

Proximity sensors SMT/SME-10, for C-slot

FESTO



Proximity sensors SMT/SME

Product range overview

FESTO

Design	Type of mounting	Measuring principle	Type	Operating voltage range	Switching output	Switching element function	➔ Page/Internet
For C-slot	Standard						
	Insertable in slot from above, flush with cylinder profile	Magneto-resistive	SMT-10M	10 ... 30 V DC	PNP	N/O contact	7
					NPN		
					Non-contacting, 2-wire		
		Magnetic reed	SME-10M	5 ... 30 V AC/DC	Contacting, bipolar	N/O contact	12
	Insertable in slot lengthwise	Magneto-resistive	SMT-10G	10 ... 30 V DC	PNP	N/O contact	21
Magnetic reed		SME-10	12 ... 27 V AC/DC	Contacting	N/O contact	18	
For T-slot	Standard						
	Insertable in slot from above, flush with cylinder profile	Magneto-resistive	SMT-8M	10 ... 30 V DC	PNP	N/O contact	t-slot
					N/C contact		
		NPN	N/O contact				
		Magnetic reed	SME-8M		5 ... 30 V AC/DC	Contacting, bipolar	
	N/C contact						
	Insertable in slot lengthwise, flush with cylinder profile	Magneto-resistive	SMT-8	10 ... 30 V DC	PNP	N/O contact	
					NPN		
	Insertable in slot lengthwise, flush with cylinder profile	Magnetic reed	SME-8	12 ... 30 V AC/DC	Contacting, bipolar	N/O contact	
				3 ... 230 V AC/DC		N/C contact	
				5 ... 250 V AC/DC		N/O contact	
	Insertable in slot lengthwise	Magneto-resistive	SMT-8G	10 ... 30 V DC	PNP	N/O contact	
		Magneto-resistive	SMT-8-SL	10 ... 30 V DC	PNP	N/O contact	
		Magnetic reed	SME-8-SL	10 ... 30 V AC/DC	Contacting, bipolar	N/O contact	
	Insertable in slot from above	Magnetic reed	SME-8-FM	10 ... 30 V AC/DC	Contacting, bipolar	N/O contact	
	Via accessories	Magneto-resistive	SMT-8E	10 ... 30 V DC	PNP	N/O contact	
					NPN		
		Magnetic reed	SME-8E	12 ... 30 V DC	Contacting, bipolar	N/O contact	
				3 ... 250 V DC			
				3 ... 230 V AC			
	Corrosion resistant						
	Insertable in slot lengthwise, flush with cylinder profile	Magneto-resistive	CRSMT-8	10 ... 30 V DC	PNP	N/O contact	t-slot
	Welding field immune						
	Via accessories	Magneto-inductive	SMT-8E	10 ... 30 V DC	PNP	N/O contact	t-slot
					NPN		
	Heat resistant up to 120 °C						
	Insertable in slot lengthwise, flush with cylinder profile	Magnetic reed	SME-8-...-S6	0 ... 30 V AC/DC	Contacting, bipolar	N/O contact	t-slot
	Via accessories	Magnetic reed	SME-8E-...-S6	0 ... 30 V DC	Contacting	N/O contact	t-slot
				0 ... 30 V AC			

Proximity sensors SMT/SME

Selection aid

FESTO

Drive		SMT-8, SMT0-8E CRSMT-8 SME-8, SME0-8E SMPO-8E	SMT-10 SME-10	SMT0-4U SME0-4U CRSMEO-4	SMT0-1 SMT0-6 SME0-1 SMPO-1	SMT-C1
Standards-based cylinders						
Standard cylinders DSNU, ESNU	Ø 8 ... 25 mm	■	■	■	■	–
Standard cylinders DSN, ESN	Ø 8 ... 25 mm	■	■	■	■	–
Standard cylinders DNCB		■	–	–	–	–
Standard cylinders DNC		■	–	–	–	–
Standard cylinders DNG		■	–	–	■	–
Standard cylinders CDN-...-R with sensor rail		–	–	–	–	■
Standard cylinders ADN		■	–	–	–	–
Cylinders with piston rod						
Compact cylinders ADVU, AEVU		■	–	–	–	–
Short-stroke cylinders ADVC, AEVC	Ø 6 ... 25 mm	–	■	–	–	–
	Ø 32 ... 100 mm	■	–	–	–	–
Flat cylinders EZH-10/40-40-A-B		■	–	–	–	–
Flat cylinders DZF		■	–	–	–	–
Flat cylinders DZH	Ø 16 ... 25 mm	■	–	–	–	–
	Ø 32 ... 63 mm	–	–	–	■	–
Round cylinders DSNU, ESNU	Ø 32 ... 63 mm	■	■	■	■	–
Round cylinders DSW, ESW		■	■	■	■	–
Round cylinders DSEU, ESEU		■	■	■	■	–
Multimount cylinders DMM, EMM		■	–	–	–	–
Round cylinders CRDG		–	–	■	–	–
Round cylinders CRDSW		■	■	■	■	–
Standard cylinders CRHD		■	–	–	–	–
Standard cylinders CRDSNU		■	–	■	–	–
Standard cylinders CRDNG		■	–	■	–	–
Standard cylinders CRDNGS		■	–	■	–	–
Rodless cylinders						
Linear drives DGC	Ø 8, 12 mm	–	■	–	–	–
	Ø 18 ... 63 mm	■	–	–	–	–
Linear drives DGP, DGPL		■	–	–	–	–
Linear drives SLG		–	■	–	–	–
Linear drives DGO		–	–	■	–	–
Linear drives SLM		■	–	–	–	–
Semi-rotary drives						
Semi-rotary drives DSM	Ø 6 ... 10 mm	–	■	–	–	–
Semi-rotary drives DSM-B	Ø 12 ... 40 mm	–	■	–	–	–
	Ø 63 mm	■	–	–	–	–
Semi-rotary drives DRQ	Ø 16 ... 32 mm	■	–	–	–	–
	Ø 40 ... 100 mm	–	–	–	■	–
Semi-rotary drives DRQD	Ø 6 ... 12 mm	–	■	–	–	–
	Ø 16 ... 32 mm	■	–	–	–	–
Technical data → Page/Internet		t-slot	7	smt0, crsmeo	smt0	smt-c1

Proximity sensors SMT/SME

Selection aid

FESTO

Drive		SMT-8, SMT0-8E CRSMT-8 SME-8, SME0-8E, SMPO-8E	SMT-10 SME-10	SMH-S1
Function-oriented drives				
Stopper cylinders STA, STAF		■	–	–
Linear/swivel clamps CLR		■	–	–
Swivel/linear units DSL		■	–	–
Swivel/linear units DSL-B		–	■	–
Drives with linear guide				
Mini slides SLS, SLF, SLT		–	■	–
Mini slides DGSL		–	■	–
Twin-piston cylinders SPZ		■	–	–
Slide units SLZ		■	–	–
Guided drives DFP	Ø 6 ... 16 mm	–	■	–
	Ø 25 ... 80 mm	■	–	–
Mini guide units DFC		–	■	–
Guide units DFM		■	–	–
Guide units DFM-B		■ ¹⁾	–	–
Linear drive units SLE	Ø 32 ... 50 mm	■	–	–
Twin-piston cylinders DPZ		■	–	–
Handling units				
Linear modules HMP		■	–	–
Linear modules HMPL		■	–	–
Handling modules HSP, HSW		■	–	–
Feed separators HPV		■	–	–
Three-point grippers HGD	Ø 16 mm	–	–	■
	Ø 32, 50 mm	■ ²⁾	–	–
Three-point grippers HGDT		–	■	–
Parallel grippers HGP	Ø 6 mm	–	–	■
	Ø 10 ... 35 mm	■ ²⁾	–	–
Parallel grippers HGPC		–	■	–
Parallel grippers HGPP	Ø 12 ... 32 mm	–	–	■
Parallel grippers HGPT	Ø 16 ... 63 mm	–	■	–
Angle grippers HGW	Ø 10 mm	–	–	■
	Ø 16 ... 40 mm	■	–	–
Radial grippers HGR	Ø 10 mm	–	–	■
	Ø 16 ... 40 mm	■	–	–
Swivel gripper units HGDS		–	■	–
Cushioning components				
Stop elements YSRWJ		■	–	–
Electrical positioning systems				
Toothed belt axes DGE-ZR		■	–	–
Spindle axes DGE-SP		■	–	–
System components				
Heavy-duty guides HD		■	–	–
Valve actuators				
Linear actuators, Copac DLP-A		■	–	–
Technical data → Page/Internet				
	t-slot	7	smh	

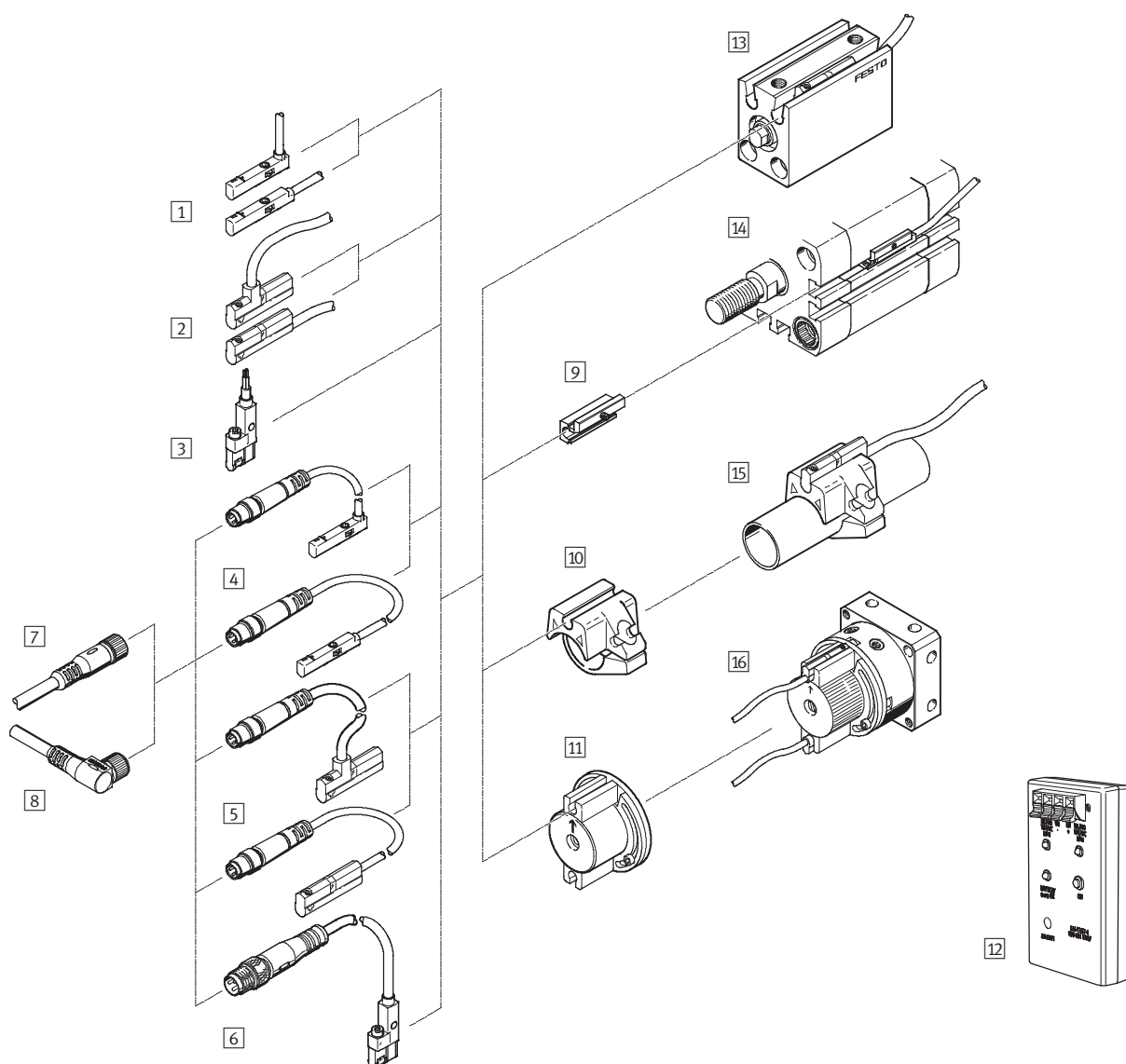
1) Not SM...O-8E.

2) SME-8M only for HGD-50, HGP-20 ... 35.

Proximity sensors SMT/SME-10, for C-slot

Overview of peripherals

FESTO



Mounting attachments and accessories	→ Page/ Internet
Proximity sensors	
1 SMT/SME-10M-...-OE, with cable	7
2 SME-10, with cable	18
3 SMT-10G-...-OE, with cable	22
4 SMT/SME-10M-...-M..., with cable and plug	7
5 SME-10, with cable and plug	18
6 SMT-10G-...-M..., with cable and plug	22
Connecting cables	
7 Connecting cable NEBU-M...G...	25
8 Connecting cable NEBU-M...W...	25
Mounting kits	
9 Mounting kit SMBN-10	24
10 Mounting kit SMBR-10-...	24
11 Mounting kit WSM-...-SME-10	25

Mounting attachments and accessories	→ Page/ Internet
Accessories	
12 Sensor tester SM-TEST-1	25
- Positioning component SMM-10	25
- Clip SMBK-10	25
- Inscription label ASLR	25
- Safety clip NEAU	25
Drives	
13 Drives with C-slot	-
14 Drives with T-slot	-
15 Round cylinder	-
16 Semi-rotary drive DSM	-

Proximity sensors SMT/SME-10M, for C-slot

Type codes

FESTO

SMT/SME-10M

		SMT	–	10M	–	PS	–	24V	–	E	–	2,5	–	L	–		–	OE
Function																		
SMT	Proximity sensor, magneto-resistive																	
SME	Proximity sensor, magnetic reed																	
Design																		
10M	For C-slot, insertable in slot from above																	
Switching output, switching element function																		
PS	PNP, N/O contact, 3-wire																	
NS	NPN, N/O contact, 3-wire																	
ZS	N/O contact, 2-wire																	
DS	N/O contact, 3-wire																	
Rated operating voltage																		
24V	24 V DC																	
Cable attribute																		
E	Energy chain + robot applications																	
Cable length [m]																		
Cable outlet																		
L	In-line																	
Q	Lateral																	
Cable designation																		
–	With inscription label holder																	
N	Without inscription label holder																	
Connection technology																		
OE	Open end																	
M8	Cable with plug M8x1, snap-on flange																	
M8D	Cable with plug M8x1, rotatable thread																	
M12	Cable with plug M12x1, rotatable thread																	

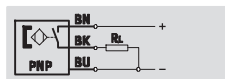
Proximity sensors SMT-10M, for C-slot

FESTO

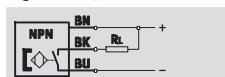
Technical data – Magneto-resistive

Function

E.g. PNP, N/O contact, with cable



E.g. NPN, N/O contact, with cable



- Magneto-resistive measuring principle
- Insertable in slot from above, does not protrude over the cylinder profile
- Cable clip and holder for inscription labels included in the scope of delivery



General technical data	
Design	For C-slot
Conforms to	EN 60947-5-2
Certification	C-Tick
CE mark (see declaration of conformity)	To EU EMC Directive ¹⁾
Note on materials	Cable resistant to oil
	Cable free of halogen
	Free of copper and PTFE
	RoHS-compliant

1) For information about the applicability of the component see the manufacturer's EC declaration of conformity at: www.festo.com → Support → User documentation.
If the component is subject to restrictions on usage in residential, office or commercial environments or small businesses, further measures to reduce the emitted interference may be necessary.

Input signal/measuring element	
Measured variable	Position
Measuring principle	Magneto-resistive
Ambient temperature [°C]	-20 ... +70

Switching output			
Type SMT-10M	PS	NS	ZS
Switching output	PNP	NPN	Non-contacting, 2-wire
Switching element function	N/O contact		
Repetition accuracy of switching output in ± mm	0.1		
Switch-on time [ms]	0 ... 1		
Switch-off time [ms]	0 ... 1		
Max. switching frequency [Hz]	150		
Max. output current [mA]	100		
Max. output current in mounting kits [mA]	50		
Max. switching capacity DC [W]	3	3	2.4
Max. switching capacity DC in mounting kits [W]	1.5		1.2
Voltage drop [V]	0 ... 1.7	0 ... 1.5	0 ... 6

Output, additional data	
Protection against short circuit	Pulsed
Protection against overloading	Yes

Electronic components	
Rated operating voltage [V DC]	24
Operating voltage range [V DC]	10 ... 30
Reverse polarity protection	For all electrical connections

Proximity sensors SMT-10M, for C-slot

Technical data – Magneto-resistive

FESTO

Electromechanical components								
Type SMT-10M	PS/NS				ZS			
Electrical connection	OE	M8D	M8	M12	OE	M8D	M8	M12
Electrical connection	Cable, 3-wire	Cable with plug, 3-pin			Cable, 2-wire	Cable with plug, 2-pin		
		M8x1	M8x1	M12x1		M8x1	M8x1	M12x1
		Rotatable thread	Snap-on flange	Rotatable thread		Rotatable thread	Snap-on flange	Rotatable thread
Connection direction	In-line							
	Lateral							
Cable test conditions	Energy chain: 5 million cycles, bending radius 28 mm							
	Torsional strength: >300,000 cycles, ±270°/0.1 m							
	Resistance to bending: to Festo standard; test conditions on request							
Cable length	[m]	0.2 ... 30						
Cable attribute		Energy chain + robot applications						
Cable sheath materials		TPE-U(PU)						

Mechanical components	
Type of mounting	Screw-clamped in slot, insertable from above
Max. tightening torque [Nm]	0.4
Mounting position	Any
Housing	PA reinforced
	High-alloy stainless steel

Display/operation	
Switching status display	Yellow LED

Immissions/emissions	
Ambient temperature with flexible cable installation [°C]	–20 ... +70
Protection class	IP65
	IP68

Pin allocation to EN 60947-5-2			
M8x1, 2-pin			
N/O contact			
	Pin	Wire colour	Allocation
	1	Brown	+
	4	Black	Output

M8x1, 3-pin			
N/O contact			
	Pin	Wire colour	Allocation
	1	Brown	+
	3	Blue	–
	4	Black	Output

Pin allocation to EN 60947-5-2			
M12x1, 2-pin			
N/O contact			
	Pin	Wire colour	Allocation
	1	Brown	+
	4	Black	Output

M12x1, 3-pin			
N/O contact			
	Pin	Wire colour	Allocation
	1	Brown	+
	3	Blue	–
	4	Black	Output

Proximity sensors SMT-10M, for C-slot

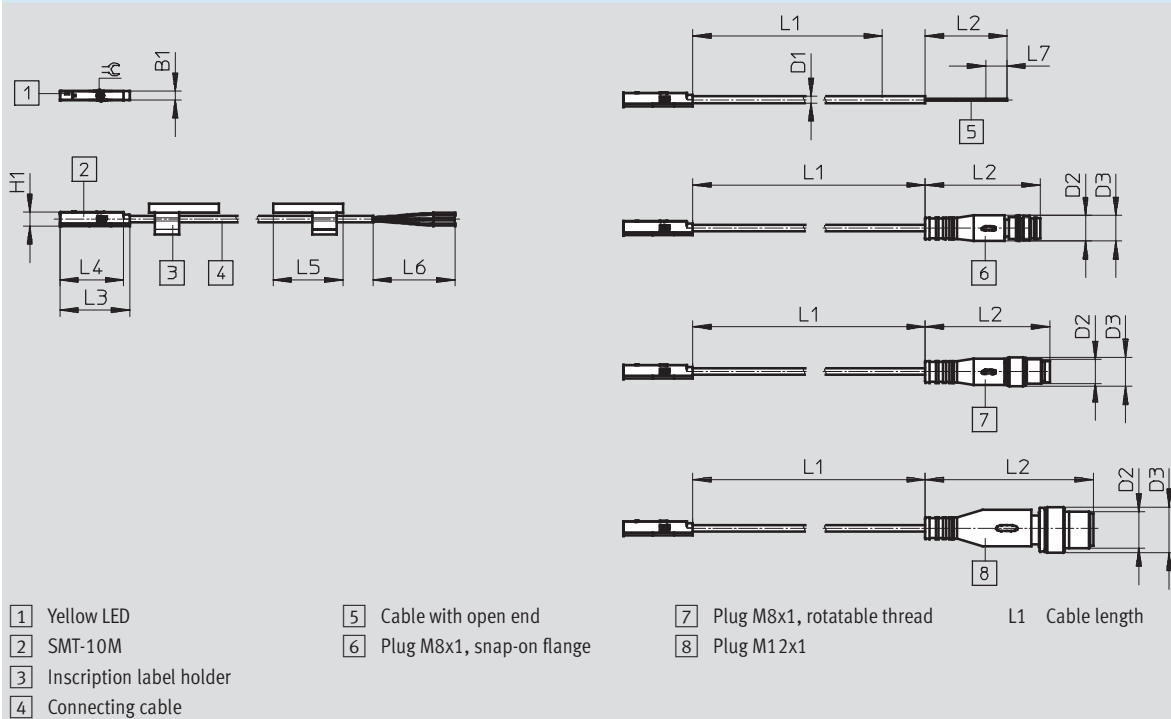
Technical data – Magneto-resistive

FESTO

Dimensions

Download CAD Data → www.festo.com/us/cad

SMT-10M-...-L, in-line connection



Type	B1	D1	D2	D3	H1	L2	L3	L4	L5	L6	L7	≅
SMT-10M-...-OE	2.9	2.15	–	–	4.6	50	22.9	20.9	23	50	7	1.5
SMT-10M-...-M8D			M8x1	8.5		32.7					–	
SMT-10M-...-M8			M8x1	9.6		41.1					–	
SMT-10M-...-M12			M12x1	15		55.5					–	

Proximity sensors SMT-10M, for C-slot

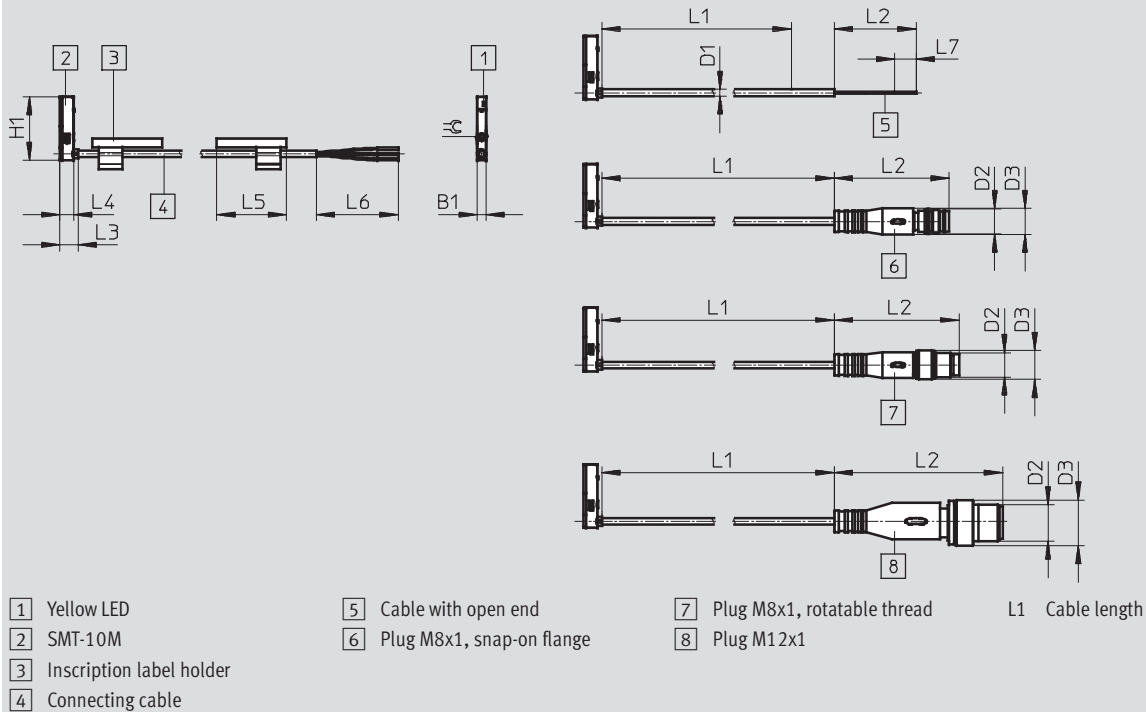
Technical data – Magneto-resistive

FESTO

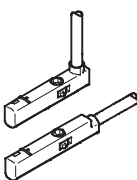
Dimensions

Download CAD Data → www.festo.com/us/cad

SMT-10M-...-Q, lateral connection



Type	B1	D1	D2	D3	H1	L2	L3	L4	L5	L6	L7	⌀
SMT-10M-...-OE	2.9	2.15	–	–	20.9	50	6	4.6	23	50	7	1.5
SMT-10M-...-M8D			M8x1	8.5		32.7					–	
SMT-10M-...-M8			M8x1	9.6		41.1					–	
SMT-10M-...-M12			M12x1	15		55.5					–	

Ordering data							
	Switching output	Electrical connection		Cable length [m]	Weight [g]	Part No.	Type
		Cable	Cable with plug, rotatable thread				
	N/O contact						
	PNP	3-wire	–	2.5	16.8	551373	SMT-10M-PS-24V-E-2,5-L-OE
						551374	SMT-10M-PS-24V-E-2,5-Q-OE
		–	M8x1, 3-pin	0.3	6.7	551375	SMT-10M-PS-24V-E-0,3-L-M8D
						551376	SMT-10M-PS-24V-E-0,3-Q-M8D
	NPN	3-wire	–	2.5	16.8	551377	SMT-10M-NS-24V-E-2,5-L-OE
						551378	SMT-10M-NS-24V-E-2,5-Q-OE
		–	M8x1, 3-pin	0.3	6.7	551379	SMT-10M-NS-24V-E-0,3-L-M8D
						551380	SMT-10M-NS-24V-E-0,3-Q-M8D
	Non-contacting, 2-wire	2-wire	–	2.5	14.6	551382	SMT-10M-ZS-24V-E-2,5-L-OE
					551383	SMT-10M-ZS-24V-E-2,5-Q-OE	

Proximity sensors SMT-10M, for C-slot

FESTO

Modular product system – Magneto-resistive

M Mandatory data							O Options	M
Module No.	Function	Switching output	Rated operating voltage	Cable attribute	Cable length in m	Cable outlet	Cable designation	Connection technology
551372	SMT-10M	PS NS ZS	24V	E	0.2 ... 30	L Q	N	OE M8D M8 M12
Ordering example								
551372	SMT-10M	NS	24V	E	3	L	N	M8D

Ordering table					
Size	10				Enter code
M Module No.	551372				
Function	Proximity sensor for C-slot, non-contacting				SMT-10M
Switching output	3-wire PNP N/O contact				PS
	3-wire NPN N/O contact				NS
	2-wire N/O contact				ZS
					–
Rated operating voltage [V DC]	24				24V
Cable attribute	Energy chain + robot applications				E
					–
Cable length [m]	0.2 ... 30 (0.2 ... 5.0 m in 0.1 m increments, 5.0 ... 30 m in 0.5 m increments)				...
Cable outlet	In-line				L
	Lateral				Q
					–
O Cable designation	With inscription label holder				–
	Without inscription label holder				N
M Connection technology					–
	Open end				OE
	M8, rotatable thread				M8D
	M8, snap-on flange				M8
	M12, rotatable thread				M12

Transfer order code

551372 SMT-10M – 24V – E – – – – –

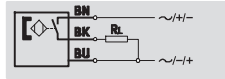
Proximity sensors SME-10M, for C-slot

Technical data – Magnetic reed

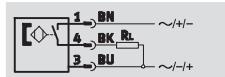
FESTO

Function

E.g. N/O contact, 3-wire, with cable



E.g. N/O contact, 3-wire, with plug



- Magnetic reed measuring principle
- Insertable in slot from above, does not protrude over the cylinder profile
- Cable clip and holder for inscription labels included in the scope of delivery



General technical data	
Design	For C-slot
Conforms to	EN 60947-5-2
Certification	C-Tick
CE mark (see declaration of conformity)	To EU EMC Directive ¹⁾
Note on materials	Cable resistant to oil
	Cable free of halogen
	Free of copper and PTFE
	RoHS-compliant

- 1) For information about the applicability of the component see the manufacturer's EC declaration of conformity at: www.festo.com → Support → User documentation.
If the component is subject to restrictions on usage in residential, office or commercial environments or small businesses, further measures to reduce the emitted interference may be necessary.

Input signal/measuring element	
Measured variable	Position
Measuring principle	Magnetic reed
Ambient temperature [°C]	−40 ... +70

Switching output		
Type SME-10M	DS	ZS
Switching output	Contacting, bipolar	
Switching element function	N/O contact	
Repetition accuracy of switching output in ± mm	0.1	
Switch-on time [ms]	0 ... 1.2	
Switch-off time [ms]	0 ... 1	
Max. switching frequency [Hz]	50	
Max. output current [mA]	300	100
Max. output current in mounting kits [mA]	50	50
Max. switching capacity AC [VA]	9	3
Max. switching capacity AC in mounting kits [VA]	1.5	1.5
Max. switching capacity DC [W]	9	3
Max. switching capacity DC in mounting kits [W]	1.5	1.5
Voltage drop [V]	0 ... 0.5	0 ... 4.5

Output, additional data	
Protection against short circuit	No
Protection against overloading	No

Proximity sensors SME-10M, for C-slot

FESTO

Technical data – Magnetic reed

Electronic components		
Rated operating voltage	[V DC]	24
Operating voltage range AC	[V]	5 ... 30
Operating voltage range DC	[V]	5 ... 30
Reverse polarity protection		No

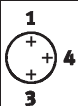
Electromechanical components								
Type SME-10M	DS				ZS			
Electrical connection	OE	M8D	M8	M12	OE	M8D	M8	M12
Electrical connection	Cable, 3-wire	Cable with plug, 3-pin			Cable, 2-wire	Cable with plug, 2-pin		
		M8x1	M8x1	M12x1		M8x1	M8x1	M12x1
		Rotatable thread	Snap-on flange	Rotatable thread		Rotatable thread	Snap-on flange	Rotatable thread
Connection direction	In-line							
	Lateral							
Cable test conditions	Energy chain: 5 million cycles, bending radius 28 mm							
	Torsional strength: >300,000 cycles, ±270°/0.1 m							
	Resistance to bending: to Festo standard; test conditions on request							
Cable length	[m]	0.2 ... 10						
Cable attribute	Energy chain + robot applications							
Cable sheath materials	TPE-U(PU)							

Mechanical components	
Type of mounting	Screw-clamped in slot, insertable from above
Max. tightening torque	0.4
Mounting position	Any
Housing	PA reinforced
	High-alloy stainless steel

Display/operation	
Switching status display	Yellow LED

Immissions/emissions	
Ambient temperature with flexible cable installation	[°C] –20 ... +70
Protection class	IP65
	IP68

Pin allocation to EN 60947-5-2			
M8x1, 2-pin			
N/O contact			
	Pin	Wire colour	Allocation
	1	Brown	+
	4	Black	Output

M8x1, 3-pin			
N/O contact			
	Pin	Wire colour	Allocation
	1	Brown	+
	3	Blue	–
	4	Black	Output

Pin allocation to EN 60947-5-2			
M12x1, 2-pin			
N/O contact			
	Pin	Wire colour	Allocation
	1	Brown	+
	4	Black	Output

M12x1, 3-pin			
N/O contact			
	Pin	Wire colour	Allocation
	1	Brown	+
	3	Blue	–
	4	Black	Output

Proximity sensors SME-10M, for C-slot

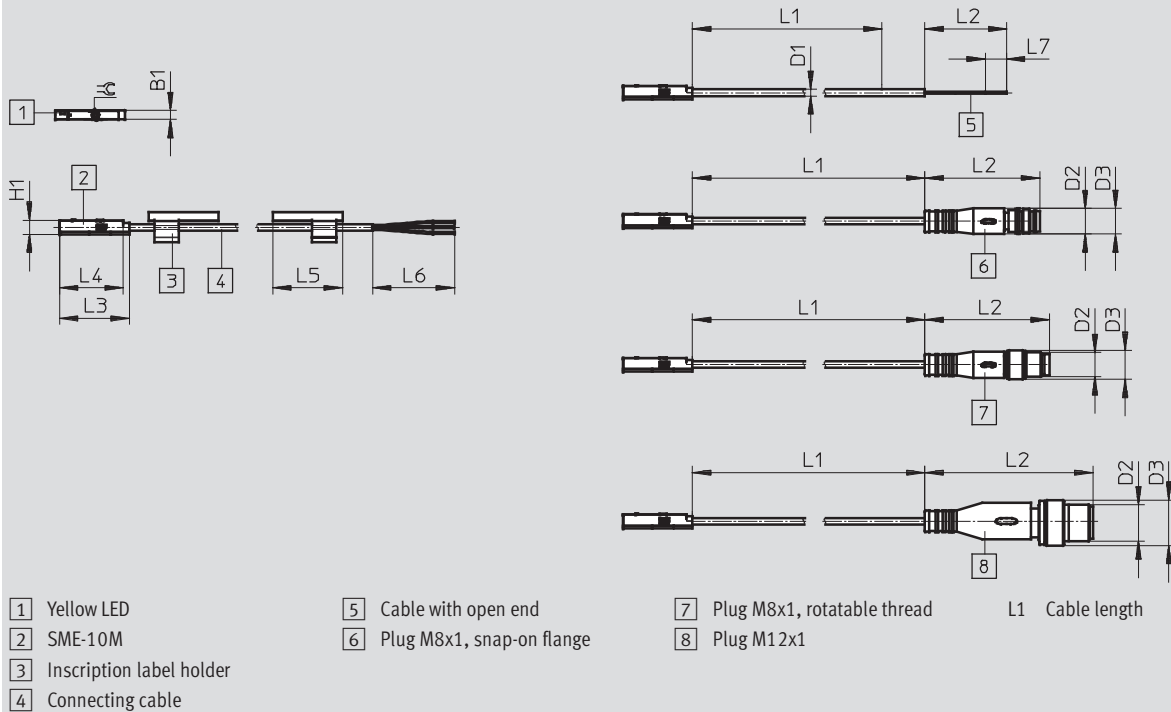
Technical data – Magnetic reed

FESTO

Dimensions

Download CAD Data → www.festo.com/us/cad

SME-10M-...-L, in-line connection



Type	B1	D1	D2	D3	H1	L2	L3	L4	L5	L6	L7	≡
SME-10M-...-OE	3	2.15	–	–	4.6	50	26.6	24.6	23	50	7	1.5
SME-10M-...-M8D			M8x1	8.5		32.7					–	
SME-10M-...-M8			M8x1	9.6		41.1					–	
SME-10M-...-M12			M12x1	15		55.5					–	

Proximity sensors SME-10M, for C-slot

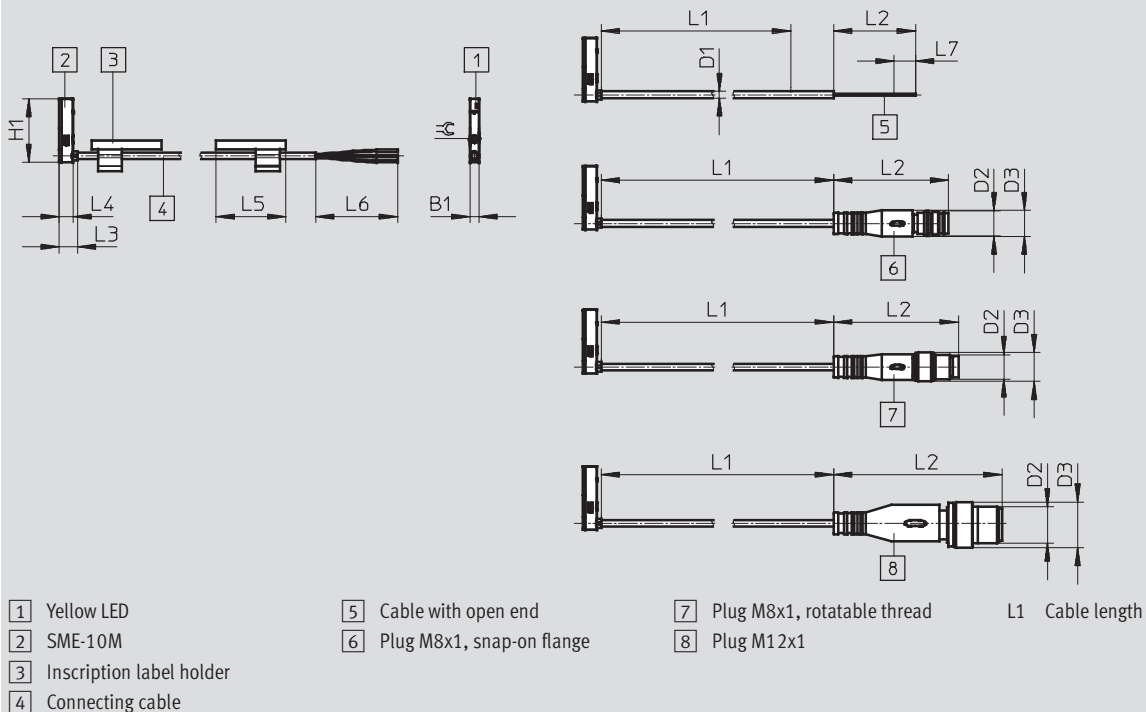
Technical data – Magnetic reed

FESTO

Dimensions

Download CAD Data → www.festo.com/us/cad

SME-10M-...-Q, lateral connection



Type	B1	D1	D2	D3	H1	L2	L3	L4	L5	L6	L7	≡
SME-10M-...-OE	3	2.15	–	–	24.6	50	6	4.6	23	50	7	1.5
SME-10M-...-M8D			M8x1	8.5		32.7					–	
SME-10M-...-M8			M8x1	9.6		41.1					–	
SME-10M-...-M12			M12x1	15		55.5					–	

Ordering data

Drawing data	Switching output	Electrical connection		Cable length [m]	Weight [g]	Part No.	Type
		Cable	Cable with plug, rotatable thread				
	N/O contact						
	Contacting, bipolar	3-wire	–	2.5	16.8	551365	SME-10M-DS-24V-E-2,5-L-OE
						551366	SME-10M-DS-24V-E-2,5-Q-OE
		–	M8x1, 3-pin	0.3	6.7	551367	SME-10M-DS-24V-E-0,3-L-M8D
						551368	SME-10M-DS-24V-E-0,3-Q-M8D
		2-wire	–	2.5	14.6	551369	SME-10M-ZS-24V-E-2,5-L-OE
						551370	SME-10M-ZS-24V-E-2,5-Q-OE

Proximity sensors SME-10M, for C-slot

Modular products – Magnetic reed

FESTO

M Mandatory data							O Options	M
Module No.	Function	Switching output	Rated operating voltage	Cable attribute	Cable length in m	Cable outlet	Cable designation	Connection technology
551364	SME-10M	DS ZS	24V	E	0.2 ... 10	L Q	N	OE M8D M8 M12
Ordering example								
551364	SME-10M	- DS	- 24V	- E	- 3	- L	- N	- M8D

Ordering table					
Size	10	Conditions	Code		Enter code
M Module No.	551364				
Function	Proximity sensor for C-slot, contacting		SME-10M		SME-10M
			-		-
Switching output	3-wire N/O contact		DS		
Switching output	2-wire N/O contact		ZS		
			-		-
Rated operating voltage [V DC]	24		24V		24V
			-		-
Cable attribute	Energy chain + robot applications		E		E
			-		-
Cable length [m]	0.2 ... 10 (0.2 ... 5.0 m in 0.1 m increments, 5.0 ... 10 m in 0.5 m increments)		...		
			-		-
Cable outlet	In-line		L		
	Lateral		Q		
			-		-
O Cable designation	With inscription label holder		-		
	Without inscription label holder		N		
M			-		-
Connection technology	Open end		OE		
	M8, rotatable thread		M8D		
	M8, snap-on flange		M8		
	M12, rotatable thread		M12		

Transfer order code

551364	SME-10M	-		-	24V	-	E	-		-		-		-	
--------	---------	---	--	---	-----	---	---	---	--	---	--	---	--	---	--

Proximity sensors SME-10, for C-slot

FESTO

Type codes

SME-10

		SME	–	10	–	KL	–	LED	–	24
Function										
SME	Proximity sensor, magnetic reed									
Design										
10	For C-slot, insertable in slot lengthwise									
Electrical connection, cable length, connection direction										
KL	Cable, 2.5 m, in-line									
KQ	Cable, 2.5 m, lateral									
SL	Plug M8x1 with cable, 0.3 m, in-line									
SQ	Plug M8x1 with cable, 0.3 m, lateral									
Switching status display										
LED	Yellow LED									
Rated operating voltage										
24	24 V DC									

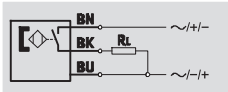
Proximity sensors SME-10, for C-slot

Technical data – Magnetic reed

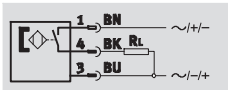
FESTO

Function

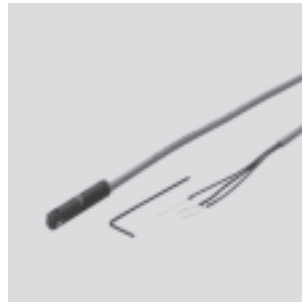
NO contact, 3-wire, with cable



N/O contact, 3-wire, with plug



- Magneto-resistive measuring principle
- Insertable in the slot lengthwise



General technical data	
Design	For C-slot
Based on standard	EN 60947-5-2
CE mark (see declaration of conformity)	To EU EMC Directive
Note on materials	Free of copper and PTFE

Input signal/measuring element	
Measuring principle	Magnetic reed
Ambient temperature [°C]	–20 ... +70

Switching output	
Switching output	Contacting, bipolar
Switching element function	N/O contact
Reproducibility of switching value [mm]	±0.1
Switch-on time [ms]	≤0.6
Switch-off time [ms]	≤0.05
Max. output current [mA]	100
Max. switching frequency [Hz]	500
Max. switching capacity DC [W]	1
Voltage drop [V]	0

Output, additional data	
Protection against short circuit	No
Protection against overloading	No

Electronic components	
Operating voltage range DC [V]	12 ... 27
Operating voltage range AC [V]	12 ... 27
Reverse polarity protection	No

Electromechanical components		
Type	SME-10-...-K...-...	SME-10-...-S...-...
Electrical connection	Cable, 3-wire	Cable with plug M8x1, 3-pin
Connection direction	In-line, lateral	In-line, lateral
Cable length [m]	2.5	0.3
Information on cable sheath materials	PUR	

Proximity sensors SME-10, for C-slot

FESTO

Technical data – Magnetic reed

Mechanical components			
Type	SME-10-...-K...-...		SME-10-...-S...-...
Type of mounting	Clamped in C-slot, insertable in the slot lengthwise		
Tightening torque	[Nm]	0.18	
Information on housing materials	PPS, high-alloy stainless steel		PPS, TPE-U(PU), high-alloy stainless steel, nickel-plated brass

Display/operation	
Switching status display	Yellow LED

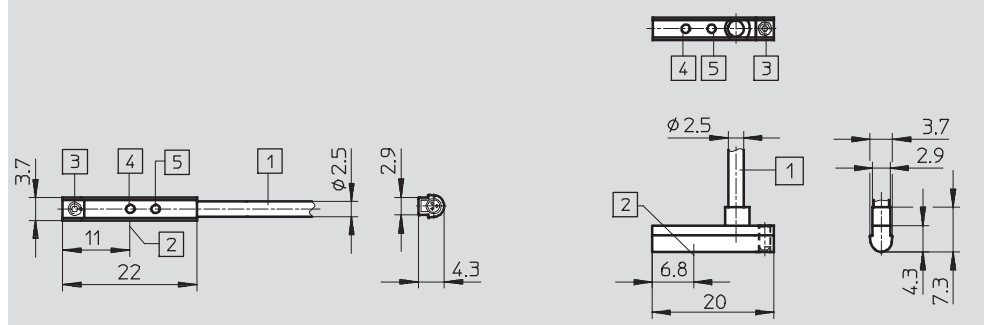
Immissions/emissions		
Ambient temperature with flexible cable installation	[°C]	–5 ... +70
Protection class		IP65
		IP67
Insulation voltage	[V]	50
Surge capacity	[kV]	0.8
Degree of contamination		3

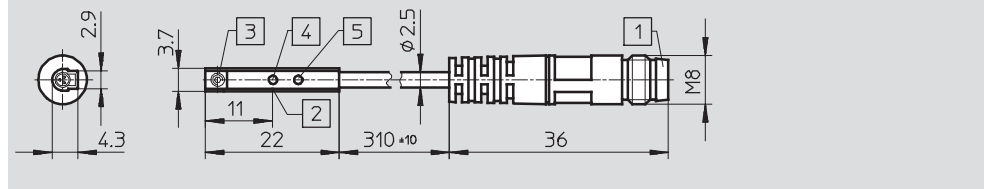
Pin allocation to EN 60947-5-2			
Plug, 3-pin			
M8x1	Pin	Wire colour	Allocation
	1	Brown	+
	3	Blue	–
	4	Black	Output

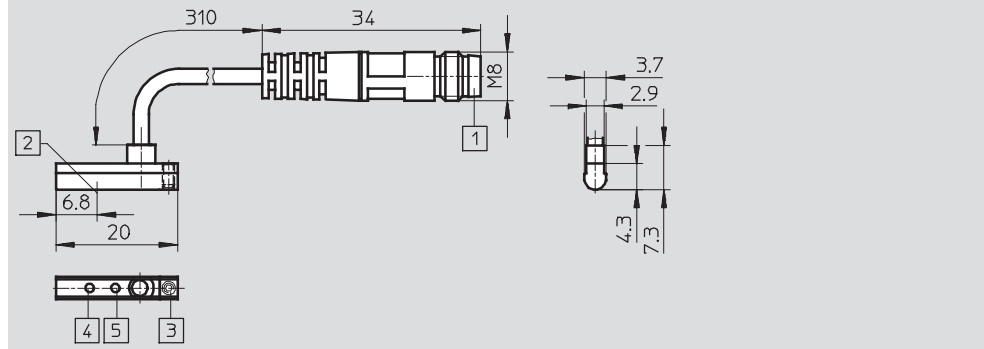
Proximity sensors SME-10, for C-slot

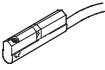
Technical data – Magnetic reed

FESTO

Dimensions		Download CAD Data → www.festo.com/us/cad
Cable, in-line connection	Cable, lateral connection	
		
		1 Connecting cable 2 Theoretical switching point 3 Threaded pin M2x4 4 Yellow LED (positive switching) 5 Yellow LED (negative switching)

Plug M8x1, in-line connection		
		
		1 Plug to fit connecting cable NEBU-M8 2 Theoretical switching point 3 Threaded pin M2x4 4 Yellow LED (positive switching) 5 Yellow LED (negative switching)

Plug M8x1, lateral connection		
		
		1 Plug to fit connecting cable NEBU-M8 2 Theoretical switching point 3 Threaded pin M2x4 4 Yellow LED (positive switching) 5 Yellow LED (negative switching)

Ordering data						
	Switching output	Electrical connection		Cable length [m]	Part No.	Type
		Cable	Cable with plug, M8x1			
In-line connection						
	N/O contact					
	Contacting, bipolar	3-wire	–	2.5	173210	SME-10-KL-LED-24
		–	3-pin	0.3	173212	SME-10-SL-LED-24
Lateral connection						
	N/O contact					
	Contacting, bipolar	3-wire	–	2.5	173211	SME-10-KQ-LED-24
		–	3-pin	0.3	173213	SME-10-SQ-LED-24

Proximity sensors SMT-10G, for C-slot

FESTO

Type codes

SMT-10G

		SMT	–	10G	–	PS	–	24V	–	E	–	2,5Q	–	OE
Function														
SMT	Proximity sensor, magneto-resistive													
Design														
10G	For C-slot, insertable in slot lengthwise													
Switching output, switching element function														
PS	PNP, N/O contact, 3-wire													
Rated operating voltage														
24V	24 V DC													
Cable properties														
E	Energy chain + robot applications													
Cable length [m], connection direction														
2,5Q	Cable, 2.5 m, lateral ¹⁾													
0,3Q	Cable with plug, 0.3 m, lateral ²⁾													
Electrical connection														
OE	Open end													
M8D	Cable with plug M8x1, rotatable thread													

1) Only with electrical connection OE

2) Not with electrical connection OE

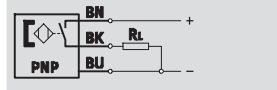
Proximity sensors SMT-10G, for C-slot

Technical data – Magneto-resistive

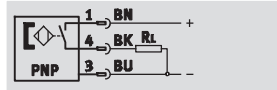
FESTO

Function

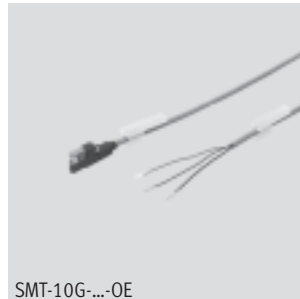
PNP, N/O contact, with cable, 3-wire



PNP, N/O contact, with plug



- Magneto-resistive measuring principle
- Insertable in slot lengthwise
- Design ideally matched to gripper sensing



SMT-10G-...-OE



SMT-10G-...-M

General technical data	
Design	For C-slot
Based on standard	EN 60947-5-2
Certification	c UL us - Listed (OL)
CE mark (see declaration of conformity)	To EU EMC Directive
Note on materials	Free of copper and PTFE RoHS-compliant

Input signal/measuring element	
Measuring principle	Magneto-resistive
Ambient temperature [°C]	-20 ... +70

Switching output	
Switching output	PNP
Switching element function	N/O contact
Max. output current [mA]	80
Max. switching capacity DC [W]	2.4

Output, additional data	
Protection against short circuit	Pulsed
Protection against overloading	Yes

Electronic components	
Operating voltage range [V DC]	10 ... 30
Reverse polarity protection	For all electrical connections

Electromechanical components		
Type	SMT-10G-...-OE	SMT-10G-...-M8D
Electrical connection	Cable, 3-wire	Cable with plug M8x1, 3-pin, rotatable thread
Connection direction	Lateral	
Cable test conditions	Energy chain: 5 million cycles, bending radius 28 mm Torsional strength: > 300,000 cycles, ±270°/0.1 m Resistance to bending: to Festo standard; test conditions on request	
Cable length [m]	2.5	0.3
Cable properties	Energy chain + robot applications	
Cable sheath material	Thermoplastic polyurethane elastomer	

Mechanical components	
Type of mounting	Clamped in C-slot Insertable in slot lengthwise
Housing material	Reinforced polyamide

Proximity sensors SMT-10G, for C-slot

Technical data – Magneto-resistive

FESTO

Display/operation	
Switching status display	Yellow LED

Immissions/emissions	
Ambient temperature with flexible cable installation	–5 ... +70
Protection class	IP65
	IP68

Pin allocation to EN 60947-5-2			
PS			
Plug, 3-pin			
M8x1	Pin	Wire colour	Allocation
	1	Brown	+
	3	Blue	–
	4	Black	Output

Dimensions

Download CAD Data → www.festo.com/us/cad

Technical drawing of the SMT-10G proximity sensor assembly. The drawing shows the sensor assembly with dimensions L1, L2, L3, L4, L5, L6, L7, D1, D2, D3, B1, B2, B3, B4, H1, H2, and a callout for the LED (1) and SMT-10G (2).

1	LED	3	Holder for inscription label	4	Connecting cable
2	SMT-10G			5	Plug M8x1

Technical drawing of the SMT-10G proximity sensor assembly. The drawing shows the sensor assembly with dimensions B1, B2, B3, B4, H1, H2, and a callout for the LED (1) and SMT-10G (2).

	D1	D2	D3	B1	B2	B3	B4	H1	H2	L1	L2	L3	L4	L5	L6	L7	≙
SMT-10G-...-OE	2.9	–	–	5.4	5	3.75	3	10	5	2500 +70	25	–	14.4	23	50	2.75	1.5
SMT-10G-...-M5D		M5x0.5	6							300 +30		30.5					

Ordering data						
	Switching output	Electrical connection		Cable length [m]	Part No.	Type
		Cable	Cable with plug, rotatable thread, M8x1			
N/O contact						
	PNP	3-wire	–	2.5	547862	SMT-10G-PS-24V-E-2,5Q-OE
		–	3-pin	0.3	547863	SMT-10G-PS-24V-E-0,3Q-M8D

Proximity sensors SMT/SME-10, for C-slot

Accessories

FESTO

Mounting SMBN-10

for mounting proximity sensors
SME/SMT-10 on drives with T-slot

Materials:

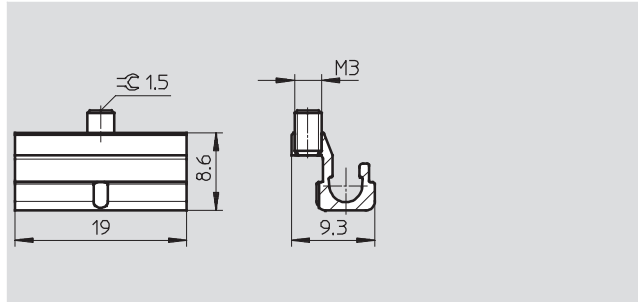
Rail: Anodised wrought aluminium alloy

Screws: High-alloy stainless steel

Note on materials:

Free of copper and PTFE

RoHS-compliant

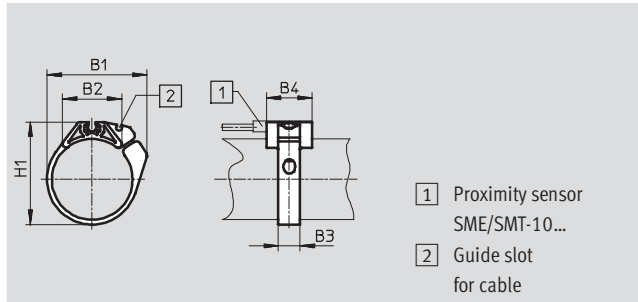


Ordering data		
For piston Ø	Part No.	Type
125 ... 320	537809	SMBN-10

Mounting kit SMBR

Material:

Polyacetal



Dimensions and ordering data						
For piston Ø	B1	B2	B3 ±0.1	B4 ±0.1	H1	Part No. Type
6	15.6	9.4	7	19	13.5	173226 SMBR-10-6
8	18.9	12.3	7	19	17.5	175101 SMBR-10-8
10	20.4	13.7	7	19	19.9	173227 SMBR-10-10
12	22.7	14.3	7	19	21.9	175102 SMBR-10-12
16	26.1	17	7	19	25.7	173228 SMBR-10-16
20	33.2	20.8	9	19	30.4	175103 SMBR-10-20
25	36.5	22.6	9	19	35.6	175104 SMBR-10-25
32	41.7	24.5	9	19	42.7	175105 SMBR-10-32
40	47	26.5	9	19	50.7	175106 SMBR-10-40
50	56.4	28.6	9	19	61.5	175107 SMBR-10-50
63	69.4	32	9	19	74.5	175108 SMBR-10-63

Proximity sensors SMT/SME-10, for C-slot

FESTO

Accessories

Positioning component SMM

Insertable in slot lengthwise

Ambient temperature: -40 ... +120 °C

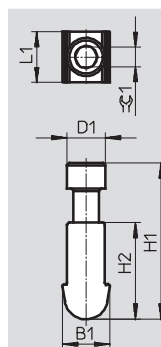
Materials:

Housing: Anodised wrought aluminium alloy

Screws: High-alloy stainless steel

Note on materials:

RoHS-compliant



Dimensions and ordering data									
B1	D1	H1	H2	L1	±C1	CRC ¹⁾	Part No.	Type	PU ²⁾
3.75	3.0	12.23	7.6	4.0	1.5	3	547942	SMM-10	10

1) Corrosion resistance class 4 according to Festo standard 940 070

Components subject to particularly high corrosion stress. Parts used with aggressive media, e.g. in the food or chemical industry. These applications should be supported with special tests with the media if required.

2) Packaging unit

Ordering data – Connecting cables					Technical data → Internet: nebu	
	Type	Number of wires	Cable length [m]	Part No.	Type	
Socket M8x1, 3-pin						
	For SMT/SME-10...	3	2.5	541333	NEBU-M8G3-K-2.5-LE3	
			5	541334	NEBU-M8G3-K-5-LE3	
	For SMT/SME-10...	3	2.5	541338	NEBU-M8W3-K-2.5-LE3	
			5	541341	NEBU-M8W3-K-5-LE3	

Ordering data – Mounting attachments			
	For Ø	Part No.	Type
	6	173205	WSM-6-SME-10
	8	173206	WSM-8-SME-10
	10	173207	WSM-10-SME-10
	–	534255	SMBK-10

Ordering data – Sensor tester	
Part No.	Type
158481	SM-TEST-1

Ordering data – Inscription labels, safety clips				
	Size	Part No.	Type	PU ¹⁾
	23x4 mm	541598	ASLR-L-423	34
	M8	548067	NEAU-M8-GD	1
	M12	548068	NEAU-M12-GD	1

1) Packaging unit per frame

Product Range and Company Overview

A Complete Suite of Automation Services

Our experienced engineers provide complete support at every stage of your development process, including: conceptualization, analysis, engineering, design, assembly, documentation, validation, and production.



Custom Automation Components
Complete custom engineered solutions



Custom Control Cabinets
Comprehensive engineering support and on-site services



Complete Systems
Shipment, stocking and storage services

The Broadest Range of Automation Components

With a comprehensive line of more than 30,000 automation components, Festo is capable of solving the most complex automation requirements.



Electromechanical
Electromechanical actuators, motors, controllers & drives



Pneumatics
Pneumatic linear and rotary actuators, valves, and air supply



PLCs and I/O Devices
PLC's, operator interfaces, sensors and I/O devices

Supporting Advanced Automation... As No One Else Can!

Festo is a leading global manufacturer of pneumatic and electromechanical systems, components and controls for industrial automation, with more than 12,000 employees in 56 national headquarters serving more than 180 countries. For more than 80 years, Festo has continuously elevated the state of manufacturing with innovations and optimized motion control solutions that deliver higher performing, more profitable automated manufacturing and processing equipment. Our dedication to the advancement of automation extends beyond technology to the education and development of current and future automation and robotics designers with simulation tools, teaching programs, and on-site services.

Quality Assurance, ISO 9001 and ISO 14001 Certifications

Festo Corporation is committed to supply all Festo products and services that will meet or exceed our customers' requirements in product quality, delivery, customer service and satisfaction.

To meet this commitment, we strive to ensure a consistent, integrated, and systematic approach to management that will meet or exceed the requirements of the ISO 9001 standard for Quality Management and the ISO 14001 standard for Environmental Management.



© Copyright 2008, Festo Corporation. While every effort is made to ensure that all dimensions and specifications are correct, Festo cannot guarantee that publications are completely free of any error, in particular typing or printing errors. Accordingly, Festo cannot be held responsible for the same. For Liability and Warranty conditions, refer to our "Terms and Conditions of Sale", available from your local Festo office. All rights reserved. No part of this publication may be reproduced, distributed, or transmitted in any form or by any means, electronic, mechanical, photocopying or otherwise, without the prior written permission of Festo. All technical data subject to change according to technical update.



Printed on recycled paper at New Horizon Graphic, Inc., FSC certified as an environmentally friendly printing plant.

Festo North America

Festo Regional Contact Center

5300 Explorer Drive
Mississauga, Ontario L4W 5G4
Canada

USA Customers:

For ordering assistance,

Call: 1.800.99.FESTO (1.800.993.3786)

Fax: 1.800.96.FESTO (1.800.963.3786)

Email: customer.service@us.festo.com

For technical support,

Call: 1.866.GO.FESTO (1.866.463.3786)

Fax: 1.800.96.FESTO (1.800.963.3786)

Email: product.support@us.festo.com

Canadian Customers:

Call: 1.877.GO.FESTO (1.877.463.3786)

Fax: 1.877.FX.FESTO (1.877.393.3786)

Email: festo.canada@ca.festo.com

USA Headquarters

Festo Corporation
395 Moreland Road
P.O. Box 18023
Hauppauge, NY 11788, USA
www.festo.com/us

USA Sales Offices

Appleton

North 922 Tower View Drive, Suite N
Greenville, WI 54942, USA

Boston

120 Presidential Way, Suite 330
Woburn, MA 01801, USA

Chicago

1441 East Business Center Drive
Mt. Prospect, IL 60056, USA

Dallas

1825 Lakeway Drive, Suite 600
Lewisville, TX 75057, USA

Detroit – Automotive Engineering Center

2601 Cambridge Court, Suite 320
Auburn Hills, MI 48326, USA

New York

395 Moreland Road
Hauppauge, NY 11788, USA

Silicon Valley

4935 Southfront Road, Suite F
Livermore, CA 94550, USA

United States



USA Headquarters, East: Festo Corp., 395 Moreland Road, Hauppauge, NY 11788

Phone: 1.631.435.0800; Fax: 1.631.435.8026;

Email: info@festo-usa.com

www.festo.com/us

Canada



Headquarters: Festo Inc., 5300 Explorer Drive, Mississauga, Ontario L4W 5G4

Phone: 1.905.624.9000; Fax: 1.905.624.9001;

Email: festo.canada@ca.festo.com

www.festo.ca

Mexico



Headquarters: Festo Pneumatic, S.A., Av. Ceylán 3, Col. Tequesquahuac,
54020 Tlalneapantla, Edo. de México

Phone: 011 52 [55] 53 21 66 00; Fax: 011 52 [55] 53 21 66 65;

Email: festo.mexico@mx.festo.com

www.festo.com/mx

Central USA

Festo Corporation
1441 East Business
Center Drive
Mt. Prospect, IL 60056, USA
Phone: 1.847.759.2600
Fax: 1.847.768.9480



Western USA

Festo Corporation
4935 Southfront Road,
Suite F
Livermore, CA 94550, USA
Phone: 1.925.371.1099
Fax: 1.925.245.1286



Festo Worldwide

Argentina Australia Austria Belarus Belgium Brazil Bulgaria Canada Chile China Colombia Croatia Czech Republic Denmark
Estonia Finland France Germany Great Britain Greece Hong Kong Hungary India Indonesia Iran Ireland Israel Italy Japan Latvia
Lithuania Malaysia Mexico Netherlands New Zealand Norway Peru Philippines Poland Romania Russia Serbia Singapore
Slovakia Slovenia South Africa South Korea Spain Sweden Switzerland Taiwan Thailand Turkey Ukraine United States Venezuela

www.festo.com