



# S45

## 950411260

**S45-PH-5-C03-PH**

HIGH PERFORMANCE EUROPEAN STYLE MINIATURE  
SENSOR ALL-IN-ONE FAMILY

## OVERVIEW

- Red LED and Laser emissions
- Precise risk free laser class 1 emission
- Diffused LED proximity 800mm
- Background Suppression 400mm
- Retroreflective Class 1 Laser 15m/Red LED 7m
- Through beam Class 1 Laser 20m/Red LED 15m
- IP69K housing
- 2m Cable or metal M8 4 pole version
- PNP or NPN output with remote teach in input
- High speed RGB and white emission contrast sensor
- High precision distance sensor up to 200 mm

## TECHNICAL FEATURES

### Detection properties

Nominal sensing distance	250mm
--------------------------	-------

Sensitivity adjustment	Teach-in
------------------------	----------

### Application

Function Principle	Diffuse beam
--------------------	--------------

Description	Miniature european style rear holes
Optic position	Radial 90°
Functions	Diffuse beam

#### Outputs

Output type	PNP L/D selectable
Output Function	L/D selectable
Response time	0,33

#### Electrical data

Operating Voltage	10...30VDC
No-Load supply current	≤ 30mA
Load current	≤100mA
Output voltage drop	≤2V@Iload=100mA
LED indicators	Green (PowerON) Yellow (status output)
Short-circuit protection	YES
Reverse Polarity Protection	Yes
Emission	LASER Red (650nm)
Interference to external light	according to EN 60947-5-2 : 2020
Impulsive Overvoltage Protection	Yes
Insulation resistance	>20 MΩ 500 Vdc, between electronics and housing

Contact resistance	500 Vac 1 min., between electronics and housing
--------------------	-------------------------------------------------

#### Mechanical data

Dimensions	12x34x20
------------	----------

Housing Material	ABS(Housing), PMMA (Optics)
------------------	-----------------------------

Connections	M8 plug 4pin
-------------	--------------

Active Head Material	PMMA
----------------------	------

Storage temperature	- 25°C...+70°C
---------------------	----------------

Material	Plastic ABS / PMMA
----------	--------------------

Diameter/Dimension	cubic
--------------------	-------

#### Test/Approvals

Approvals	CE cULus
-----------	----------

Shocks and vibrations	0.5 mm amplitude, 10 ... 55 Hz frequency, for every axis (EN60068-2-6)
-----------------------	------------------------------------------------------------------------

#### Generical Data

Dimensions	12x34x20
------------	----------

Operating Temperature	- 25°C...+ 55°C (Without freeze)
-----------------------	----------------------------------

Mechanical Protection	IP67 & IP69K
-----------------------	--------------

Strada S.Caterina, 235  
41122 Modena (MO)  
Tel. 059 420411  
Fax 059 253973  
E-mail  
[info@datasensing.com](mailto:info@datasensing.com)

02/04/2026  
04:35:38