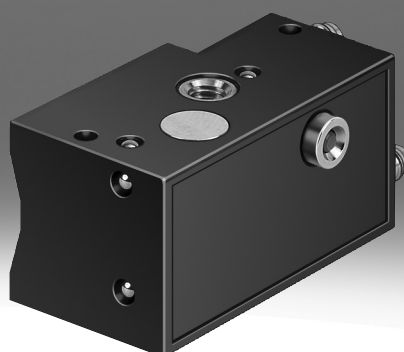


## Proximity switch SMPO-1

**FESTO**



Type code

|        |                                          |  |
|--------|------------------------------------------|--|
| 001    | Series                                   |  |
| SMPO-1 | Proximity switch, block design, magnetic |  |
| 002    | Pneumatic connection                     |  |
| H      | Barbed connector, 3 mm                   |  |

|     |            |  |
|-----|------------|--|
| 003 | Generation |  |
| B   | Series B   |  |

## Datasheet

### General technical data

|                                          |                                                |
|------------------------------------------|------------------------------------------------|
| Valve function                           | 3/2                                            |
| Measuring principle                      | Magnetic                                       |
| Design                                   | Block design                                   |
| Operating medium                         | Compressed air to ISO 8573-1:2010 [6:4:4]      |
| Note on operating and pilot medium       | Lubricated operation not possible              |
| Operating pressure                       | 2 ... 6 bar                                    |
| Pneumatic connection                     | Barbed fitting PK-3                            |
| Ambient temperature                      | -15 ... 60°C                                   |
| LABS (PWIS) conformity                   | VDMA24364-B2-L                                 |
| Product weight                           | 14 g                                           |
| RoHS status                              | RoHS compliant in accordance with EU directive |
| Exemption according to EU-RoHS annex III | Exemption 6c                                   |

### Input signal/measuring element

|                                                  |              |
|--------------------------------------------------|--------------|
| Measuring principle                              | Magnetic     |
| Ambient temperature                              | -15 ... 60°C |
| Reproducibility of switching value <sup>1)</sup> | +/-0.2 mm    |

1) Only applicable to drives protected against rotation.

### Switching output

|                                    |           |
|------------------------------------|-----------|
| Reproducibility of switching value | +/-0.2 mm |
| Switching status indication        | Optical   |
| Switch-on time                     | <30 ms    |
| Switch-off time                    | <25 ms    |

### Display/operation

|                             |         |
|-----------------------------|---------|
| Switching status indication | Optical |
|-----------------------------|---------|

### Mechanics

|                  |                                     |
|------------------|-------------------------------------|
| Type of mounting | With through-hole, With accessories |
| Material housing | Brass, PA, POM                      |
| Product weight   | 14 g                                |

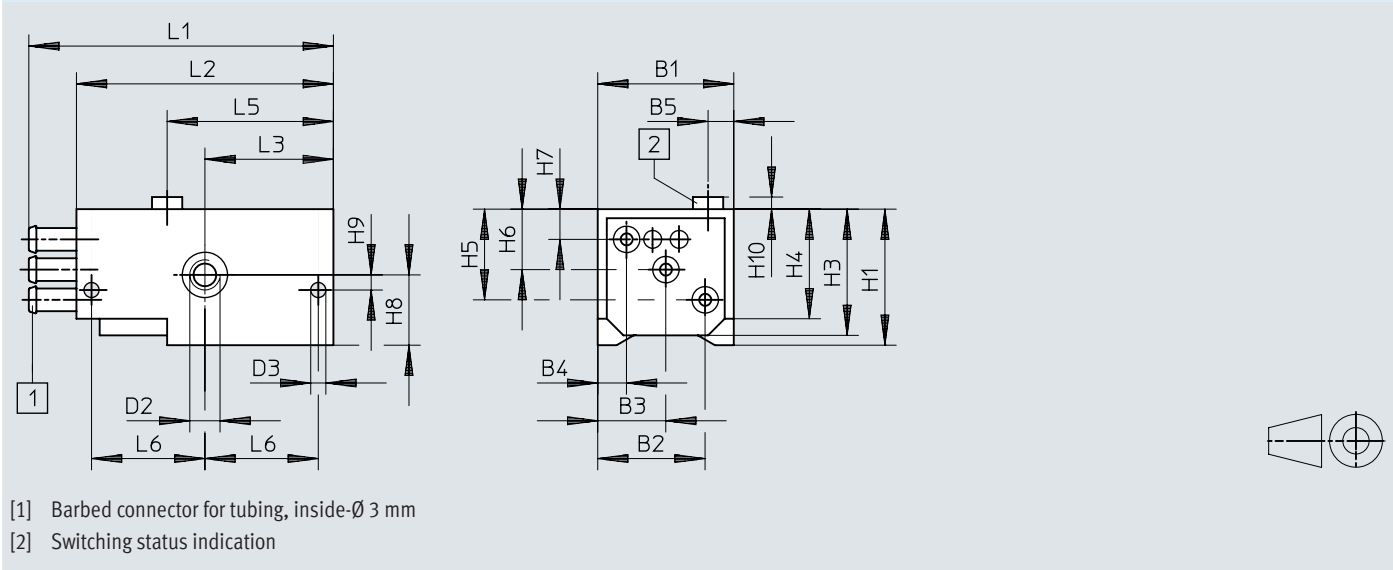
### Immission/emission

|                                              |                                                              |
|----------------------------------------------|--------------------------------------------------------------|
| Degree of protection                         | IP65                                                         |
| Explosion protection                         | Zone 1 (ATEX), Zone 2 (ATEX), Zone 21 (ATEX), Zone 22 (ATEX) |
| ATEX declaration                             | For zone 1, 2, 21, 22                                        |
| Corrosion resistance class CRC <sup>1)</sup> | 1 - Low corrosion stress                                     |

1) More information: [www.festo.com/x/topic/crc](http://www.festo.com/x/topic/crc)

Dimensions

Dimensions – SMPO-1-H-B Download CAD data [www.festo.com](http://www.festo.com)

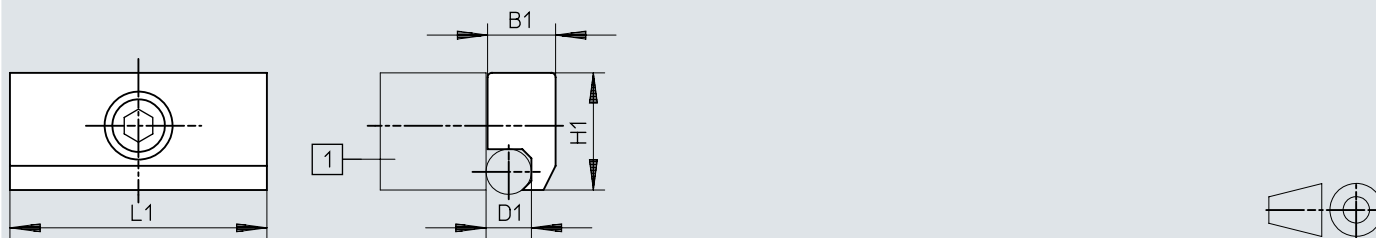


|            | B1   | B2   | B3   | B4   | B5   | D2 | D3<br>Ø | H1   | H3   | H4   | H5   |
|------------|------|------|------|------|------|----|---------|------|------|------|------|
|            | -0,2 | ±0,2 | ±0,2 | ±0,1 | ±0,1 |    | ±0,1    | ±0,2 | ±0,2 | ±0,2 | ±0,2 |
| SMPO-1-H-B | 18   | 14,2 | 9    | 3,8  | 3,4  | M4 | 2       | 18   | 16,7 | 14,5 | 12   |

|            | H6   | H7   | H8   | H9   | H10  | L1    | L2   | L3   | L5   | L6   |
|------------|------|------|------|------|------|-------|------|------|------|------|
|            | ±0,2 | ±0,1 | ±0,2 | ±0,1 | ±0,1 |       | ±0,3 | ±0,2 | ±0,2 | ±0,2 |
| SMPO-1-H-B | 8    | 4    | 9,3  | 2    | 1,6  | ~40,3 | 34   | 17   | 22   | 15   |

## Dimensions

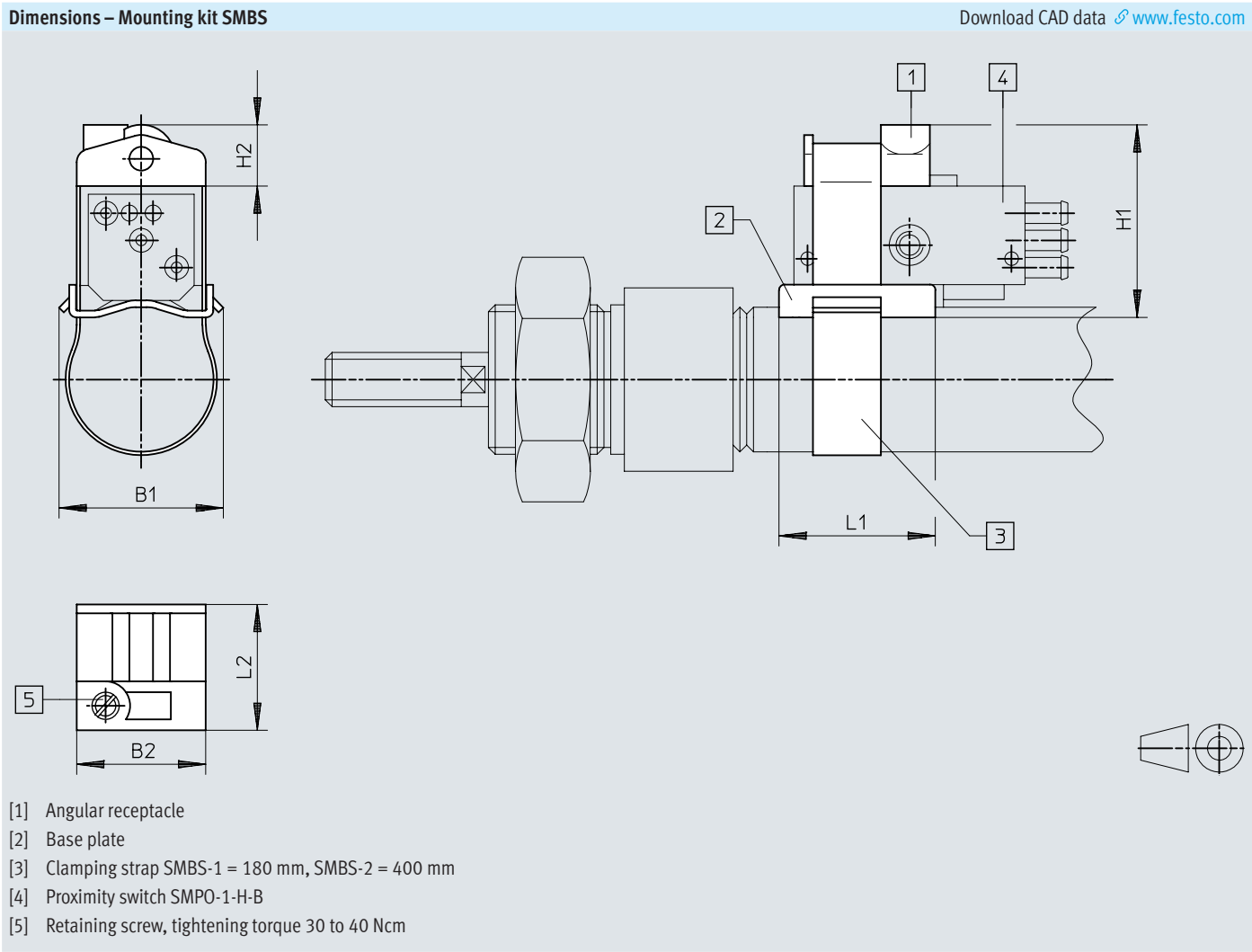
### Dimensions – Mounting kit SMB-1

[Download CAD data](http://www.festo.com)


[1] Proximity switch SMEO, SMT0, SMPO-1

|       |            | B1 | D1<br>Ø | H1   | L1 |
|-------|------------|----|---------|------|----|
| SMB-1 | 32 ... 100 | 9  | 6       | 15,5 | 34 |

Dimensions



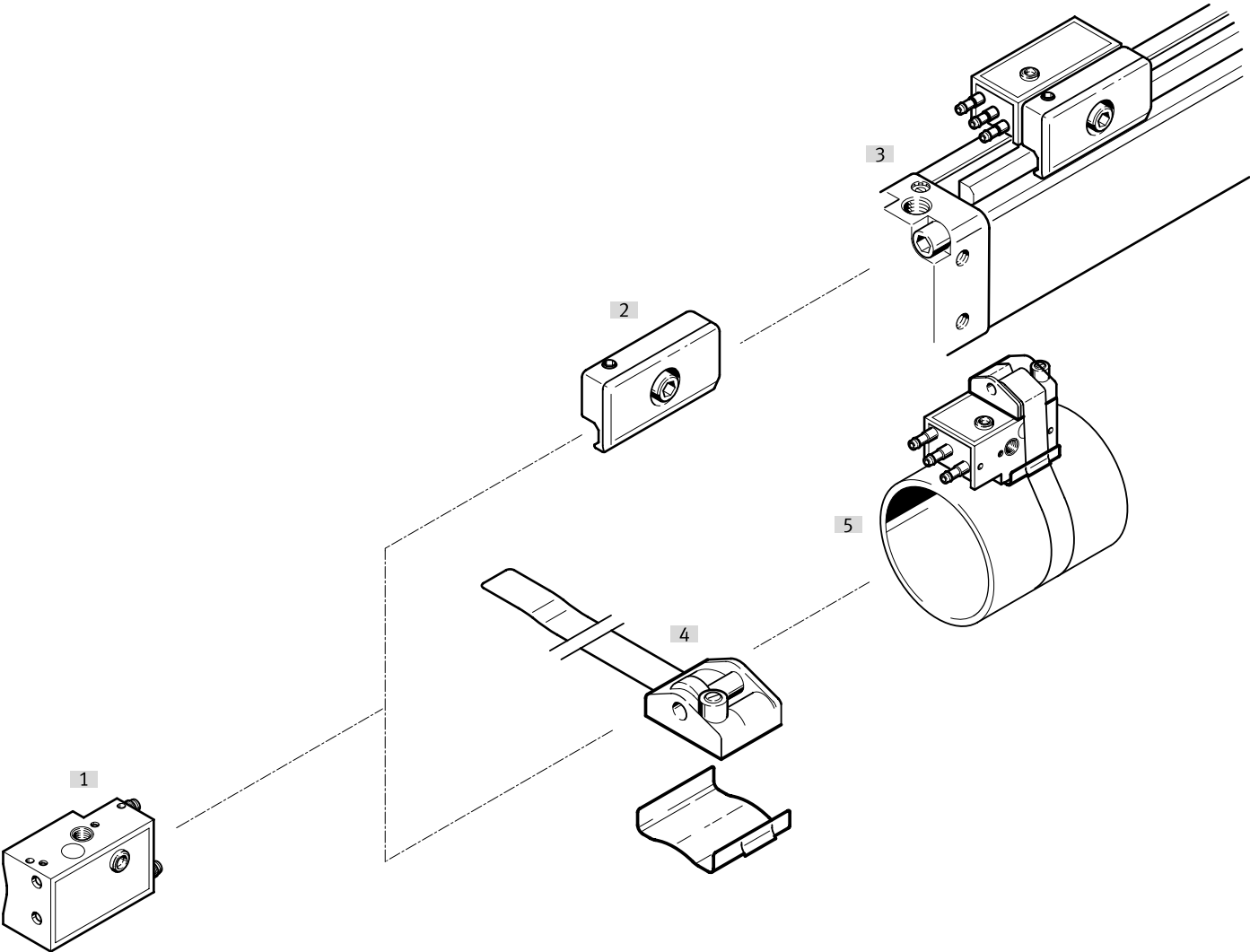
|        |            | B1   | B2 | H1  | H2 | L1 | L2   |
|--------|------------|------|----|-----|----|----|------|
| SMBS-1 | 8 ... 25   | 24,2 | 19 | ~29 | 9  | 23 | 18,5 |
| SMBS-2 | 32 ... 100 |      |    |     |    |    |      |

## Ordering data

| Ordering data                                                                     |                |                      |                       |              |                   |
|-----------------------------------------------------------------------------------|----------------|----------------------|-----------------------|--------------|-------------------|
|                                                                                   | Valve function | Pneumatic connection | ATEX declaration      | Part no.     | Type              |
|  | 3/2            | Barbed fitting PK-3  | For zone 1, 2, 21, 22 | <b>31008</b> | <b>SMPO-1-H-B</b> |

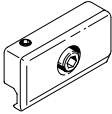
Peripherals

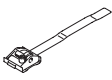
Peripherals overview



| Accessories                            |                                                                                                                                                | → Link                 |
|----------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------|------------------------|
| Type/order code                        | Description                                                                                                                                    |                        |
| [1] Proximity switch SMPO-1, pneumatic | Pneumatic system                                                                                                                               | <a href="#">smpo-1</a> |
| [2] Mounting kit SMB-1                 | <ul style="list-style-type: none"><li>• For drives with Ø 6 mm tie rod or mounting strip</li><li>• For standards-based cylinder DSBG</li></ul> | <a href="#">9</a>      |
| [3] Flat cylinder DZH                  | Ø 32 ... 63 mm                                                                                                                                 | <a href="#">-</a>      |
| [4] Mounting kit SMBS                  | For round cylinders                                                                                                                            | <a href="#">9</a>      |
| [5] Round cylinders                    | Ø 8 ... 100 mm                                                                                                                                 | <a href="#">-</a>      |

## Accessories

| Mounting kit SMB-1                                                                |      |                                  |                        |              |              |
|-----------------------------------------------------------------------------------|------|----------------------------------|------------------------|--------------|--------------|
|                                                                                   | Size | RoHS status                      | LABS (PWIS) conformity | Part no.     | Type         |
|  | 1    | RoHS compliant without exemption | VDMA24364-B2-L         | <b>11886</b> | <b>SMB-1</b> |

| Mounting kit SMBS                                                                 |      |                                                |                        |               |               |
|-----------------------------------------------------------------------------------|------|------------------------------------------------|------------------------|---------------|---------------|
|                                                                                   | Size | RoHS status                                    | LABS (PWIS) conformity | Part no.      | Type          |
|  | 1    | RoHS compliant in accordance with EU directive | VDMA24364-B2-L         | <b>151225</b> | <b>SMBS-1</b> |
|                                                                                   | 2    |                                                |                        | <b>151226</b> | <b>SMBS-2</b> |