

SS Stainless Steel

4 Type

EB Non lock-out, with position monitoring

EC Lock-out, with position monitoring

5 Connection type

S Plug

Metric table

Dimensions in: millimeters - inches

1 d ₁ Pin -0.02 Bore H7	2 l ₁	3 d ₂	6 l ₅ Cable length in meters	d ₃	d ₄	k	l ₂	l ₃	l ₄	A/F	Spring load ≈	
											Initial	End
4 0.16	6 0.24	M 8 x 1	0.5	16 0.63	2 0.08	14 0.55	41.5 1.63	16 0.63	11.5 0.45	10 0.39	4 N 0.90 lbf	12.5 N 2.81 lbf
5 0.20	8 0.31	M 10 x 1	0.5	19 0.75	2 0.08	16 0.63	46.5 1.83	18 0.71	12.5 0.49	12 0.47	5 N 1.12 lbf	18 N 4.05 lbf
6 0.24	9 0.35	M 12 x 1.5	0.5	23 0.91	2 0.08	20 0.79	54.5 2.15	22 0.87	12.5 0.49	14 0.55	6 N 1.35 lbf	25 N 5.62 lbf
8 0.31	12 0.47	M 16 x 1.5	0.5	28 1.10	2 0.08	24 0.94	64.5 2.54	26 1.02	14.5 0.57	17 0.67	8.5 N 1.91 lbf	28 N 6.29 lbf
10 0.39	12 0.47	M 16 x 1.5	0.5	28 1.10	2 0.08	24 0.94	64.5 2.54	26 1.02	14.5 0.57	17 0.67	9.5 N 2.14 lbf	38 N 8.54 lbf
12 0.47	15 0.59	M 20 x 1.5	0.5	33 1.30	2 0.08	28.5 1.12	78 3.07	33 1.30	16.5 0.65	22 0.87	11.5 N 2.59 lbf	40 N 8.99 lbf
16 0.63	20 0.79	M 24 x 2	0.5	33 1.30	2 0.08	28.5 1.12	85 3.35	38 1.50	18.5 0.73	27 1.06	13 N 2.92 lbf	54 N 12.14 lbf

Specification

- Threaded body
Stainless steel AISI 303
Plunger pin chemically nickel plated
- Knob
Plastic
Technopolymer (Polyamide PA)
- Black, matte finish
- Not removable
- Magnet
Hard ferrite
- Sensor / sensor clip
Plastic
Technopolymer (Polyamide PA)
Black, matte finish
- Cable (outer sheath)
Polyurethane PUR, black
- Hex nut DIN 439 B / ISO 8675
Stainless steel A2
- IP Protection Classes → page 2130
- Load Rating Information → page 2103
- ISO Fundamental Tolerances → page 2129
- Plastic Characteristics → page XYZ
- Stainless Steel Characteristics → page 2143
- RoHS compliant

Information

GN 817.6 indexing plungers with sensor for position monitoring allow for electronic monitoring of the plunger pin state. For this purpose, a magnet is integrated into the plunger pin that switches the sensor upon engaging after approx. 2/3 of the stroke l₁.

The sensor electronics then outputs a high signal, e.g. to a machine control, and indicates this switch state with an LED on the sensor.

To prevent faults, no external magnetic fields should be acting on the indexing plunger. The GN 817.6 indexing plungers are delivered with enclosed sensor (not installed), sensor clip, Allen® wrench and hex nut.

see also...

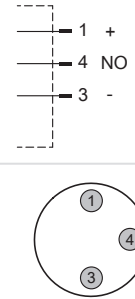
- List of Indexing Plunger Types → page 915
- Indexing Plungers GN 717 / GN 817 (Steel / Stainless Steel) → page 954 / 934
- Cables with Connector Coupling GN 330 → page 1436

How to order

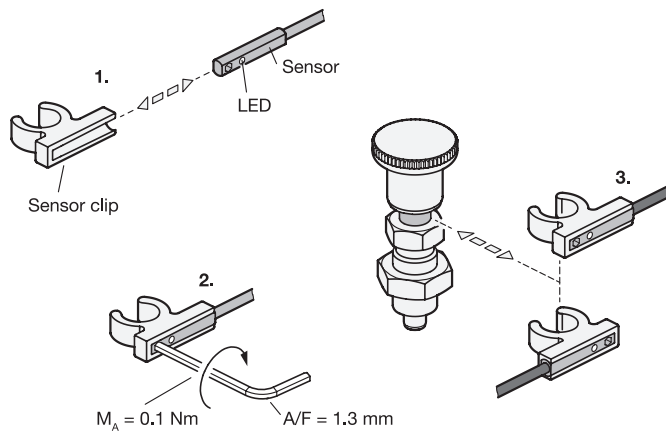
1	Pin diameter d ₁
2	Stroke l ₁
3	Thread d ₂
4	Type
5	Connection type
6	Cable length l ₅

GN817.6-10-12-M16X1.5-EB-S-0.5

Electrical properties of the sensor	
Output function	Normally open (NO)
Switch output	PNP
Supply voltage	10 - 30 V DC
Continuous current I_a	≤ 100 mA
Connection type Plug (S)	3-pole plug M8x1, freely rotating with knurled screw connection, with PUR cable 0.5 m
Protection class	IP 67
Switching frequency	1,000 Hz
Power consumption	≤ 8 mA
Voltage drop	≤ 2.5 V
Protection class	III
Response sensitivity	2.8 mT
Temperature range	-13 °F to +167 °F (-25 °C to +75 °C)
Shock and vibration resistance	30 g, 11 ms / 10 - 55 Hz, 1 mm
EMC	According to EN 60947-5-2
Reverse polarity protection	Yes
Short-circuit protection	Yes
Activation impulse suppression	Yes
Approvals, conformities CE declaration	CE



Assembly instruction



The position of the sensor cable can be freely determined when installing the sensor clip.

Installation steps:

1. Insert the sensor into the sensor clip from the side.
2. Tighten the hex socket screw of the sensor.
3. Clip the sensor clip into the ring slot of the indexing plunger in any orientation and then adjust the direction by turning, if necessary.

