

Position switch





Features

- Dimensions and mounting dimensions according to DIN EN 50041
- Compatible with non-Ex DIN limit switches
- Different switching elements

Description

All dimensions and actuating elements of the EEx d position switch correspond to the DIN EN 50041 standard.

Its 30 x 60 mm mounting dimensions make the switch directly compatible to the position switch corresponding to the same DIN standard. The switch is equipped with snap-action contacts with several switching element versions. A microswitch with connection cable type 07-2511 is mounted as switching element.

Different actuators are available for the variety of actuating possibilities. After the removal of four screws these knobs can be rotated by 90 °C allowing so four different directions of actuation.

Gold-plated or gold-nickel contacts are available for the switching of low currents of voltages.

Standard length of the connection cables are 3 m.

BARTEC has designed a very extensive range of EEx e terminal boxes of polyester and aluminium for the connection of the position switch within the EEx area.

Explosion protection

Ex protection type
Ⓔx II 2G EEx d IIC T6
Ⓔx II 2D T 80 °C IP 66

Enclosure
Typ 07-2511

Certification
PTB 00 ATEX 1093 X
IBExU 01 ATEX 1007 X

Ambient temperature
-20 °C to +60 °C
(-55 °C to +90 °C on request)

Technical data

Protection class
IP 66/IEC 60529

■ Electrical data for DIN EN 60947-5-1

Rated operating voltage AC 400 V

Utilisation category

AC-15	2 A	400 V
DC-13	0.15 A	250 V

Isolation voltage 400 V
(further electrical data on request)

■ Electrical data

Nominal current

AC	2 A	400 V
AC	7 A	250 V
DC	0.5 A	250 V

(further electrical data on request)

Ambient temperature +40 °C		
Switching capacity AC		
	ohmic load	inductive load cos φ = 0,6
400 V	3 A	2 A
250 V	5 A	3 A
30 V	7 A	5 A

Switching capacity DC		
	ohmic load	inductive load L/R = 3 µs
250 V	0.4 A	0.03 A
30 V	7 A	5 A

Switching elements
see table

Travels, forces
see table

Max. switching frequency
1 000 h

Mechanical life
max. 10^6 switching cycles depending on plunger operating speed and angle

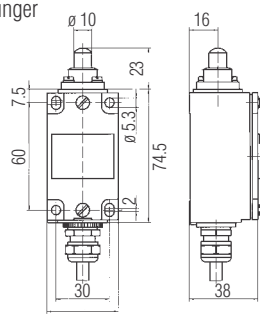
Electrical life
dependent on load

Electrical connection
connection cable HO5VV-F/AO5VV-F

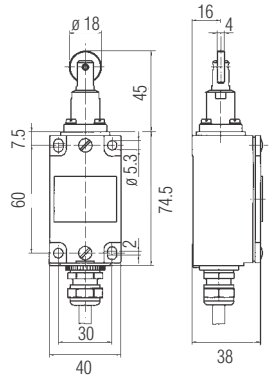
Enclosure material
aluminium or plastic

Dimensions*

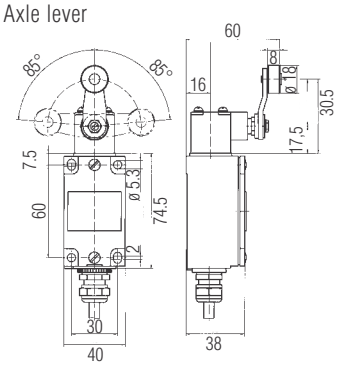
Plunger



Roll lever



Axle lever



Selection chart

Type of contact			Actuators					
Interrupter chamber 1	Interrupter chamber 2	Code no.	Max. operating force	Pretravel	Overtravel	Differential approx.	Max. plunger operating speed	Code no.
(BN) 1 / (BU) 2	—	10	17 N	1 mm	5 mm	0.4 mm	5 m/s	10
(BN) 3 / (BU) 4	—	20						
2 (BU) 4 (BN) / 1 (BK)	—	30						
(BK) 11 / (BK) 12	(BU) 21 / (BN) 22	11	17 N	1 mm	5 mm	0.4 mm	5 m/s	20
(BK) 13 / (BK) 14	(BU) 23 / (BN) 24	22						
(BK) 13 / (BK) 14	(BU) 21 / (BN) 22	21	6 N	10°	70°	4°	5 m/s	30
12 (2) 14 (3) / 11 (1)	22 (5) 24 (6) / 21 (4)	33						
			other actuators on request					

( ) specification for cable tail

Complete order no.
Please enter code number.

07-2911- ☐☐☐☐ / ☐☐

Special versions,
please specify clearly

- gold-plated contacts
- gold-nickel contacts
- different ambient temperature

Length of connection cable
in meters, e.g. code no. **3** = 3 m
please specify greater length in text, plain text code no. **0**

1	**Aluminium enclosure**
2	**Plastic enclosure** (only for contact type 10, 20, 30)

* Dimensions for actuator are reference values

03-0330-0160-10/99-BCS-A129312E