

Through Beam Sensors

LASER

YO993

Part Number

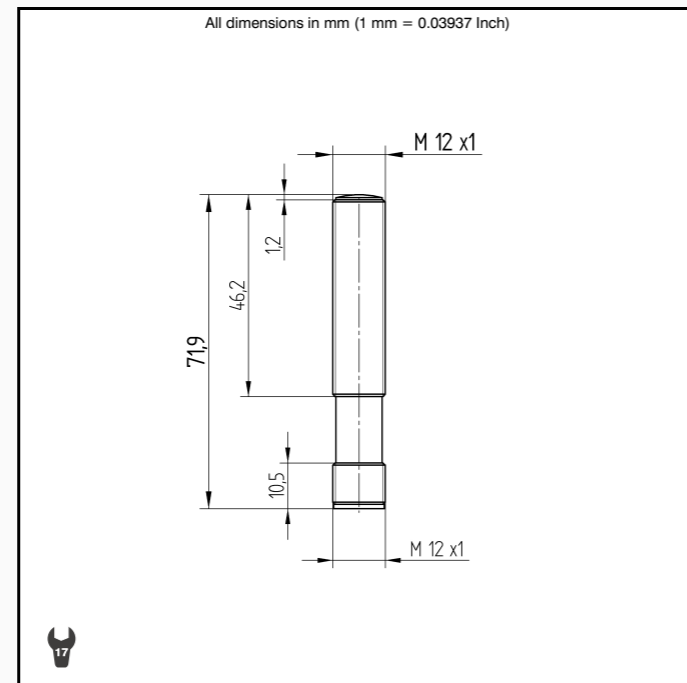
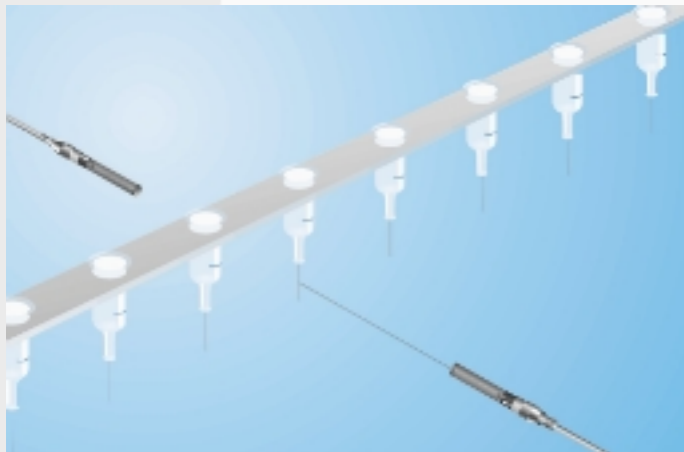


Technical Data

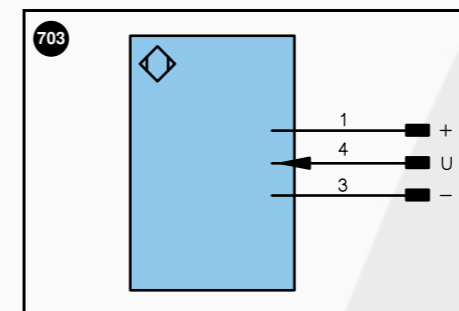
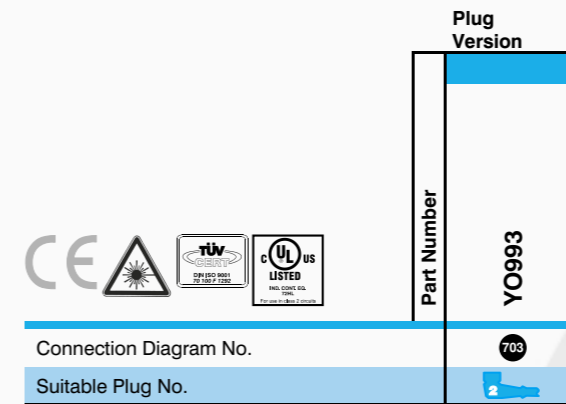
Optical Data	
Range	20000 mm
Smallest Recognizable Part	50 µm
Light Source	Laser (red)
Wave Length	670 nm
Service Life (T = +25°C)	100000 h
Laser Protection Class (EN 60825-1)	2
Beam Divergence	~ 0.5 mrad
Electrical Data	
Sensor Type	Emitter
Supply Voltage	10...30 V DC
Current Consumption (U _b = 24V)	< 20 mA
Temperature Drift	< 10 %
Temperature Range	-10...60 °C
Short Circuit Protection	yes
Reverse Polarity Protection	yes
Overload Protection	yes
Mechanical Data	
Housing	BrasNicPlated
Full Encapsulation	yes
Protection Mode	IP 67
Connection	M 12x1

- Adjustable Focal Point
- Test Input

These through beam sensors are well suited for use in aggressive industrial environments. The sensor can be checked for correct functioning via the test input. Thanks to their large working range, the devices demonstrate excellent functional reliability in highly contaminated environments.



Specifications are subject to change without notice
39/03



Legend			
+	Power supply "+"	U	Test input
-	Power supply "0V"	W	Trigger input
-	Power supply (AC Voltage)	O	Analog output (1,2,3,...)
A	Switching output (1,2,3...)/ NO	O-	Ground for the analog output
A	Switching output (1,2,3...)/ NC	BZ	Block discharge
V	Contamination / Error output (NO)	Aw	Valve output
V	Contamination / Error output (NC)	a	Valve control output "+"
E	Input (analog or digital)	b	Valve control output "0V"
T	Teach input	SY	Synchronization
Z	Time delay (activation)	E+	Receiver-Line
S	Shielding	S+	Emitter-Line
RxD	RS-232 receive path	⊕	Grounding
TxD	RS-232 send path		

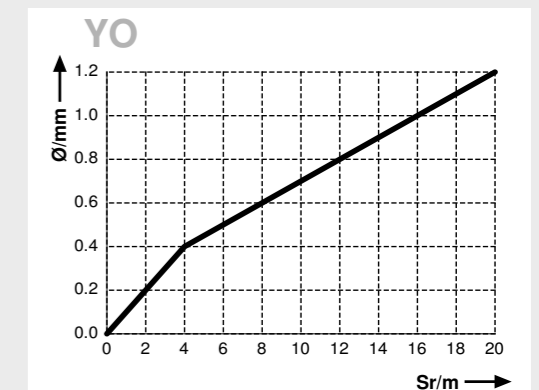
Wire colors according to DIN IEC 757	
BK	black
BN	brown
RD	red
OG	orange
YE	yellow
GN	green
BU	blue
VT	violet
GY	grey
WH	white
PK	pink
GNYE	green yellow

Accessories

- Mounting Clamp BSM12B
- Mounting Bracket W12
- Mounting Bracket W12L
- Additional Lens LA9

Smallest Recognizable Part

Based on the Distance between Emitter and Receiver



Ø = Diameter, Smallest Recognizable Part
Sr = Switching Distance