

Proximity switch SMT-8

FESTO



Type code

001	Series
SMT	Proximity sensor

002	Design type
8	For T-slot

003	Sensor version
SL	Inserted in the slot lengthwise, sturdy due to long guides

004	Switching output
PS	3-wire PNP N/O contact

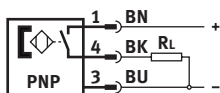
005	Display
L	LED

006	Rated operating voltage
24	24 V DC

007	Generation
B	Series B

Datasheet

General technical data SMT-8-SL



- Magneto-resistive measuring principle
- Can be inserted in the slot lengthwise
- Sturdy thanks to long guides
- Plug directly on sensor

Design	For T-slot
Mounting position	optional
Based on standard	EN 60947-5-2
Approval	RCM trademark, c UL us listed (OL)
CE mark (see declaration of conformity)	To EU EMC Directive, In accordance with EU RoHS Directive
CE marking (see declaration of conformity) ¹⁾	To UK instructions for EMC, To UK RoHS instructions
Certificate issuing authority	UL E232949
Instructions on use	Support / actuator-sensor overview”The right sensor for the actuator”
Note on materials	RoHS-compliant
LABS (PWIS) conformity	VDMA24364-B2-L

1) For information about the area of use, see the declaration of conformity at: www.festo.com/catalogue/smt-8-sl → Support/Downloads. If the devices are subject to usage restrictions in residential, commercial or light industrial environments, further measures for the reduction of the emitted interference may be necessary.

Input signal, measuring element SMT-8-SL

Measuring principle	Magneto-resistive
Ambient temperature	-20 ... 70°C

Switching output SMT-8-SL

Switching output	PNP
Switching element function	N/O contact
Reproducibility of switching value	–
Switch-on time	≤1 ms
Switch-off time	2 ... 6 ms
Max. switching frequency	140 Hz
Max. output current	100 mA
Max. switching capacity DC	3 W
Voltage drop	≤2 V
Off-state current	<2.000 µA

Output, further data SMT-8-SL

Short circuit current rating	yes
Overload protection	Available

Electronics SMT-8-SL

Rated operational voltage DC	24 V
Operational voltage range DC	10 ... 30 V
Reverse polarity protection	For all electrical connections

Electromechanics SMT-8-SL

Electrical connection 1, connection type	Plugs
Electrical connection 1, connector system	M8x1, A-coded, to EN 61076-2-104
Electrical connection 1, number of connections/cores	3
Connection outlet orientation	In-line
Cable length	–
Material cable sheath	–

Datasheet

Mechanics SMT-8-SL

Type of mounting	Screw-clamped, Insertable in the slot lengthwise
Material housing	PA

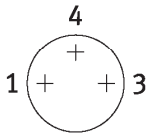
Display, operation SMT-8-SL

Switching status indication	Yellow LED
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Immission, emission SMT-8-SL

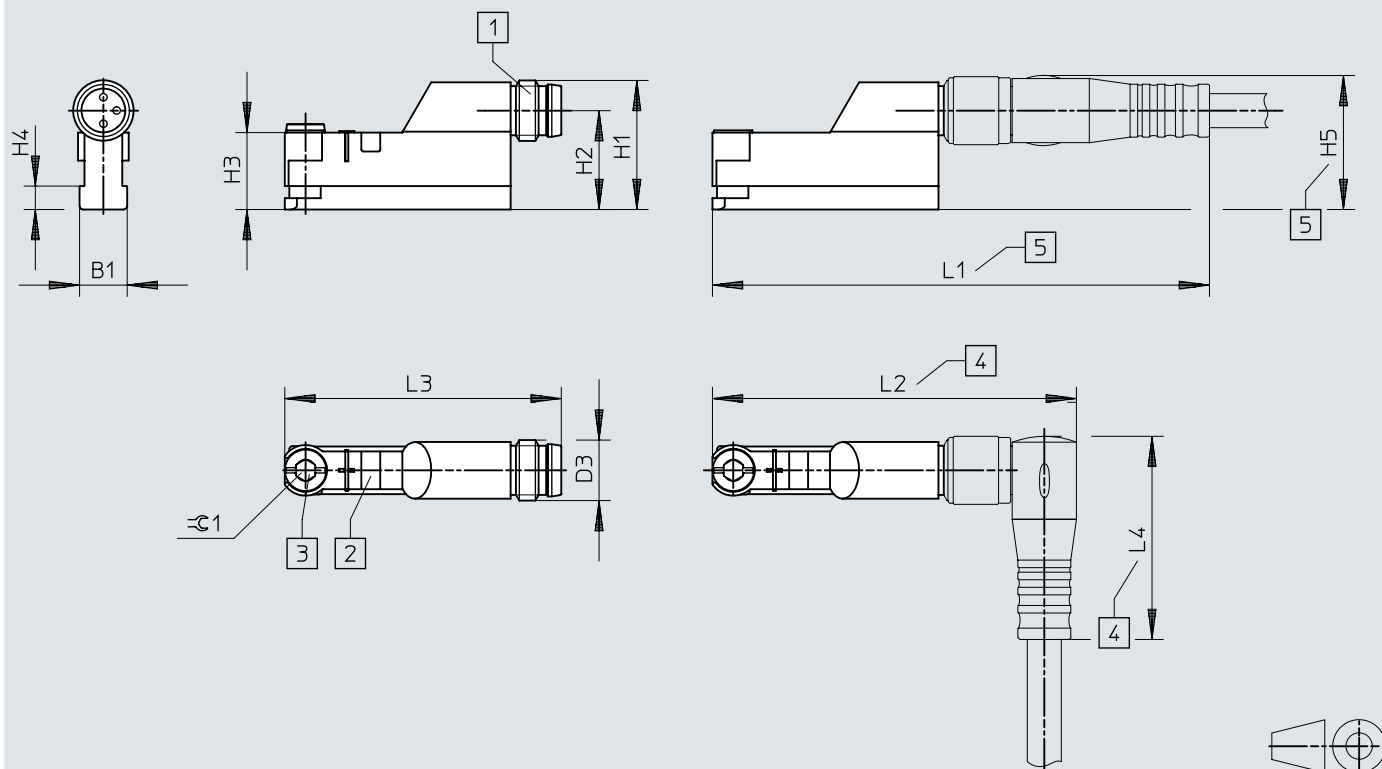
Ambient temperature	-20 ... 70°C
Degree of protection	IP65, IP68
Insulation voltage	-
Pollution degree	-

Pin assignment according to EN 60947-5-2, SMT-8-SL



Dimensions

Dimensions – SMT-8-SL

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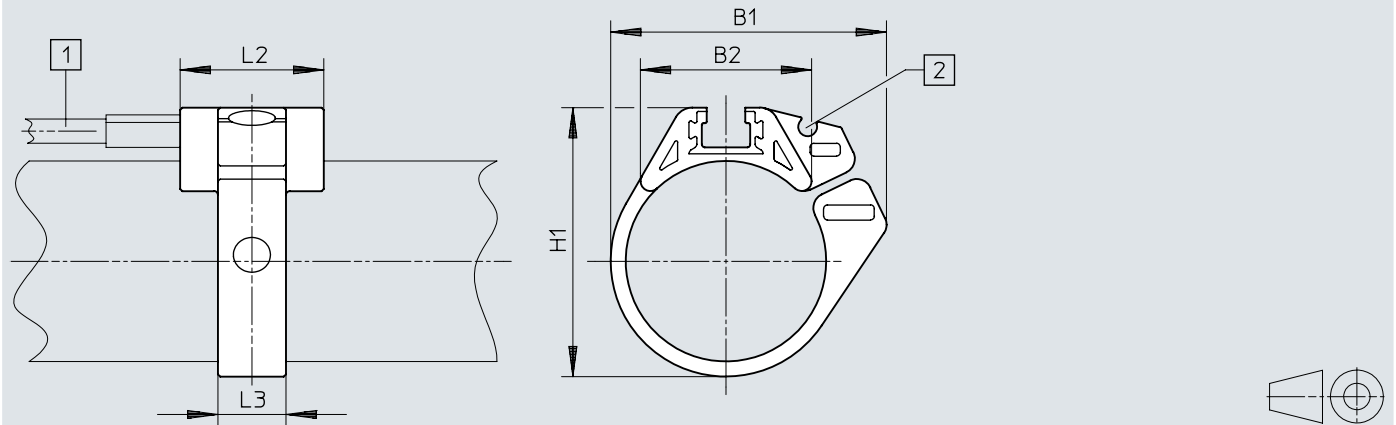
- [1] Plug to fit connecting cable NEBU-M8
- [2] Yellow light emitting diode
- [3] Clamping piece
- [4] Installation space for connecting cable NEBU-M8W3
- [5] Installation space for connecting cable NEBU-M8G3

	B1	D3	H1	H2	H3	H4	H5	L1	L2	L3	L4
SMT-8-SL	6,7	M8x1	17,1	13,1	10,2	3,1	17,6	66	48,4	36,6	25

Dimensions

Dimensions – Mounting kit SMBR

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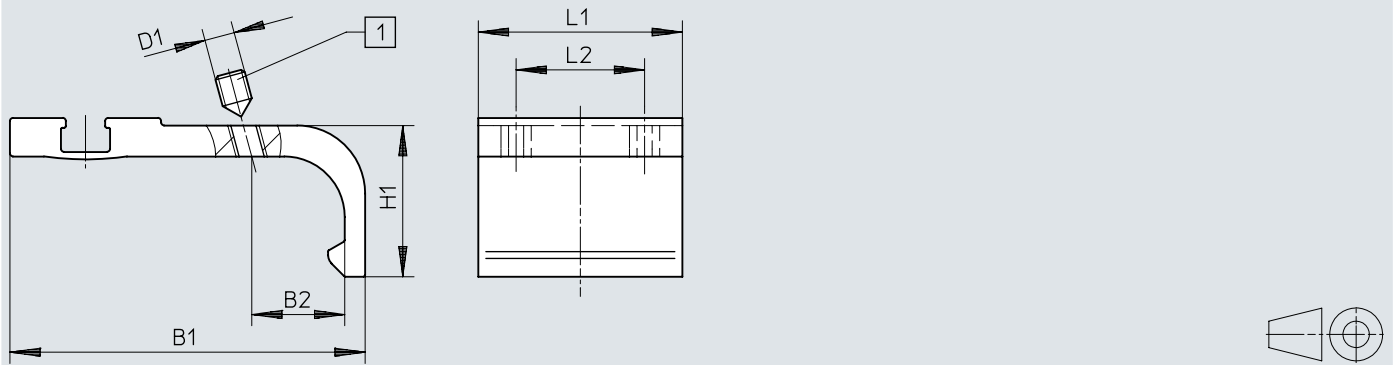


- [1] Proximity switches SME-8- ..., SMT-8- ...
- [2] Guide slot for switch cable

	B1	B2	H1	L2	L3
SMBR-8-8	18,9	12,3	17,5	19	7
SMBR-8-10	20,4	13,7	19,9	19	7
SMBR-8-12	22,7	14,3	21,9	19	7
SMBR-8-16	28,2	16,9	25,7	19	8
SMBR-8-20	34,5	20,8	30,4	19	9
SMBR-8-25	36,7	22,7	35,6	19	9
SMBR-8-32	41,7	24,6	42,7	19	9
SMBR-8-40	47,1	26,5	50,7	19	9
SMBR-8-50	56,4	28,6	61,5	19	9
SMBR-8-63	69,4	32	74,5	19	9

Dimensions

Dimensions – Mounting kit SMB-8-FENG

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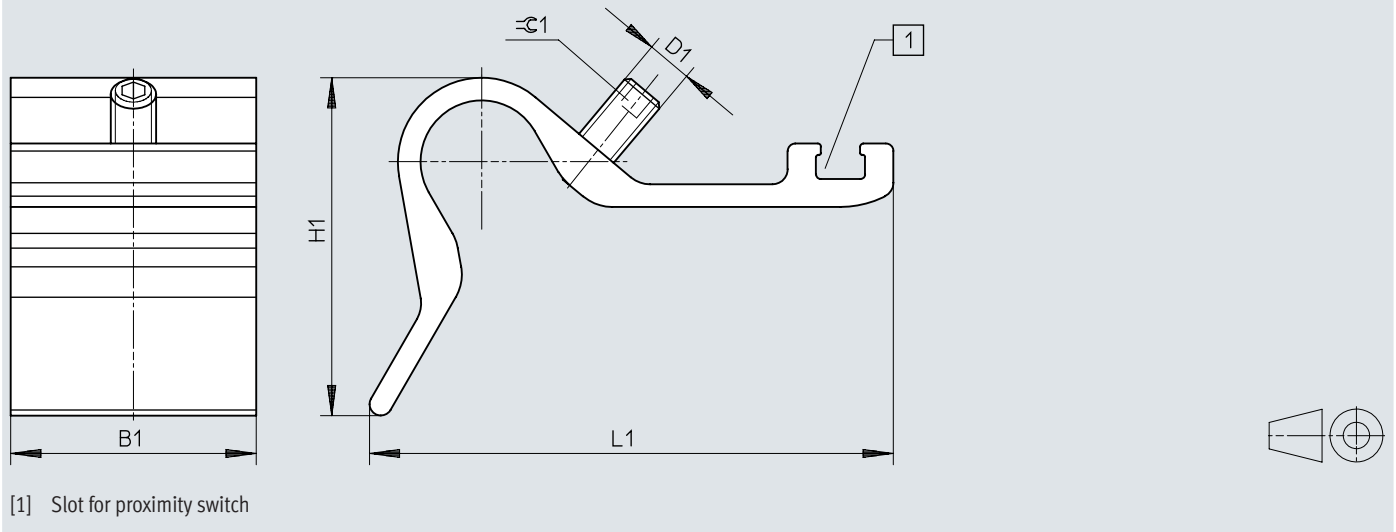
[1] Threaded pin

	B1	B2	D1	H1	L1	L2
SMB-8-FENG-32/40	35,1	8,7	M3	15,5	27	17
SMB-8-FENG-50/63	47	12,3	M4	20	27	17
SMB-8-FENG-80/100	64,3	15,7	M5	24,3	27	17

Dimensions

Dimensions – Sensor bracket DASP-M4-...-A

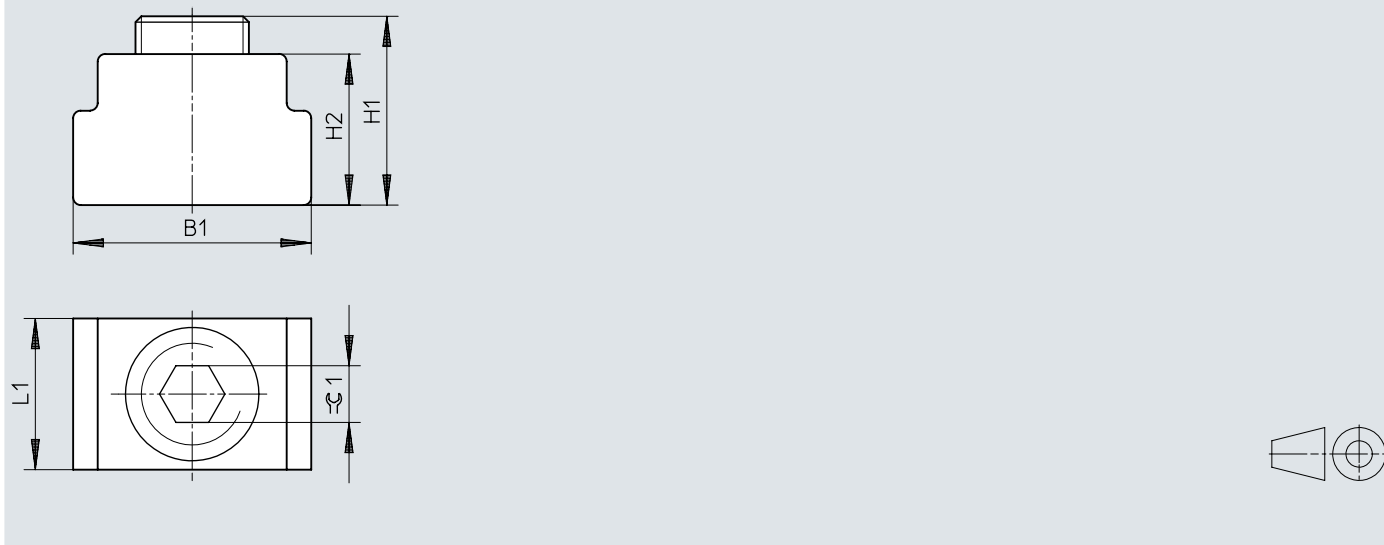
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	B1	D1	H1	L1	$\pm 0,1$
DASP-M4-125-A	32,5	M5	28	45,4	2,5
DASP-M4-160-A	32,5	M6	44,7	69,4	3
DASP-M4-250-A	32,5	M6	56,3	88	3
DASP-M4-320-A	32,5	M6	56,3	88	3


Dimensions

Dimensions – Positioning element SMM

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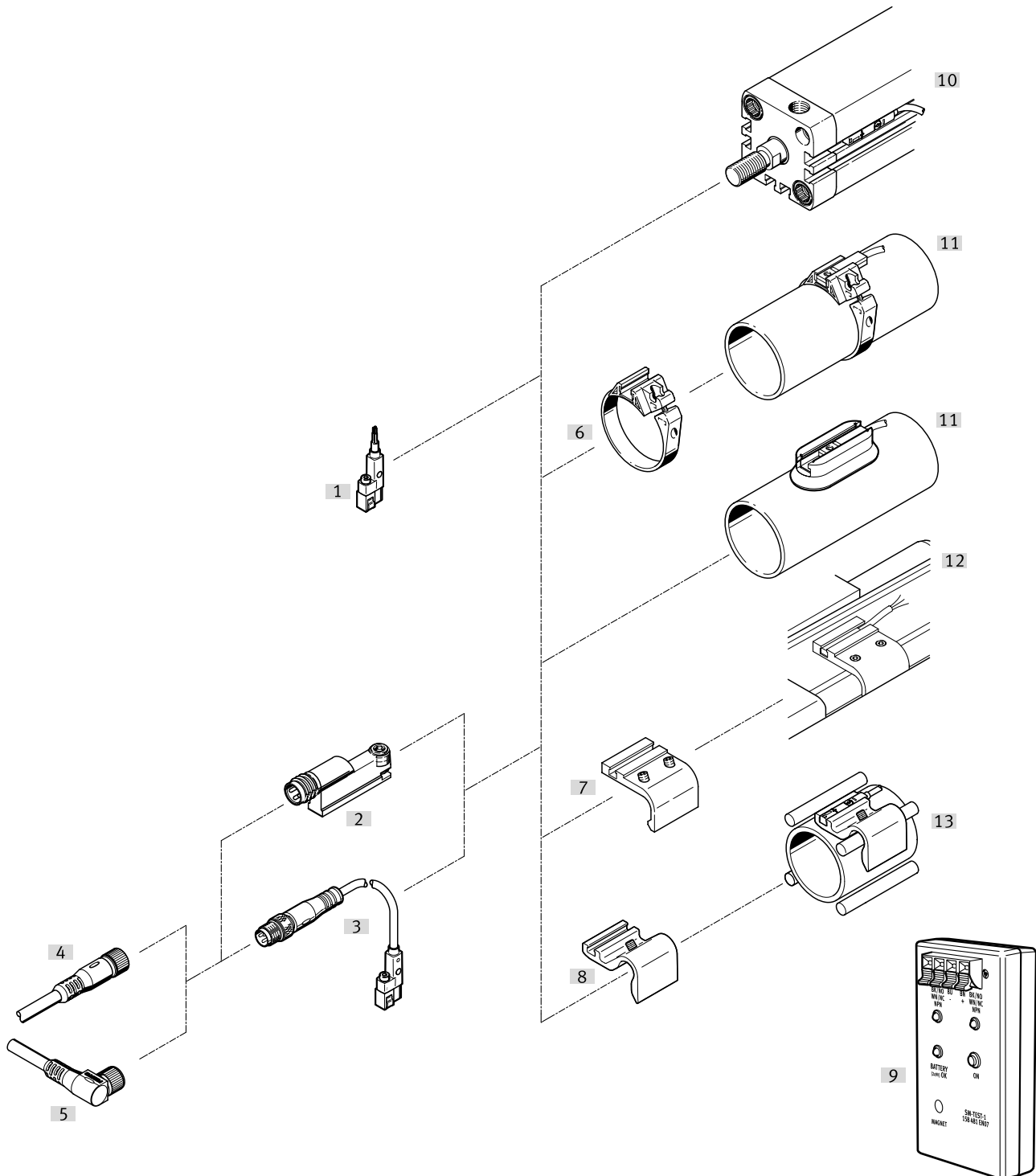
	B1	H1	H2	L1	⌀1
SMM-8	6,3	5,0	4,0	4,0	1,5

Ordering data

Ordering data SMT-8SL				
	Switching output	Electrical connection 1, connection type	Part no.	Type
	PNP	Plugs	562019	SMT-8-SL-PS-LED-24-B

Peripherals

Peripherals overview




Accessories			→ Link
Type/order code	Description		
[1] SMT-8-G-...-OE	With cable		smt-8-g
[2] SMT-8-SL-...	With plug		smt-8-sl
[3] SMT-8-G-...-M...	With cable and plug		smt-8-g
[4] Connecting cable NEBA-M8	Straight socket		13
[5] Connecting cable NEBA-M8	Angled socket		13
[6] Mounting kit SMBR	For round cylinders		13
[7] Mounting kit SMB-8-FENG	-		13
[8] Sensor bracket DASP-M4-...	For DSBG-125 ... 320		13

Peripherals


Accessories		→ Link
Type/order code	Description	
[9] Sensor tester SM-TEST-1	Checking that the proximity switches are functioning using the built-in voltage source. Adjusting proximity switches on the cylinder.	14
[10] Drives with T-slot	e.g. ADN	-
[11] Round cylinder	e.g. CRDSNU	-
[12] Standards-based cylinder DSBC	-	-
[13] Drives with tie rod or mounting rod	-	-


Accessories

Mounting kit SMBR			
	Size	Part no.	Type
	8	175091	SMBR-8-8
	10	175092	SMBR-8-10
	12	★ 175093	SMBR-8-12
	16	★ 175094	SMBR-8-16
	20	★ 175095	SMBR-8-20
	25	★ 175096	SMBR-8-25
	32	175097	SMBR-8-32
	40	175098	SMBR-8-40
	50	175099	SMBR-8-50
63	175100	SMBR-8-63	


Mounting kit SMB-8-FENG			
	Note on materials	Part no.	Type
	RoHS-compliant	175706	SMB-8-FENG-50/63
		175707	SMB-8-FENG-80/100
		175705	SMB-8-FENG-32/40

Sensor holder DASP-M4-...-A			
	For piston diameter	Part no.	Type
	Ø125	1451483	DASP-M4-125-A
	Ø160 - Ø200	1553813	DASP-M4-160-A
	Diameter 250	1456781	DASP-M4-250-A
	Ø320	3015256	DASP-M4-320-A

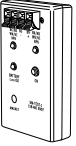
Positioning element SMM			
	Note on materials	Part no.	Type
	RoHS-compliant	547941	SMM-8

Mounting attachment SMBK-8			
	Description	Part no.	Type
	For attaching connecting cables	534254	SMBK-8

Inscription labels			
	Size	Part no.	Type
	4x23 mm	541598	ASLR-L-423

Connecting cable NEBA-M8					
	Cable structure	Cable length	Product weight	Part no.	Type
	3 x 0.25 mm ²	2.5 m	50 g	★ 8078230	NEBA-M8W3-U-2.5-N-LE3
				★ 8078223	NEBA-M8G3-U-2.5-N-LE3
		5 m	96 g	★ 8078231	NEBA-M8W3-U-5-N-LE3
				★ 8078224	NEBA-M8G3-U-5-N-LE3

Accessories

Sensor tester			
	Description	Part no.	Type
	Adjusting proximity switches on the cylinder, Checking the function of proximity switches with the help of the built-in voltage source	158481	SM-TEST-1