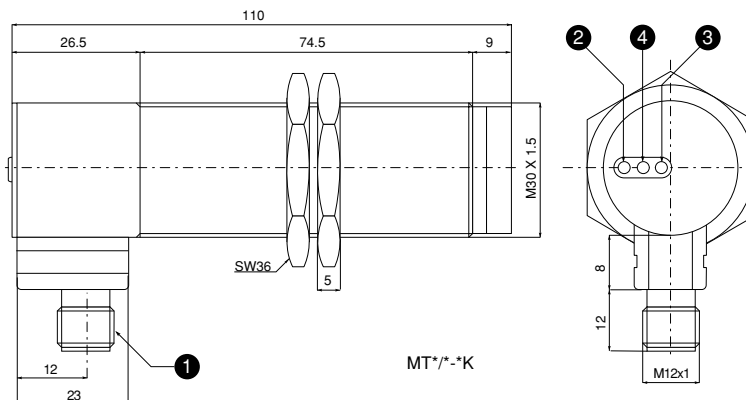


SERIE MT

M30 photoelectric sensors through-beam for high distances - DC

- ◆ M30 high mechanical strenght metal housing
- ◆ High sensing distance (up to 100m)
- ◆ Emitter with check (correct operating verify)
- ◆ 3 LED indicators for easy installation
- ◆ M12 right angle plug exit
- ◆ Alarm output to signal dirty optic, disalignment, insufficient signal
- ◆ IP67 protection degree
- ◆ Complete protection againts electrical damage


DIMENSIONAL DRAWING

Key

- 1 M12 right angle plug cable exit
- 2 Green LED (supply)
- 3 Yellow LED (check emitter)
- 3 Red LED (supply)
- 4 Yellow LED (output state receiver)

Connectors **CD** serie

Accessories **ST** serie

ORDERING SYSTEM

M T X / 0 - 4 K			through-beam
serie			
M30 photoelectric sensor	MT		cable exit
model		K	M12 right angle plug cable exit
emitter with check	X		sensor type
receiver	R		emitter with check
		4	receiver with alarm output
		5	
		0	logic
		N	emitter
		P	NPN output
			PNP output

SPECIFICATIONS		
Model	MTX/0-4K	MTR/*-5K
Type	through-beam	
	emitter with check	receiver
Nominal sensing distance(Sn)	100m	
Emission	infrared (880nm)	
Differential travel	≤10%	
Operating voltage	10 - 30 Vdc	
Ripple	≤10 %	
No-load supply current	50mA	20mA
Check voltage	5 - 30V	-
Check current	3,5mA	-
Check threshold	threshold ON=2,5V - threshold OFF=1,5V	
Load current	-	≤400 mA (output) - 50mA (alarm output)
Leakage current	-	≤ 10μA
Voltage drop	-	1,5V max. (400mA) - 1V (50mA)
Output type	-	NPN or PNP, NO/NC
Response time	ON state=500μs - OFF state=400μs	
Time delay before availability	100 ms	
Supply electrical protections	polarity reversal, transient	
Output electrical protections	-	short circuit (autoreset)
Temperature range	-25°....+70°C (without freeze)	
Temperature drift	10% Sr	
Interference to external light	15000 lux (incandescent lamp), 50000 lux (sunlight)	
Protection degree (DIN 40 050)	IEC IP67	
LED indicators	green (supply), yellow (emission), red (alignment)	green (supply), yellow (output state), red (alignment)
Housing material	nickel-plated brass	
Lenses material	PMMA	
Tightening torque	100Nm	
Weight (approx.)	2x250g	

WIRING DIAGRAMS

emitter with check	MTX/0-4K	NPN output	MTR/N-5K	PNP output	MTR/P-5K
In case of combined load, resistive and capacitive, the maximum admissible capacity C is 0,2μF (0,5μF alarm output), for maximum load voltage and current.					

CONNECTORS

M12 (MTX)
M12 (MTR)

CHARACTERISTIC CURVES

Excess gain	Parallel displacement	Angular displacement	Mutual interference