

Rays of hope in the level measurement

Optical infrared sensors from Jacob

with analogue 4-20mA Temperature output signal

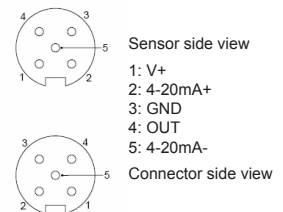


The optical sensor is suitable to use in high pressure application in Tanks, Containers, Vessels, Heating-, Climate- and Cooling Installations, Refrigeration Compressors and Engines also in the Chemical-, Pharmaceutical and Food and Beverage Industry. The Body Material is stainless steel 1.4305 and the sensible Dome consists of glass. The optical sensors convince by its simple installation, reliability, compactness as well as thus that no moving parts are present. The optical sensors work with infrared ray emitter and an optical receiver. In air (liquid not present), all the light is reflected - internally - by the dome and then redirected to the receiver. When the liquid reaches the sensor dome, a big amount of the light emitted are lost in the liquid and the sensor senses its presence. The switching function is alternatively selectable as NC or NO contacts with liquid contact. The delay time for the switching signal can be adjusted over a SPC, or optionally by an integrated timer, ex works preset.

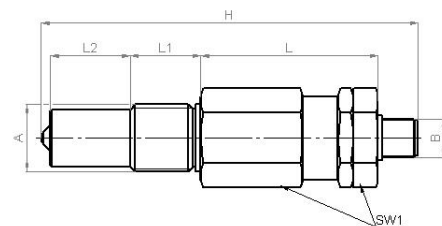
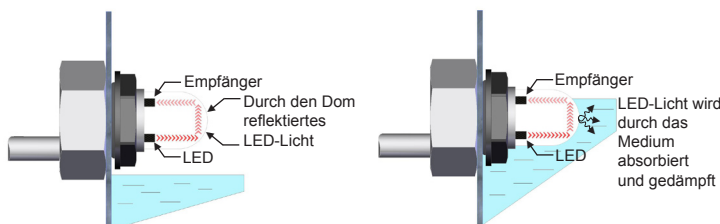
The sensors are additionally equipped with a temperature sensor for the continuous measurement of the temperature at the measuring point. The 4-20mA output signal is according to the fixed temperature range from -40°C (4mA) to 120°C (20mA).

Protection grade: IP 67
 Repeatability: ± 2mm
 Electronic Protections: reverse polarity, output short-circuits.
 Scope of supply: M12, 5-pole Industrial Plug

Body 1.4571 (AISI 316L)
 Dome Glass
 Torque Tighten 15 Nm
 Weight g 200



Type	Process-connection	Function	Output	Temperature output	Power supply	Output current (depending on Temperature range)	PN max.	Temperature range
LO 312	G 1/2"	NO in air	NPN open collector	4-20mA	12-28 VDC	max. 100mA	40 bar	-40°C to +125°C
LO 314	G 1/2"	NC in air	PNP	4-20mA	12-28 VDC	max. 100mA	40 bar	-40°C to +125°C



Typ	A	B	L	L1	L2	SW	H
LO312 / LO314	G 1/2"	M12x1	56	22	25	27	118,5