

Diffuse reflection sensor

O6T-FNKG/AS/4P



- 1: output function switch
2: potentiometer sensitivity



Product characteristics

Type of light	red light
Housing	rectangular

Application

Function principle	Diffuse reflection sensor
--------------------	---------------------------

Electrical data

Operating voltage [V]	10...30 DC
Current consumption [mA]	16; ((24 V))
Protection class	III
Reverse polarity protection	yes
Type of light	red light
Wave length [nm]	633

Outputs

Electrical design	NPN
Output function	light-on/dark-on mode; (selectable)
Max. voltage drop switching output DC [V]	2.5
Permanent current rating of switching output DC [mA]	100
Switching frequency DC [Hz]	1000
Short-circuit protection	yes
Type of short-circuit protection	pulsed

Detection zone

Range [mm]	5...500; (white paper 200 x 200 mm 90% remission)
Setting range [mm]	100...500

O6T307



Diffuse reflection sensor

O6T-FNKG/AS/4P

Range adjustable	yes
Max. light spot diameter [mm]	15
Light spot dimensions refer to	at maximum range

Operating conditions

Ambient temperature [°C]	-25...80
Protection	IP 65; IP 67; IP 68; IP 69K

Tests / approvals

EMC	EN 60947-5-2
MTTF [years]	910
UL approval	UL Approval no. E001

Mechanical data

Weight [g]	35.7
Housing	rectangular
Dimensions [mm]	41.3 x 13 x 21
Materials	housing: stainless steel (316L/1.4404); plastics: PPSU; Sealing: EPDM
Lens material	PMMA
Lens alignment	side lens
Tightening torque [Nm]	1; (screws)

Displays / operating elements

Display	switching status	1 x LED, yellow
	operation	1 x LED, green

Remarks

Remarks	operating voltage "supply class 2" according to cULus
Pack quantity	1 pcs.

Electrical connection

Connector: 1 x M8; coding: A



Diffuse reflection sensor

O6T-FNKG/AS/4P

Connection



Diagrams and graphs

excess gain graph



x: distance [mm]

y: excess gain factor