

# ISO cylinder

## DSBG-50-200-PPVA-N3

Part number: 1646716

FESTO



## Data sheet

| Feature                                                   | Value                                                              |
|-----------------------------------------------------------|--------------------------------------------------------------------|
| Stroke                                                    | 200 mm                                                             |
| Piston diameter                                           | 50 mm                                                              |
| Piston rod thread                                         | M16x1.5                                                            |
| Cushioning                                                | Pneumatic cushioning, adjustable at both ends                      |
| Mounting position                                         | Any                                                                |
| Conforms to standard                                      | ISO 15552                                                          |
| Piston rod end                                            | External thread                                                    |
| Structural design                                         | Piston<br>Piston rod<br>Tie rod 1<br>Cylinder barrel               |
| Position sensing                                          | Via proximity switch                                               |
| Variants                                                  | Piston rod at one end                                              |
| Operating pressure                                        | 0.04 MPa...1.2 MPa<br>0.4 bar...12 bar                             |
| Mode of operation                                         | Double-acting                                                      |
| Operating medium                                          | Compressed air as per ISO 8573-1:2010 [7:4:4]                      |
| Information on operating and pilot media                  | Operation with oil lubrication possible (required for further use) |
| Corrosion resistance class (CRC)                          | 2 - Moderate corrosion stress                                      |
| LABS (PWIS) conformity                                    | VDMA24364-B1/B2-L                                                  |
| Cleanroom suitability, measured according to ISO 14644-14 | Class 5 according to ISO 14644-1                                   |
| Ambient temperature                                       | -20 °C...80 °C                                                     |
| Impact energy in the end positions                        | 1 J                                                                |
| Cushioning length                                         | 22 mm                                                              |
| Theoretical force at 6 bar, retracting                    | 990 N                                                              |
| Theoretical force at 6 bar, advancing                     | 1178 N                                                             |
| Moving mass                                               | 865 g                                                              |
| Moving mass at 0 mm stroke                                | 365 g                                                              |
| Additional moving mass per 10 mm stroke                   | 25 g                                                               |
| Product weight                                            | 2230 g                                                             |
| Basic weight with 0 mm stroke                             | 1190 g                                                             |
| Additional weight per 10 mm stroke                        | 52 g                                                               |
| Type of mounting                                          | Alternatively:                                                     |

| Feature                     | Value                                    |
|-----------------------------|------------------------------------------|
|                             | With internal thread<br>With accessories |
| Pneumatic connection        | G1/4                                     |
| Note on materials           | RoHS compliant                           |
| Cover material              | Die-cast aluminum, coated                |
| Piston seal material        | TPE-U(PU)                                |
| Material of piston          | Wrought aluminum alloy                   |
| Piston rod material         | High-alloy steel                         |
| Piston rod wiper material   | TPE-U(PU)                                |
| Buffer seal material        | TPE-U(PU)                                |
| Cushion piston material     | POM                                      |
| Material of cylinder barrel | Wrought aluminum alloy, smooth-anodized  |
| Nut material                | Steel, galvanized                        |
| Material of bearing         | POM                                      |
| Collar nut material         | Galvanized steel                         |
| Tie rod material            | High-alloy steel                         |