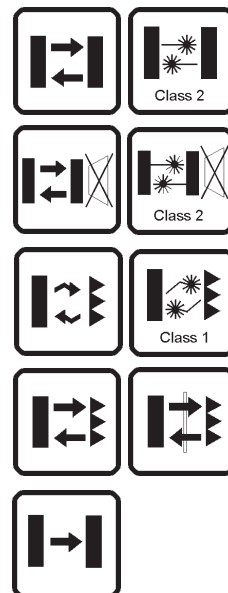


MICROPROCESSOR-BASED MINIATURE SENSORS



- *EASYtouch™ microprocessor Teach-in and Remote setting*
- *Laser retroreflex, proximity and background suppression*
- *Cable or M8 connection, NPN or PNP*
- *ABS housing with IP67 protection*

S40 SERIES

The photoelectric sensors of the **S40** series, in the innovative miniature housing, offer all the main optic functions with the advantages of microprocessor control and automatic Teach-in and Remote setting with *EASYtouch™* procedure.


The series includes different models: 30 cm diffuse proximity and 10 cm background suppression, 4 m retroreflex, 3 m polarised retroreflex, or 0.7 m version for the detection of transparent glass or PET objects, 6 m through beam models, all with visible red emission.

The laser emission is available for retroreflex, proximity and background suppression, offering very high resolution detection.

The sensitivity and operating distance setting are obtained by simply pressing the button, or by cable to allow remote control and the mounting in small or difficult to reach areas.

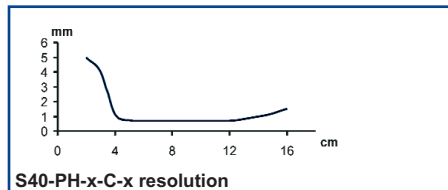
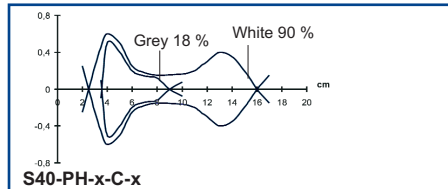
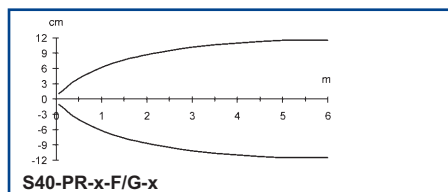
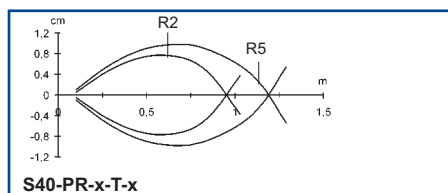
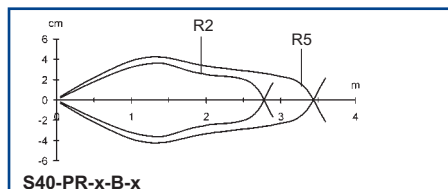
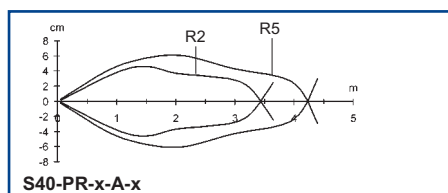
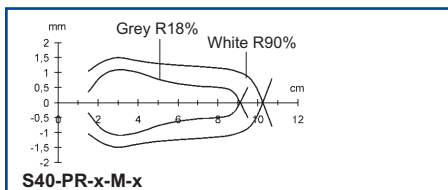
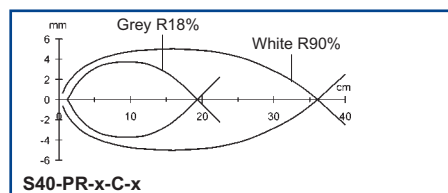
The output can be either PNP or NPN, with cable or M8 connection, depending on the model.

TECHNICAL DATA

Power supply:	10 ... 30 Vdc, reverse polarity protection
Consumption:	35 mA max.
Light emission:	red LED 660 nm, red laser 650 nm
Diffuse proximity operating distance:	0.5 ... 30 cm
Laser diffuse proximity op. distance:	4 ... 15 cm
Laser proximity resolution:	0.2 mm (on focus point)
Background suppression op. distance:	15 ... 100 mm
Laser background suppr. op. distance:	20 ... 60 mm
Laser background suppr. resolution:	0.2 mm (on focus point)
Background suppr. white/grey diff.:	7 %
Retroreflex operating distance:	0.1 ... 3 m (on R2)
Polarised retroreflex operating distance: ..	0.1 ... 2.5 m (on R2)
Laser polarised retroreflex op. distance: ..	0.1 ... 6 m (on R2)
Laser retroreflex resolution:	1 mm (on focus point)
Retroreflex transparent op. distance:	0.1 ... 0.7 m (on R2)
Through beam operating distance:	0.1 ... 6 m
Setting:	SET push-button Remote by cable
Indicators:	yellow OUTPUT LED green POWER LED (G vers.) green READY/ERROR LED
Output type:	NPN or PNP, Rpull-down/up 22 kΩ
Saturation voltage:	2.4 V max.
Output current:	100 mA max, short-circuit protection
Response time:	0.5 ms 125 μs (laser B03 and C03 versions)
Switching frequency:	1 kHz max. 4 kHz (laser B03 and C03 versions)
Operating mode:	dark/light programmable
Connection:	4-pole M8 connector 2 m Ø 3.5 mm cable
Laser safety class:	class II
Electrical protection:	class 2
Mechanical protection:	IP67
Housing material:	ABS
Lens material:	PMMA plastic
Weight:	10 g max. (connector vers.) 40 g max. (cable vers.)
Operating temperature:	-20 ... +60°C
Storage temperature:	-20 ... +80°C
Reference standard:	EN 60947-5-2, EN 60825-1
Certifications:	CE  US LISTED

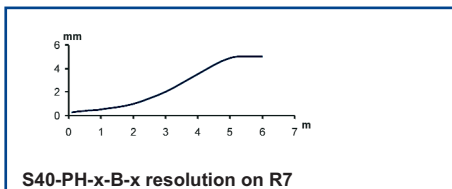
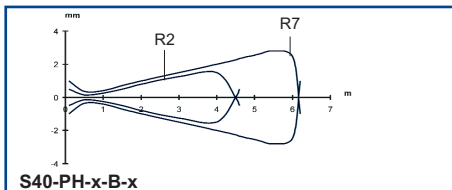
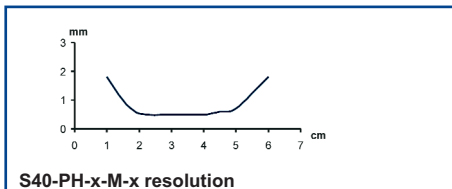
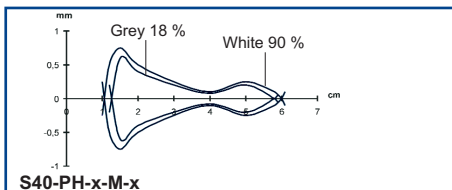
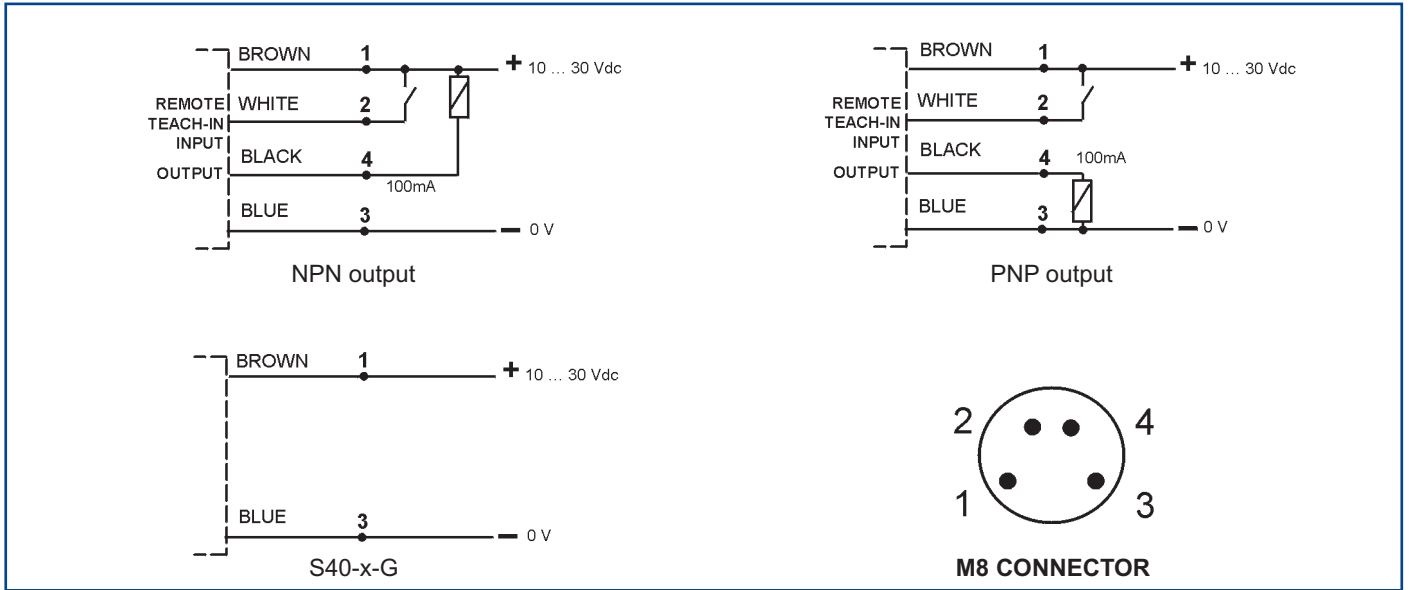
The operating distances indicate the detection distance with excess gain 2.

DETECTION DIAGRAMS



The detection diagrams indicate the typical operating distance with excess gain 1.

CONNECTIONS



DIMENSIONS

