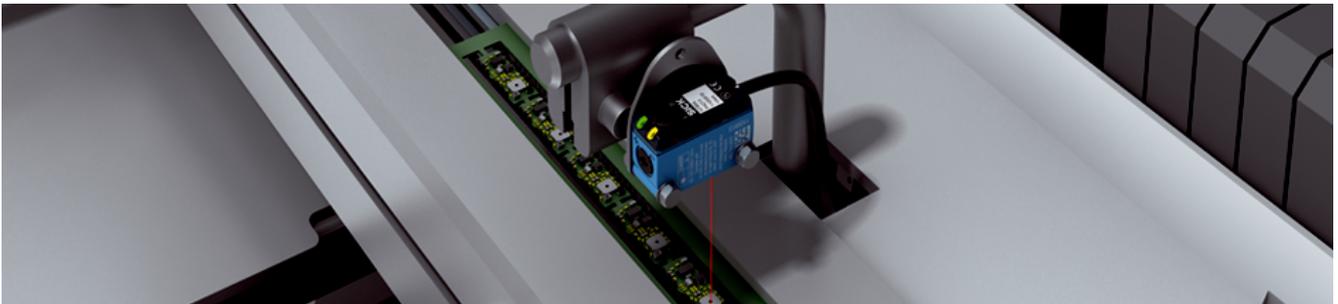
Reliable detection of delicate objects

In addition to its optimal performance, the G6 photoelectric proximity sensor also features a space-saving 1-inch housing. This enables a high level of flexibility in the machine design. The precise laser detection also ensures excellent sensor performance, even under difficult conditions. The G6 laser is therefore perfectly suited for the detection of small parts in electronics production.
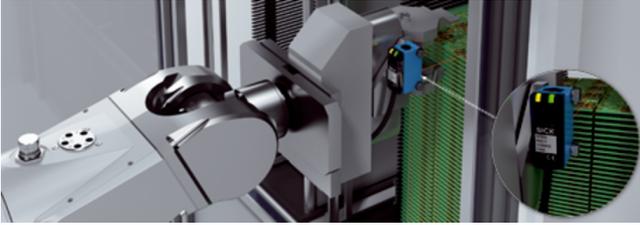
The G6 laser portfolio features photoelectric proximity sensors with background suppression and energetic photoelectric proximity sensors with a sensing range of 400 mm and a light beam diameter of 0.4 mm. That is why the G6 laser is perfect for integration into robot arms and use in automation engineering.
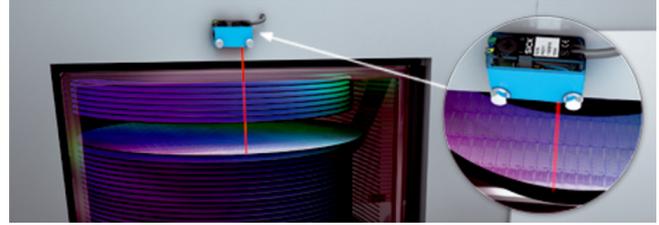
Thanks to its small light beam diameter, the G6 laser is perfect for the detection of wafer discs in handling processes in the semi-conductor industry.

With its laser light spot, the large sensing distance and precise detection, the G6 laser is the ideal solution for many industrial applications.

Rugged and reliable – stainless-steel sensors for washdown applications

With G6 Inox sensors, it's all about using devices that offer maximum reliability under very harsh ambient conditions to optimize production processes. Due to their rust-free stainless-steel housing, the sensors are highly durable. And their high chemical material resistance means they are a reliable option when faced with cleaning agents containing alcohols and alkalis as well as standard oils and lubricants. Thanks to these significant advantages, the G6 Inox sensors are ideal for use in the food and beverage industry. In this sector, hygiene takes top priority and is ensured by means of intensive cleaning and disinfection processes.

Easy to identify even after long periods of use The indestructible laser inscription means that the sensors' type designation will still be easy to read even after long-term use in a harsh environment.

Special coating on the PMMA front screen for additional resistance
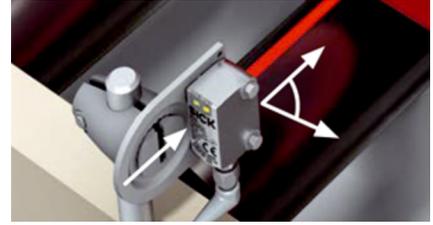
The right sensor for your application – the rectangular housings of the G6 Inox product family offer great flexibility when it comes to installation and adjustment since the sensors can be installed with mounting brackets.

Always the first choice – particularly in harsh environments Due to their exceptional properties, G6 Inox stainless-steel sensors are particularly well-suited for use in industries with strict hygiene requirements and where ambient conditions can be harsh.

Technical data overview

Dimensions (W x H x D)	12 mm x 31.5 mm x 21 mm 15 mm x 44 mm x 22 mm
Sensing range max.	≤ 300 mm [1] ≤ 900 mm 5 mm ... 250 mm [1] ≤ 240 mm [2] 5 mm ... 100 mm [1] 5 mm ... 400 mm [1] 5 mm ... 450 mm [1] 5 mm ... 500 mm [1] 6 mm ... 250 mm [1] 15 mm ... 220 mm [1] 5 mm ... 110 mm [1] 0 mm ... 70 mm [1] ≤ 6 m [3] ≤ 7.2 m [3] 0.03 m ... 6 m [3] ≤ 5 m [3] ≤ 6 m [1] ≤ 4.5 m [3] ≤ 2.5 m [4] ≤ 7.2 m ≤ 4 m [5] 0 m ... 15 m 0 m ... 14.5 m 0 m ... 2 m 0 m ... 10 m ≤ 400 mm [3] 30 mm ... 900 mm [1] 10 mm ... 300 mm [1] 5 mm ... 420 mm [1]
Light source	PinPoint LED LED Laser (depending on type)
Type of light	Visible red light / Infrared light (depending on type)
Enclosure rating	IP67 IP69K [6] IP67 (EN 60529)
Housing material	Plastic ABS/PC Stainless steel Stainless steel V4A (1.4404, 316L) Plastic ABS
Adjustment	Mechanical spindle, 5 turns None Non-sealed Potentiometer, 270° Potentiometer, 270° Sensitivity

[1] Object with 90 % reflectance (referred to standard white, DIN 5033).
[2] Fixed sensing range of 240 mm on black (6% Remission).
[3] Reflector PL80A.
[4] Reflector PL20A.
[5] Reflector P250.
[6] According to ISO 20653:2013-03.

Product description

The photoelectric sensors in the G6 product family with their miniature housings will impress you across the board with both their standard mounting configuration of 1-inch spaced holes and also their functional characteristics. The variants with a stainless steel 1.4404 (316L) housing are especially resistant to chemicals and cleaning agents in washdown applications. With PinPoint LED and laser technology, metal inserts for mounting, large and bright indicator LEDs, user-friendly adjustment screws, IP67 and IP69K enclosure ratings, as well as the very latest ASIC technology from SICK, the G6 series far exceeds the current standard.

At a glance

- PinPoint LED and class 1 laser variants
- SICK ASIC, the result of decades of experience with photoelectric sensors
- Photoelectric proximity sensors with background suppression, energetic photoelectric proximity sensors, and through-beam photoelectric sensors
- ABS plastic housing and V4A stainless-steel 1.4404 (316L) housing
- Enclosure ratings IP67 and IP69K

Your benefits

- PinPoint LEDs (with visible red light and infrared light) or variants with a laser light spot enable objects to be detected reliably and are therefore suitable for a broad range of applications
- Superior optical performance and robustness thanks to the ASIC from SICK
- Quick and easy mounting and high durability thanks to the metal inserts with M3 thread
- Easy installation and adjustment with user friendly potentiometer and highly visible indicator LEDs
- Variants with a stainless steel housing and IP69K enclosure rating ensure a long sensor service life in demanding washdown applications

Fields of application

- Industries with high cleaning requirements (e.g. food and beverage)
- Harsh environments requiring tough metal housing. e.g. due to mechanical impacts
- Applications with high aesthetic standards

Ordering information

Other models and accessories ➜ www.sick.com/G6

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

Sensing range min. / max.	Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
–	0 mm ... 70 mm	Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GTE6-N1201S94	1104698
	30 mm ... 900 mm	Light/dark switching	LED	Infrared light	Cable, 4-wire, 2 m [1]	–	GTE6-E2421V	1084100
			PinPoint LED	Visible red light	Cable, 4-wire, 2 m [1]	–	GTE6-E2431V	1084447
	5 mm ... 110 mm	Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GTE6-N1201S56	1075054
							GTE6-N1201S72	1088411
	≤ 300 mm	Light switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GTE6-N1412S98	1109100
		Light/dark switching	PinPoint LED	Visible red light	Cable with connector M8, 3-pin [1]	–	GTE6-N0211S05	1054573
					Cable, 3-wire, 2 m [1]	–	GTE6-N1211	1050713
							GTE6-N1211S39	1066962
							GTE6-N1211S96	1106538
							GTE6-N1212	1051784
					Male connector M8, 4-pin	–	GTE6-N4211	1050711
							GTE6-N4212	1051782
	≤ 900 mm	Light switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GTE6-N1431S100	1111611
		Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GTE6-N1231	1065745
							GTE6-N1231S95	1105719
							GTE6-N1232	1081668
					Connector M8, 3-pin	–	GTE6-N3231	1068920
					Male connector M8, 4-pin	–	GTE6-N4231	1065761
							GTE6-N4232	1070544

[1] Do not bend below 0 °C.

Sensing range min. / max.	Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
0 mm / 450 mm	–	–	Laser	Visible red light	Cable with M8 male connector, 4-pin, 336 mm	For setting the sensing range, 5 rotations, for inverting the switching function (light/dark switching)	GTE6L-E6211	1109688
							GTE6L-N6211	1109685
					Cable, 3-wire, 2 m		GTE6L-N1211	1105814
					Cable, 4-wire, 2 m		GTE6L-E2211	1105819
					Connector M8, 3-pin		GTE6L-N3211	1117821
					Male connector M8, 4-pin		GTE6L-E4211	1109687
							GTE6L-N4211	1105815

[1] Do not bend below 0 °C.

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

Sensing range min. / max.	Sensing range max.	Switch-ing mode	Light source	Type of light	Connec-tion type	Setting Method	Type	Part no.
–	10 mm … 300 mm	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connec-tor, 4-pin [1]	–	GTE6-F0411VS01	1093662
							GTE6-F7411V	1084097
					Male con-nector M8, 4-pin	–	GTE6-F4411V	1084099
	30 mm … 900 mm	Light/dark switching	LED	Infrared light	Cable, 4-wire, 2 m [1]	–	GTE6-F2421V	1084098
			PinPoint LED	Visible red light	Cable with M12 male connec-tor, 4-pin [1]	–	GTE6-F7431V	1096551
					Cable, 4-wire, 2 m [1]	–	GTE6-F2431V	1086173
	5 mm … 110 mm	Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GTE6-P1201S64	1085281
					Male con-nector M8, 4-pin [1]	–	GTE6-P4201S57	1075634
							GTE6-P4201S63	1083159
	≤ 300 mm	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connec-tor, 4-pin [1]	–	GTE6-P7211	1053589
							GTE6-P7212	1053628
					Cable, 3-wire, 2 m [1]	–	GTE6-P1211	1050712
							GTE6-P1212	1051783
					Male con-nector M8, 4-pin	–	GTE6-P4211	1050710
							GTE6-P4212	1051781
	≤ 900 mm	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connec-tor, 4-pin, 300 mm [1]	–	GTE6-P7231	1113824
					Cable with M8 male connec-tor, 4-pin, 300 mm [1]	–	GTE6-P6231	1080231
					Cable, 3-wire, 2 m [1]	–	GTE6-P1231	1065760
							GTE6-P1232	1069726
					Connector M8, 3-pin	–	GTE6-P3231	1068919
					Male con-nector M8, 4-pin	–	GTE6-P4231	1065730

[1] Do not bend below 0 °C.

Sensing range min. / max.	Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
0 mm / 450 mm	–	–	Laser	Visible red light	Cable with M8 male connector, 4-pin, 336 mm	For setting the sensing range, 5 rotations, for inverting the switching function (light/dark switching)	GTE6L-F6211	1109686
							GTE6L-P6211	1109684
					Cable, 3-wire, 2 m		GTE6L-P1211	1109662
					Cable, 4-wire, 2 m		GTE6L-F2211	1105817
					Connector M8, 3-pin		GTE6L-P3211	1117676
					Male connector M8, 4-pin		GTE6L-F4211	1105818
							GTE6L-P4211	1109683

[1] Do not bend below 0 °C.

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

Sensing range min. / max.	Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
–	5 mm ... 100 mm	Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GTB6-N1211S44	1068476
	5 mm ... 250 mm	Light/dark switching	PinPoint LED	Visible red light	Cable with M8 male connector, 4-pin	–	GTB6-N6211	1058774
						–	GTB6-N6212	1058769

[1] Do not bend below 0 °C.

Sensing range min. / max.	Sensing range max.	Switch-ing mode	Light source	Type of light	Connec-tion type	Setting Method	Type	Part no.
					Cable with connec-tor, JST, 3-pin, 2 m [1]	–	GTB6-N0211S58	1080320
					Cable, 3-wire, 1,900 mm [1]	–	GTB6-N1212S37	1066319
					Cable, 3-wire, 1.9 m [1]	–	GTB6-N1211S38	1066320
					Cable, 3-wire, 2 m [1]	–	GTB6-N0211S51	1072044
							GTB6-N0211S80	1095969
							GTB6-N1211	1052441
							GTB6-N1211S40	1066965
							GTB6-N1211S71	1088381
							GTB6-N1212	1052445
					Cable, 3-wire, 5 m [1]	–	GTB6-N0211S36	1065839
					Cable, 4-wire, 2 m [1]	–	GTB6-E2411V	1084090
					Male con-nector M8, 4-pin	–	GTB6-E4411V	1084094
							GTB6-N4211	1052439
							GTB6-N4212	1052443
	5 mm ... 400 mm	Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GTB6-N1231	1077714
					Cable, 4-wire, 2 m [1]	–	GTB6-E2431V	1084443
	5 mm ... 420 mm	Light/dark switching	LED	Infrared light	Cable, 4-wire, 2 m [1]	–	GTB6-E2421V	1084091
					Male con-nector M8, 4-pin	–	GTB6-E4421V	1084095
	5 mm ... 450 mm	Light/dark switching	LED	Infrared light	Cable with connector M8, 3-pin, 300 mm [1]	–	GTB6-N5241	1097461
					Cable, 3-wire, 2 m [1]	–	GTB6-N1241	1082905

[1] Do not bend below 0 °C.

Sensing range min. / max.	Sensing range max.	Switch-ing mode	Light source	Type of light	Connec-tion type	Setting Method	Type	Part no.
10 mm / 400 mm	–	–	Laser	Visible red light	Cable with M8 male connec-tor, 4-pin, 336 mm	For setting the sensing range, 5 ro-tations, for inverting the switching function (light/dark switching)	GTB6L-E6211	1109661
							GTB6L-N6211	1109659
					Cable, 3-wire, 2 m		GTB6L-N1211	1105811
					Cable, 4-wire, 2 m		GTB6L-E2211	1105813
					Connector M8, 3-pin		GTB6L-N3211	1117824
					Male con-nector M8, 4-pin		GTB6L-E4211	1106320
							GTB6L-N4211	1109658

[1] Do not bend below 0 °C.

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

Sensing range min. / max.	Sensing range max.	Switch-ing mode	Light source	Type of light	Connec-tion type	Setting Method	Type	Part no.
–	–	Light switching	LED	Infrared light	Cable with M12 male connec-tor, 4-pin, 300 mm [1]	–	GTB6-P0041S103	1118025

[1] Do not bend below 0 °C.

[2] Do not bend below -30 °C.

[3] ± 14 mm.

Sensing range min. / max.	Sensing range max.	Switch-ing mode	Light source	Type of light	Connec-tion type	Setting Method	Type	Part no.
	15 mm ... 220 mm	Dark switching	PinPoint LED	Visible red light	Cable with Stocko-connector (MKF-13264) [2]	–	GTB6-P0011S90	1098048
	5 mm ... 250 mm	Dark switching	PinPoint LED	Visible red light	Cable with Stocko-connector (MKF-13264) [2]	–	GTB6-P0211S57	1077853
							GTB6-P0611S59	1081383
		Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connec-tor, 4-pin	–	GTB6-P7211	1057705
			PinPoint LED	Visible red light	Cable with M12 male connec-tor, 4-pin	–	GTB6-P7212	1087972
					Cable with M12 male connec-tor, 4-pin [1]	–	GTB6-F7411V	1084096
							GTB6-P0211S50	1070574
					Cable with M8 male connec-tor, 4-pin	–	GTB6-P0211S52	1073737
							GTB6-P0211S54	1075587
							GTB6-P0211S55	1075662
							GTB6-P0211S60	1081533
							GTB6-P6211	1059320
							GTB6-P6211P03	1098967
					Cable with M8 male connector, 4-pin, an-gled, with rotatable threaded connector	–	GTB6-P0211S74	1089252
					Cable with connector M8, 3-pin	–	GTB6-P5211	1059333
							GTB6-P5211S78	1093698
					Cable, 3-wire, 2 m [1]	–	GTB6-P1211	1052440
							GTB6-P1212	1052444
					Cable, 4-wire, 2 m [1]	–	GTB6-F2411V	1084088
					Connector M8, 3-pin	–	GTB6-P3211	1084646
–	5 mm ... 250 mm	Light/dark switching	PinPoint LED	Visible red light	Male con-nector M8, 4-pin	–	GTB6-F4211	1101441
							GTB6-F4411V	1084092
							GTB6-P4211	1052438

[1] Do not bend below 0 °C.

[2] Do not bend below -30 °C.

[3] ± 14 mm.

Sensing range min. / max.	Sensing range max.	Switch-ing mode	Light source	Type of light	Connec-tion type	Setting Method	Type	Part no.
							GTB6-P4211S66	1086856
							GTB6-P4211S83	1096868
							GTB6-P4212	1052442
	5 mm ... 400 mm	Light switching	PinPoint LED	Visible red light	Connector M8, 3-pin	–	GTB6-P3431V	1097497
		Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connec-tor, 4-pin, 300 mm [1]	–	GTB6-P0231S68	1087744
					Cable with M12 male connec-tor, 4-pin [1]	–	GTB6-F7431V	1094259
					Cable with M8 male connec-tor, 4-pin [3]	–	GTB6-P0231S79	1095116

[1] Do not bend below 0 °C.

[2] Do not bend below -30 °C.

[3] ± 14 mm.

Sensing range min. / max.	Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
					Cable, 3-wire, 1.9 m [1]	–	GTB6-P0231S100	1117156
					Cable, 3-wire, 2 m [1]	–	GTB6-P1231	1074135
					Male connector M8, 4-pin	–	GTB6-F4431V	1086172
							GTB6-P4231	1079712
	5 mm … 420 mm	Light/dark switching	LED	Infrared light	Cable with M12 male connector, 4-pin [1]	–	GTB6-F7421V	1094164
					Cable, 4-wire, 2 m [1]	–	GTB6-F2421V	1084089
					Male connector M8, 4-pin	–	GTB6-F4421V	1084093
	5 mm … 450 mm	Light switching	LED	Infrared light	Cable with M8 male connector, 4-pin, 300 mm [1]	–	GTB6-P6441	1087334
					Cable with connector M8, 3-pin, 300 mm [1]	–	GTB6-P5441S73	1088429
					Cable, 3-wire, 2 m [1]	–	GTB6-P1441S46	1069066
					Connector M8, 3-pin	–	GTB6-P3441	1080971
					Male connector M8, 4-pin	–	GTB6-P4441	1082824
		Light/dark switching	LED	Infrared light	Cable, 3-wire, 2 m [1]	–	GTB6-P1241	1097680
					Male connector M8, 4-pin	–	GTB6-P4241	1082863
	5 mm … 500 mm	Light switching	LED	Infrared light	Cable with M12 male connector, 4-pin, 300 mm [1]	–	GTB6-P7441S56	1077541
					Cable with M12 male connector, 4-pin [1]	–	GTB6-F7441S76	1090968
							GTB6-F7441S82	1096774
					Cable with connector M8, 3-pin [1]	–	GTB6-P5441	1081388
	6 mm … 250 mm	Light switching	PinPoint LED	Visible red light	Connector M8, 3-pin	–	GTB6-P3411S41	1067605
	≤ 240 mm	Light/dark switching	LED	Infrared light	Cable with M12 male	–	GTB6-F7441S65	1086343

[1] Do not bend below 0 °C.
[2] Do not bend below -30 °C.
[3] + 14 mm

Sensing range min. / max.	Sensing range max.	Switch-ing mode	Light source	Type of light	Connec-tion type	Setting Method	Type	Part no.
					connec-tor, 4-pin, 300 mm [1]			
10 mm / 400 mm	–	–	Laser	Visible red light	Cable with M8 male connec-tor, 4-pin, 336 mm	For setting the sensing range, 5 ro-tations, for inverting the switching function (light/dark switching)	GTB6L-F6211	1105812
							GTB6L-P6211	1109657
					Cable, 3-wire, 2 m		GTB6L-P1211	1109656
					Cable, 4-wire, 2 m		GTB6L-F2211	1107210
					Connector M8, 3-pin		GTB6L-P3211	1117820
					Male con-nector M8, 4-pin		GTB6L-F4211	1109660
							GTB6L-P4211	1105810

[1] Do not bend below 0 °C.
[2] Do not bend below -30 °C.
[3] ± 14 mm.

- **Sensor principle:** Photoelectric retro-reflective sensor
- **Detection principle:** Dual lens
- **Switching output:** NPN

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Type	Part no.
0.03 m … 6 m	Light/dark switching	PinPoint LED	Visible red light	Cable, 4-wire, 2 m [1]	GL6-E2411V	1084102
				Male connec-tor M8, 4-pin	GL6-E4411V	1084104
≤ 4.5 m	Light switching	LED	Visible red light	Cable with M8 male connec-tor, 4-pin [1]	GL6-N0511S82	1093402
					GL6G-N0611S88	1098975
≤ 400 mm	Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	GL6G-N1211S72	1085829
≤ 6 m	Dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	GL6-N1311S22	1062692
	Light switching	PinPoint LED	Visible red light	Cable, 3-wire, 3 m [1]	GL6G-N0611S43	1068695
	Light/dark switching	PinPoint LED	Visible red light	Cable with AMP connector [1]	GL6-N0111S13	1059088
≤ 6 m	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male con-nector, 4-pin	GL6-N7210S74	1087897
	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male con-nector, 4-pin	GL6-N7211	1087771
					GL6-N7212	1087770

[1] Do not bend below 0 °C.

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Type	Part no.
				Cable with M8 male connector, 4-pin	GL6-N6211	1062587
					GL6-N6212	1062588
				Cable with connector, JST, 3-pin [1]	GL6-N0111S12	1059087
				Cable, 3-wire, 2 m [1]	GL6-N1111	1050709
					GL6-N1111S39	1066964
					GL6-N1112	1051780
					GL6-N1112S70	1084571
					GL6-N1211	1059923
					GL6-N1211P14	1102680
					GL6-N1211S27	1062937
					GL6-N1211S98	1105720
					GL6-N1212	1060814
					GL6-N1212P16	1105101
					GL6-N1212S99	1105729
					GL6G-N1211	1059925
					GL6G-N1212	1060811
					GL6G-N1212S01	1066255
				Connector M8, 3-pin	GL6-N3211	1094438
					GL6-N3212	1094437
				Cable with male connector, MOLEX 3-pin 3pitch 4,2 mm (9-01-4033) and contact pin AWG28 (39-00-0048), 600 +/- 10 mm (incl. 20 +/- 2 mm remote cable) [1]	GL6-N0111S89	1099322
				Male connector M8, 4-pin	GL6-N4111	1050707
					GL6-N4111S16	1061068
					GL6-N4112	1051778
					GL6-N4211	1059631
					GL6-N4212	1063491
					GL6G-N4211	1059633
					GL6G-N4212	1060809
≤ 7.2 m	Light/dark switching	LED	Visible red light	Male connector M8, 4-pin	GL6-N4111S06	1054676

[1] Do not bend below 0 °C.

- **Sensor principle:** Photoelectric retro-reflective sensor
- **Detection principle:** Dual lens
- **Switching output:** PNP

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Type	Part no.
0.03 m … 6 m	Dark switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin [1]	GL6-P7411V	1104194
				Connector M8, 3-pin	GL6-P3411V	1097411
	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin [1]	GL6-F7411V	1084105
				Cable, 4-wire, 2 m [1]	GL6-F2411V	1084101
					GL6G-F2411V	1084445
				Male connector M8, 4-pin	GL6-F4411V	1084103
					GL6-P4111	1050706
					GL6G-F4411V	1101719
≤ 2.5 m	Light switching	LED	Visible red light	Cable with M8 male connector, 4-pin [1]	GL6-P0511S17	1061393
≤ 400 mm	Light/dark switching	PinPoint LED	Visible red light	Cable with M8 male connector, 4-pin [1]	GL6G-P6211S95	1103554
				Cable, 3-wire, 2 m [1]	GL6G-P1211S83	1094109
				Male connector M8, 4-pin	GL6G-P4211S97	1104671
≤ 4 m	Dark switching	PinPoint LED	Visible red light	Cable with connector M12, 5-pin, with dual cable, 0.57 m and 0.27 m cable length [1]	GL6-P0311S94	1102710
≤ 5 m	Light/dark switching	LED	Visible red light	Cable with M8 male connector, 4-pin [1]	GL6-P0111S91	1101834
		PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin [1]	GL6-P7102S107	1116810

[1] Do not bend below 0 °C.

[2] Can be bent to −30 °C.

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Type	Part no.
≤ 6 m	Dark switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin [1]	GL6-P7311	1066207
					GL6-P7312	1066208
				Cable with M8 male connector, 4-pin [1]	GL6-V6311	1101833
					GL6-V6411	1100566
				Cable with WAGO terminal 733-103, 700 mm [1]	GL6-P0311S66	1079226
				Cable with connector M8, 3-pin	GL6G-P0411S45	1068944
≤ 6 m	Dark switching	PinPoint LED	Visible red light	Cable with connector M8, 3-pin [1]	GL6-P0311S40	1066976
					GL6-P0312P08	1081349
				Cable, 3-wire, 2 m [1]	GL6-P1311	1079225
				Connector M8, 3-pin	GL6-P3311	1081007
				Cable with male connector, M8, 3-pin, angled, with knurled screws [1]	GL6-P0311S114	1119915
				Male connector M8, 4-pin [1]	GL6-F4311	1066751
	Light switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin [1]	GL6-P0512S60	1073718
					GL6-P7511	1056039
					GL6-P7511S33	1064241

[1] Do not bend below 0 °C.
[2] Can be bent to −30 °C.

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Type	Part no.
		PinPoint LED	Visible red light	Cable with M8 male connector, 4-pin [1]	GL6-P0511P10	1090218
					GL6-P0511S03	1052911
					GL6-P0511S109	1117742
					GL6-P0511S76	1088287
					GL6-P0511S80	1090639
				Cable with MOLEX-connector 43020-0409 [1]	GL6-P0511S86	1097463
				Cable with Phoenix connector [1]	GL6-P0511S11	1058790
				Cable with connector M12, 4-pin, angled [1]	GL6-P0511S111	1118923
				Cable with connector M8, 3-pin [1]	GL6-P0511S02	1052633
					GL6-P0511S103	1112760
					GL6-P0511S19	1061962
				Cable with connector, JST, 3-pin [1]	GL6-P0511P20	1114857
					GL6-P0511S56	1073104
				Cable, 3-wire, 2 m [1]	GL6-P1511	1079227
				Cable, 3-wire, 4 m [1]	GL6-P0511S67	1079228
				Cable, 3-wire, 700 mm [1]	GL6-P0511S68	1079229
				Cable, 4-wire [1]	GL6-F2511S65	1077362
				Male connector M8, 4-pin	GL6-F4511S24	1062735
					GL6-P4511	1052634
					GL6-P4511S37	1065727
	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin	GL6-P0211S49	1070568
≤ 6 m	Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin	GL6-P0212S48	1070569
					GL6-P7211	1066884
					GL6-P7211P05	1067329
					GL6-P7212S55	1070552
					GL6G-P7211S96	1103653
				Cable with M12 male connector, 4-pin [1]	GL6-F7511	1061399
					GL6-P0111S18	1061608
					GL6-P0111S71	1086027
					GL6-P0112S72	1086028

[1] Do not bend below 0 °C.
[2] Can be bent to −30 °C.

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Type	Part no.
		PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin [1]	GL6-P7111	1052966
					GL6-P7111S36	1065392
					GL6-P7112	1053590
				Cable with M12 male connector, 4-pin [2]	GL6-F7511S44	1068756
				Cable with M8 male connector, 4-pin	GL6-P0211S105	1113475
					GL6-P0211S69	1081522
					GL6-P6211	1058851
					GL6-P6212	1062753
				Cable with M8 male connector, 4-pin [1]	GL6-P6111	1060234
					GL6-P6111P13	1098966
					GL6-P6112	1060235
				Cable with WAGO terminal 733-104, 3-pin, 2 m [1]	GL6-P0112S115	1120934
				Cable with connector M8, 3-pin, 1,539 mm	GL6-P0211S108	1117625
				Cable with connector M8, 3-pin [1]	GL6-P0111S04	1054549
					GL6-P0111S08	1057193
					GL6-P0111S112	1119394
					GL6-P0111S64	1074238
					GL6-P0112P07	1081328
				Cable with connector M8, 4-pin, with knurled nuts	GL6-P0211S104	1113341
				Cable, 3-wire, 10 m [1]	GL6-P0211S78	1089462
				Cable, 3-wire, 2 m [1]	GL6-P0211S23	1062586
≤ 6 m	Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	GL6-P1111	1050708
					GL6-P1112	1051779
					GL6-P1112S06	1116648
					GL6-P1112S84	1094532
					GL6-P1211	1059922
					GL6-P1212	1060815
					GL6G-P1211	1059924
					GL6G-P1212	1060812
				Cable, 3-wire, 3 m [1]	GL6-P0112S52	1071362

[1] Do not bend below 0 °C.
[2] Can be bent to –30 °C.

Sensing range max.	Switching mode	Light source	Type of light	Connection type	Type	Part no.
		PinPoint LED	Visible red light	Cable, 3-wire, 5 m [1]	GL6-P0112S54	1071368
					GL6-P0211S77	1089461
				Cable, 4-wire, 5 m [1]	GL6-F0311S47	1069245
				Cable, 4-wire [1]	GL6-F03111S58	1073531
				Connector M8, 3-pin	GL6-P3211	1068921
					GL6-P3212	1068970
					GL6-P3212S63	1073763
				Male connector M8, 4-pin	GL6-F4611	1068338
					GL6-P4110P09	1088584
					GL6-P4110P11	1090376
					GL6-P4110P19	1113305
					GL6-P4111S01	1052553
					GL6-P4111S92	1102163
					GL6-P4112	1051777
					GL6-P4211	1059241
					GL6-P4212	1062110
					GL6G-P4211	1059632
					GL6G-P4211S71	1084967
					GL6G-P4211S73	1086956
					GL6G-P4212	1060810
				Male connector M8, 4-pin [1]	GL6-O4511S81	1093209
≤ 7.2 m	Dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	GL6-P1311S41	1067706
	Light switching	PinPoint LED	Visible red light	Male connector M8, 4-pin	GL6-P4511S73	1086558
	Light/dark switching	PinPoint LED	Visible red light	–	GL6-P0111S25	1062887
				Cable with Tyco connector [1]	GL6-P0111S09	1058698
				Cable with connector M8, 4-pin, with knurled nuts, 1 m [1]	GL6-P0111S62	1073739
				Cable with connector M8, 4-pin, with knurled nuts, 3 m [1]	GL6-P0111S61	1073738
				Cable, 3-wire [1]	GL6-P1111S57	1073479
				Male connector M8, 4-pin	GL6-F4611S55	1072662
					GL6-P4111S46	1069178

[1] Do not bend below 0 °C.

[2] Can be bent to –30 °C.

- **Sensor principle:** Through-beam photoelectric sensor
- **Switching output:** NPN

Sensing range min. / max.	Sensing range max.	Switch-ing mode	Light source	Type of light	Connec-tion type	Setting Method	Type	Part no.
–	0 m ... 14.5 m	Dark switching	LED	Infrared light	Cable, 3-wire, 2 m [1]	–	GSE6-N1321S54	1074344
		Light/dark switching	LED	Infrared light	Cable, 3-wire, 2 m [1]	–	GSE6-N1121	1064653
							GSE6-N1221	1064675
							GSE6-N1221S65	1105721
					Cable, 4-wire, 2 m [1]	–	GSE6-E2421V	1084114
					Male con-nector M8, 4-pin	–	GSE6-E4421V	1084117
	0 m ... 15 m	Dark switching	LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GSE6-N1311S57	1084773

[1] Do not bend below 0 °C.

Sensing range min. / max.	Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
			PinPoint LED	Visible red light	Cable with M8 male connector, 4-pin [1]	–	GSE6-N6311	1062399
							GSE6-N6312	1062397
		Light/dark switching	–	–	Cable, 3-wire, 2 m [1]	–	GE6-N1111S68	2110725
			PinPoint LED	Visible red light	Cable with M12 male connector, 4-pin [1]	–	GSE6-N7111	1054833
							GSE6-N7112	1054835
					Cable with M8 male connector, 4-pin [1]	–	GSE6-N6111	1054849
							GSE6-N6112	1054852
					Cable, 3-wire, 2 m [1]	–	GSE6-N0111S52	1072046
							GSE6-N1111	1052449
							GSE6-N1111S07	1056686
							GSE6-N1111S15	1059191
							GSE6-N1112	1052453
							GSE6-N1211	1060791
							GSE6-N1212	1060795
					Cable, 4-wire, 2 m [1]	–	GSE6-E2411V	1084108
					Male connector M8, 4-pin	–	GSE6-E4411V	1084110
							GSE6-N4111	1052447
							GSE6-N4112	1052451
							GSE6-N4211	1061395
							GSE6-N4212	1061397
	0 m … 2 m	Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GSE6-N1112P04	1080814
0 m / 40 m	–	–	Laser	Visible red light	Cable with M8 male connector, 4-pin, 336 mm	For setting the sensing range, for inverting the switching function (light/dark switching)	GSE6L-E6211	1109741
							GSE6L-N6211	1105829
					Cable, 3-wire, 2 m		GSE6L-N1211	1105827
					Cable, 4-wire, 2 m		GSE6L-E2211	1109732
					Connector M8, 3-pin		GSE6L-N3211	1117823
					Male connector M8, 4-pin		GSE6L-E4211	1109737
							GSE6L-N4211	1105828

[1] Do not bend below 0 °C.

- **Sensor principle:** Through-beam photoelectric sensor
- **Switching output:** PNP

Sensing range min. / max.	Sensing range max.	Switch-ing mode	Light source	Type of light	Connec-tion type	Setting Method	Type	Part no.
–	0 m … 10 m	Light/dark switching	PinPoint LED	Visible red light	Male connector M8, 4-pin	–	GE6-P4211S67	2110029
							GE6-P4211S69	2115957
							GE6-P4212S71	1112774
	0 m … 14.5 m	Dark switching	LED	Infrared light	Cable, 3-wire, 0.5 m [1]	–	GE6-P0321S71	2119996
							GSE6-P0321S71	1115663
					Cable, 3-wire, 2 m [1]	–	GSE6-P1321S55	1078808
		Light/dark switching	LED	Infrared light	Cable with M12 male connec-tor, 4-pin [1]	–	GSE6-P0121S48	1070054
					Cable with connector M8, 3-pin [1]	–	GSE6-P0121S56	1084759
					Cable, 3-wire, 2 m [1]	–	GSE6-P1121S14	1059111
							GSE6-P1221	1073529
					Cable, 4-wire, 2 m [1]	–	GSE6-F2421V	1084113
					Male con-nector M8, 4-pin	–	GSE6-F4421V	1084116
							GSE6-P4121S31	1063527
			PinPoint LED	Visible red light	Cable with M12 male connec-tor, 4-pin	–	GSE6-F7311V	1092108
–	0 m … 15 m	Dark switching	PinPoint LED	Visible red light	Cable with connector M8, 3-pin [1]	–	GSE6-P5310P10	1090341
							GSE6-P5311	1088017
							GSE6-P5311P12	1090897
					Cable, 3-wire, 2 m [1]	–	GSE6-P1311S59	1084827
		Light switching	PinPoint LED	Visible red light	Connector M8, 3-pin	–	GS6-D3311S55	2080478
					Male con-nector M8, 4-pin	–	GE6-P4511S55	2080494
		Light/dark switching	PinPoint LED	Visible red light	Cable with M12 male connec-tor, 4-pin [1]	–	GSE6-P7111	1054830
				Visible red light	Cable with M12 male connec-tor, 4-pin [1]	–	GSE6-P7112	1054831

[1] Do not bend below 0 °C.
[2] Do not bend below 35 °C.

Sensing range min. / max.	Sensing range max.	Switching mode	Light source	Type of light	Connection type	Setting Method	Type	Part no.
					Cable with M8 male connector, 4-pin [1]	–	GSE6-P6111	1054848
							GSE6-P6112	1054850
							GSE6-P6211	1061847
							GSE6-P6212	1061848
					Cable with connector M8, 3-pin [1]	–	GSE6-P0211S58	1084824
							GSE6-P5211	1079603
					Cable with connector, JST, 3-pin, 600 mm [2]	–	GSE6-P0111S51	1072004
					Cable, 3-wire, 2 m [1]	–	GSE6-P1111	1052448
							GSE6-P1112	1052452
							GSE6-P1211	1060792
							GSE6-P1212	1061398
					Cable, 4-wire, 2 m [1]	–	GSE6-F2411V	1084106
					Connector M8, 3-pin	–	GSE6-P3211	1067659
					Male connector M8, 4-pin	–	GE6-P4111S64	2107414
							GSE6-F4411V	1084109
							GSE6-P4110P07	1088585
							GSE6-P4110P11	1090374
							GSE6-P4111	1052446
							GSE6-P4112	1052450
							GSE6-P4211	1061394
							GSE6-P4212	1061396
	0 m ... 2 m	Light/dark switching	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	–	GSE6-P1112P03	1080299
0 m / 40 m	–	–	Laser	Visible red light	Cable with M8 male connector, 4-pin, 336 mm	For setting the sensing range, for inverting the switching function (light/dark switching)	GSE6L-F6211	1105831
							GSE6L-P6211	1109730
					Cable, 3-wire, 2 m		GSE6L-P1211	1105826
					Cable, 4-wire, 2 m		GSE6L-F2211	1109731
					Connector M8, 3-pin		GSE6L-P3211	1117678
					Male connector M8, 4-pin		GSE6L-F4211	1105830
							GSE6L-P4211	1109729

[1] Do not bend below 0 °C.
[2] Do not bend below 35 °C.

- **Sensor principle:** Through-beam photoelectric sensor

Sensing range max.	Light source	Type of light	Connection type	Type	Part no.
0 m … 10 m	PinPoint LED	Visible red light	Male connector M8, 4-pin	GS6-D4311S66	2110027
				GS6-D4311S69	2115956
				GS6-D4312S71	1112773
0 m … 14.5 m	LED	Infrared light	Cable, 3-wire, 0.5 m [1]	GS6-P0321S71	2119995
0 m … 15 m	PinPoint LED	Visible red light	Cable, 3-wire, 2 m [1]	GS6-P1111S62	1092839
			Male connector M8, 4-pin	GS6-D4311	2058059

[1] Do not bend below 0 °C.

- **Sensor principle:** Photoelectric retro-reflective sensor
- **Switching output:** PNP

Sensing range min. / max.	Light source	Type of light	Connection type	Setting Method	Type	Part no.
0.08 m / 12 m	Laser	Visible red light	Cable with M12 male connector, 4-pin, 342 m	For setting the sensing range, for inverting the switching function (light/dark switching)	GL6L-P7212	1122654
			Cable with M8 male connector, 4-pin, 336 mm		GL6L-F6211	1109727
					GL6L-F6212	1115580
					GL6L-P6211	1109690
					GL6L-P6212	1115574
			Cable, 3-wire, 2 m		GL6L-P1211	1109689
					GL6L-P1212	1115572
			Cable, 4-wire, 2 m		GL6L-F2211	1109726
					GL6L-F2212	1115578
			Connector M8, 3-pin		GL6L-P3211	1117677
			Male connector M8, 4-pin		GL6L-F4211	1105823
					GL6L-F4212	1115579
					GL6L-P4211	1105822
					GL6L-P4212	1115573

- **Sensor principle:** Photoelectric retro-reflective sensor
- **Switching output:** NPN

Sensing range min. / max.	Light source	Type of light	Connection type	Setting Method	Type	Part no.
0.08 m / 12 m	Laser	Visible red light	Cable with M8 male connector, 4-pin, 336 mm	For setting the sensing range, for inverting the switching function (light/ dark switching)	GL6L-E6211	1105825
					GL6L-E6212	1115583
					GL6L-N6211	1109725
					GL6L-N6212	1115577
			Cable, 3-wire, 2 m		GL6L-N1211	1109691
					GL6L-N1212	1115575
			Cable, 4-wire, 2 m		GL6L-E2211	1105824
					GL6L-E2212	1115581
			Connector M8, 3-pin		GL6L-N3211	1117822
			Male connector M8, 4-pin		GL6L-E4211	1109728
					GL6L-E4212	1115582
					GL6L-N4211	1109724
					GL6L-N4212	1115576

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