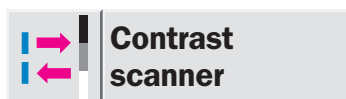
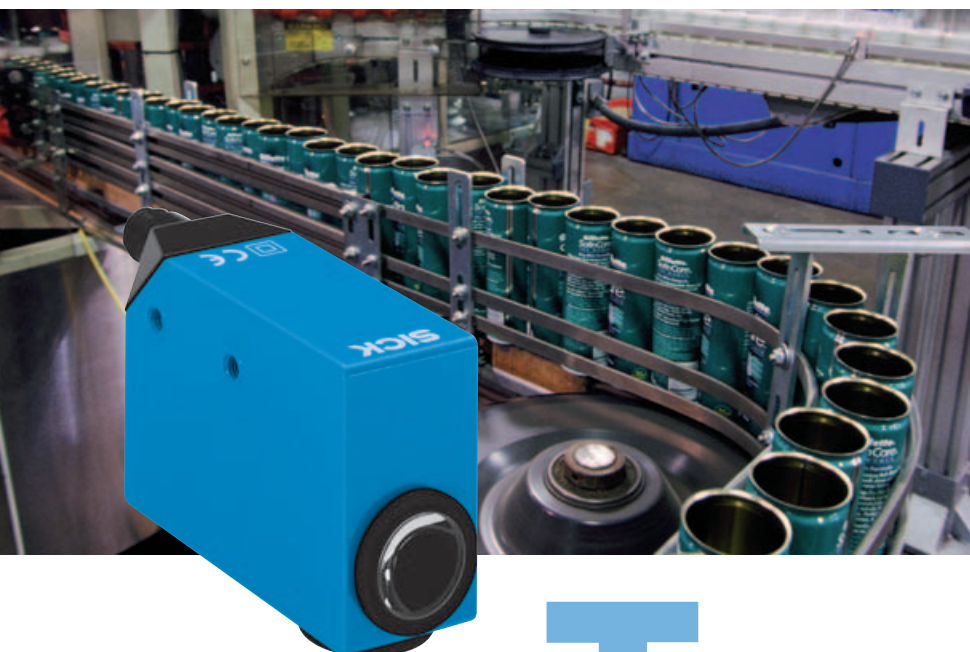


KT 8 CAN: communication without limits



The KT 8 CAN is distinguished by its ability to communicate. This makes it possible for users to adapt the sensor specifically to their requirements and integrate additional functions conveniently into their machines.

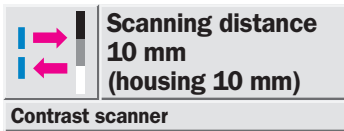
Almost any number of parameter records, i.e. taught-in sensor settings (e.g. for different packaging or printed materials), can be stored via the CAN interface. If required, these parameters are

transmitted to the sensor. At the same time, this procedure simplifies the validation process in accordance with "CFR21 part 11" (e.g. in the pharmaceutical industry). The sensor setting is stored as a reproducible parameter record directly in the automation system of the machine. Therefore, there is no longer need to maintain the settings in written form. In addition, important process data such as contamination level or the current switching threshold can also be accessed via modem or internet.

The advantage: Setup times are reduced, critical sensor settings are detected at an early stage and preventative measures become possible. As a result, malfunctions can be corrected quickly and efficiently in emergencies.

Three colour LED, gloss adjustment, automatic drift correction and short response time round off this product.

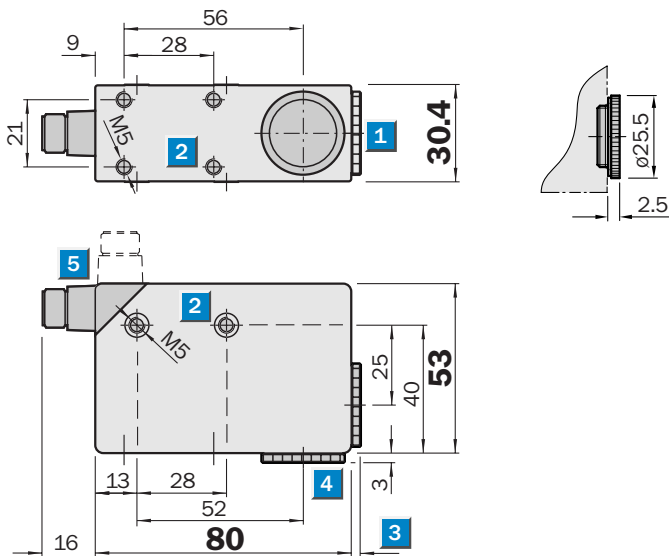
SICK



- CAN-interface
 - Parameter administration
 - Process documentation
 - Process adaption
- Automatic drift correction
- Short response time
- Precise light spot
- Red, green, blue emission LED
- 2 light exits (changeable)

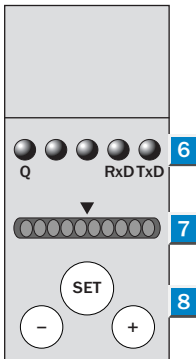
Dimensional drawing

All types



Adjustments possible

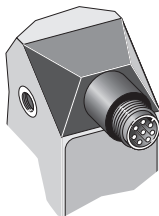
All types



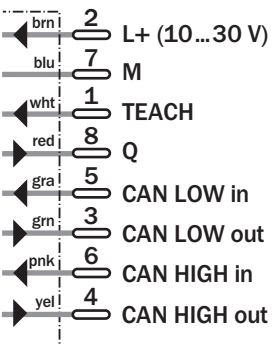
- 1 Lens (light transmission), can be exchanged for pos. 3
- 2 M5 mounting holes, 5.5 mm deep
- 3 See dimensional drawing of lens
- 4 Blind screw can be replaced by lens 1
- 5 8-pin, M12 x 1 plug (rotatable through 90°)
- 6 Functional signal indicators (yellow)
- 7 Bar display (green)
- 8 Teach-in button/“+” and “-” button

Connection type

All types



8-pin, M12 x 1



Technical data		KT8W-	P111C	N111C								
Scanning distance	12.5 ± 3 mm											
from front edge of lens												
Light source ¹⁾; light type	LED; red, green, blue											
Wave length (nm)	640, 525, 470											
Light spot dimensions	4.2 x 1.2 mm											
Light spot position	Longitudinal											
Supply voltage V_S	10 ... 30 V DC ²⁾											
Residual ripple ³⁾	< 5 V											
Current consumption ⁴⁾	< 80 mA											
Switching outputs	PNP: HIGH = V _S - < 2 V / LOW = 0 V											
	NPN: HIGH = V _S / LOW = < 2 V											
Output current I _A max.	< 100 mA											
Output logic	Light/dark via											
	teach-in procedure (default)											
(Adjustable)	Light switching											
	Dark switching											
Switching frequency max. ⁶⁾	20000/s											
Response time ⁵⁾	25 µs											
Teach-in input ET	PNP: Teach > 10 V ... < V _S											
	Run 0 V or unswitched											
	NPN: Teach 0 V											
	Run V _S or unswitched											
Teach-in procedure	Dynamic-teach-in (default)											
(Adjustable)	2-point-teach-in											
Timer deactivation delay	None (default)											
	20 ms (adjustable)											
Interface	CAN (with CANopen features)											
Blanking input AT												
Blanked	PNP: AT > 10 V											
Free running	AT > 2 V or unswitched											
Blanked	NPN: AT < 2 V											
Free running	AT > 10 V or unswitched											
Retention time	25 ms non-volatile memory											
Connection type	M12 plug, 5-pin											
VDE protection class ⁸⁾	□											
Circuit protection ⁹⁾	A, B, C, D											
Enclosure rating	IP 67											
Ambient temperature T_A	Operation -10 ... +55 °C											
	Storage -25 ... +75 °C											
Shock load	To IEC 68											
Weight	Approx. 400 g											
Housing material	Cast zinc											

¹⁾ Average service life 100,000 h at T_A = + 25 °C

²⁾ Limit values

³⁾ May not exceed or fall short of V_S tolerances

⁴⁾ Without load

⁵⁾ With resistive load

⁶⁾ With light/dark ratio 1:1

⁷⁾ Do not bend below 0 °C

⁸⁾ Reference voltage 50 V DC

⁹⁾ A = V_S connections reverse-polarity protected

B = Outputs short-circuit protected

C = Interference pulse suppression

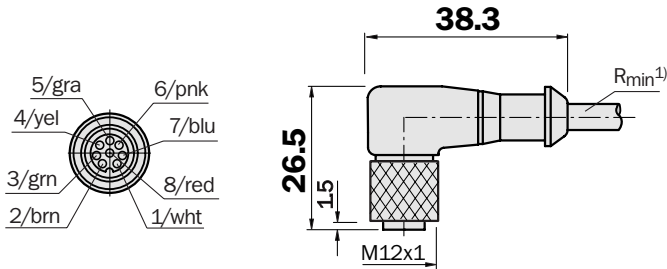
D = Outputs overcurrent and short-circuit protected

Order information

Type	Order no.
KT8W-P111C	1 027 919
KT8W-N111C	1 028 223

Accessories

Round connector M12, 8-pin, shielded



- 1) Minimum bend radius in dynamic use
 $R_{min} = 20 \times \text{cable diameter}$

Technical data

Nominal voltage U_b	30 V AC/36 V DC
Contact resistance	$\leq 5 \text{ m}\Omega$
Nominal power	1.5 A
Test voltage	1.5 kV eff./60 s.
Insulation group	C acc. VDE 0110
Insulation resistance	$> 10^9 \Omega$
Temperature range	In fixed position $-25^\circ\text{C} \dots +80^\circ\text{C}$ In flexible motion $+5^\circ\text{C} \dots +80^\circ\text{C}$
Molded cable	
Bend radius	$> 20 \times \text{diameter of cable}$
Contact	CuZn, 0.3 μm gold plated
Locking nut	CuZn, nickeled
Cable	PUR, colour orange (7 x 0.25 mm ² and shield)
Connector	TPU, colour orange
Terminal screwed connector	
Contact	CuZn, pre-nickeled, 2 ... 4 μm CuSnZn
Connection type	Connector
Housing	CuZn, brass nickeled

Order information

Round connectors M12, 8-pin shielded

Type	Order no.	Description	Shield	Cable length [m]	Cable
DOL-1208-W02MAS01	6 029 224	Female connector angled	360° on locking nut	2	PUR

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