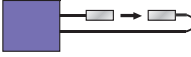
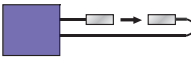
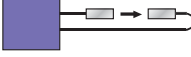
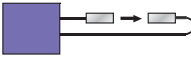


Plastic Fiber Optic Amplifier

Q: FOS2SERIES

	Connection	Sensing Mode (Note)	Output Mode	Part Number
Red Light Source	2m Cable 	 Thru-beam Mode Sensing Distance: 0 to 580mm	NPN L.O./D.O.	FOS2-T0580N-CX6C3U2
			PNP L.O./D.O.	FOS2-T0580P-CX6C3U2
		 Diffuse Mode Sensing Distance: 0 to 100mm	NPN L.O./D.O.	FOS2-D0100N-CX6C3U2
			PNP L.O./D.O.	FOS2-D0100P-CX6C3U2
	Quick Disconnect (Pico-style) 	 Thru-beam Mode Sensing Distance: 0 to 580mm	NPN L.O./D.O.	FOS2-T0580N-CX6Q4UP
			PNP L.O./D.O.	FOS2-T0580P-CX6Q4UP
		 Diffuse Mode Sensing Distance: 0-100mm	NPN L.O./D.O.	FOS2-D0100N-CX6Q4UP
			PNP L.O./D.O.	FOS2-D0100P-CX6Q4UP
Green Light Source (Mark-Sensor Type)	2m Cable 	 Thru-beam Mode (Mark-Sensor Type) Sensing Distance: 0 to 140mm	NPN L.O./D.O.	FOS2-T0140N-CX5C3U2-K
			PNP L.O./D.O.	FOS2-T0140P-CX5C3U2-K
		 Diffuse Mode (Mark-Sensor type) Sensing Distance: 0 to 25mm	NPN L.O./D.O.	FOS2-D0025N-CX5C3U2-K
			PNP L.O./D.O.	FOS2-D0025P-CX5C3U2-K
	Quick Disconnect (Pico-style) 	 Thru-beam Mode (Mark-Sensor Type) Sensing Distance: 0 to 140mm	NPN L.O./D.O.	FOS2-T0140N-CX5Q4UP-K
			PNP L.O./D.O.	FOS2-T0140P-CX5Q4UP-K
		 Diffuse Mode (Mark-Sensor type) Sensing Distance: 0 to 25mm	NPN L.O./D.O.	FOS2-T0025N-CX5Q4UP-K
			PNP L.O./D.O.	FOS2-T0025P-CX5Q4UP-K

Note: Sensing mode & range Depends on fiber optic used (Please see our **Glass Fiber & Plastic Fiber** catalogue).

Coming Soon : Part numbers with underline

In Preparation: Part numbers with a line through the middle

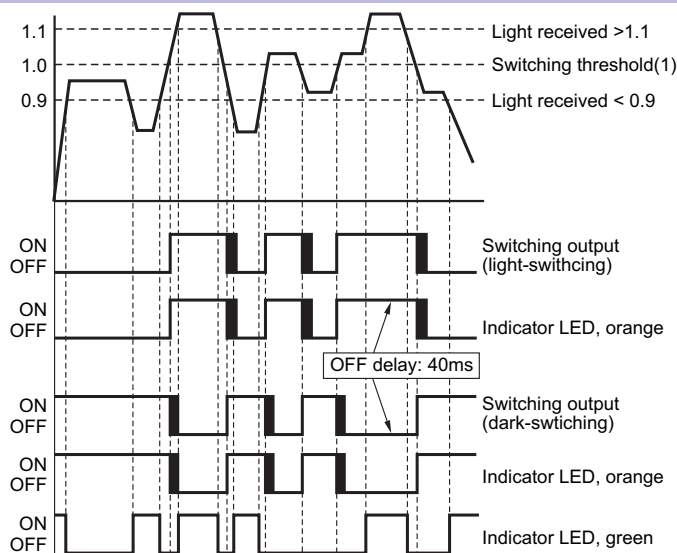
Specifications

Sensing Range	Depends on fiber optics used (please see our Glass Fiber & Plastic Fiber catalogue).
Light Source	Visible red light or visible green light (see each type)
Supply Voltage	10...30V DC
Ripple (within Vs tolerance)	10 %
Current Consumption (no load)	<=50 mA
Output Current Max.	100 mA
Response Time/Frequency	<= 0.5 ms / 1000/s
Time delay (OFF delay)	40ms fix, selectable by sliding switch
Output Type	NPN, PNP
Light Switching	Light-ON / Dark-ON switching selectable via switch
Circuit Protection	Outputs short circuit and over current protected, Vs reverse polarity protected
VDE protection class	III
Enclosure Rating	IP 50
Ambient Operating Temperature	-25...+55°C (Storage temperature:-40...+70°C)
Mounting Bracket	MB-3509
EMC	IEC 60947-5-2, Parts 7.2.6.1. 2. 3 or RFI>3V/m(in 30-1000MHZ), EFT>1KV, ESD>4KV(contact)
Voltage Withstand Ability	IEC 60947-5-2, Part 8.3.3.4 or 1500VAC for one min, between all supply terminals connected together and enclosure
Insulation Resistance	>20M Ω , with 1500V AC megger between all supply terminals connected together and enclosure
Vibration Resistance	IEC 60947-5-2, Part 7.4.2 or 10-55Hz, 1.0mm amplitude in x , y and z directions for 30 min
Shock Resistance	IEC 60947-5-2, Part 7.4.1 or 30g, 11ms in x , y and z directions for six time each
Housing Material	ABS
Connection types	Cable type: 4 dia. 2m PVC, 3x0.2mm ² , Connector type: M8 4-pin plug
Weight	Cable type: approx. 60g, M8 connector type: approx. 20g

Function Diagram (Standard)

Lights up if switching output is active.
Dependent on setting of light/dark selector switch.

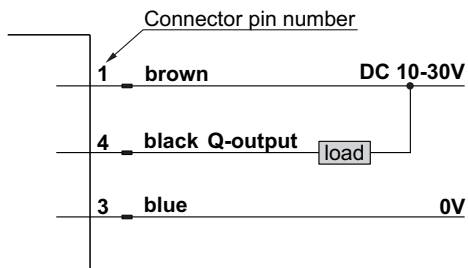
Lights up if light received is < 0.9 or > 1.1
(based on the switching threshold, switching threshold=1)



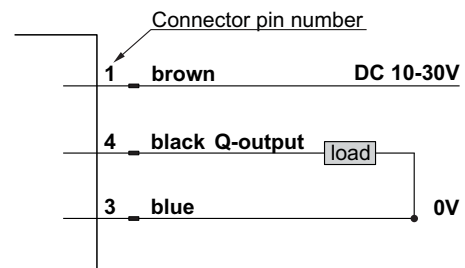
Connection Diagrams & Dimensions (Unit: mm)

Connection Diagrams

NPN Output Type

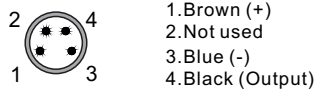


PNP Output Type

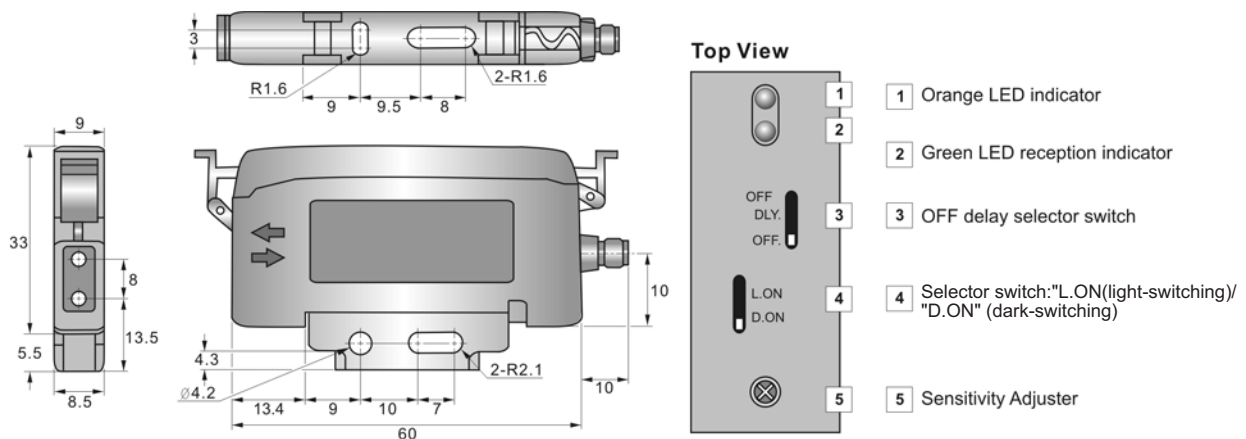


Connector face view

Pico-Style



Sensor's Dimensions



Mounting Bracket's Dimensions

MB-3509 (optional)

