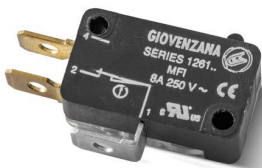


DESCRIPTION

Giovenzana's standard micro switches with self cleaning contacts, supplied with operator, are high-precision, snap action switches and these are the main features for which they are notable:

- Fast and reliable switching largely independent of actuating speed
 - High electrical ratings but small dimensions
 - High repeat accuracy of switching points and forces
 - Low operating force
 - NC positive opening
 - Very long service life
 - Equipped with self cleaning switching contacts in silver alloy
 - Available with the pin plunger or various type of actuation lever.
- Easy adaptation to numerous applications such as joystick, TV game, time recorder, air conditioner, food processor, juice maker, alarm, mixer, shredder machine, ...

We've five lines of micro switches:



MFI series

Micro switches, normalized with self-cleaning contacts including actuating lever with 7 different versions.

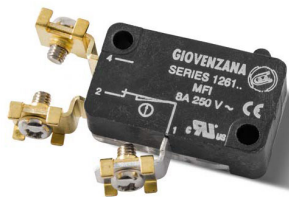
- Faston terminal 6.3 x 0.8



MFI.S series

Micro switches, normalized with self-cleaning contacts including actuating lever with 7 different versions.

- Solder micro switches



MFI.ST series

Micro switches, normalized with self-cleaning contacts including actuating lever with 7 different versions.

- Screw terminal



MFI.STP series

Micro switches, normalized with self-cleaning contacts including actuating lever with 7 different versions.

- Screw terminal and plate protection



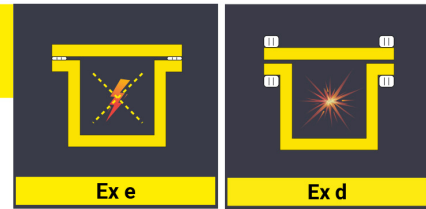
MFI.T

Micro switch with tower actuator



MICROSWITCHES » MFI Ex SERIES

Microswitch components to be used as NO or NC contact for hazardous areas.



GAS

**II 3G Ex dc ec IIB Gc
Zone 2 (Gas)
Class I Division 2 Groups C, D**

FEATURES

- High reliability snap-action operation
- Equipped with self-cleaning silver alloy switch contacts
- Available with pin plunger or different types of actuator lever
- Service Temperature: -20°C ... +89°C



STANDARDS OF REFERENCE

SCHEME IEC

IEC 60079-0, IEC 60079-1, IEC 60079-7, UL121201

CERTIFICATIONS

ATEX, IECEx, EAC-Ex, INMETRO, UL HazLoc



EACEx



DIRECTIVE

ATEX 2014/34/EU

TYPE OF PROTECTION

- Restricted breathing case (Ex "dc ec")

GENERAL CHARACTERISTICS

According to	IEC / EN 61058
Working temperature	-20 °C ... +89 °C North America only -36 °F ... +126 °F
Mechanical life	1 × 10 ⁶ cycles/min
Electrical life	1 × 10 ⁵ cycles/min
Terminal type	Screw terminals

ELECTRICAL CHARACTERISTICS

Rated thermal current I _{th}	8 A
Rated insulated voltage U _i	250 V
Rated impulse withstand voltage U _{imp}	1500 V
Rated operating current I _e	Resistive load: 8 A - 250 V Inductive load: 1A - 250 V
Electric shock protection	Class II
Pollution class	2

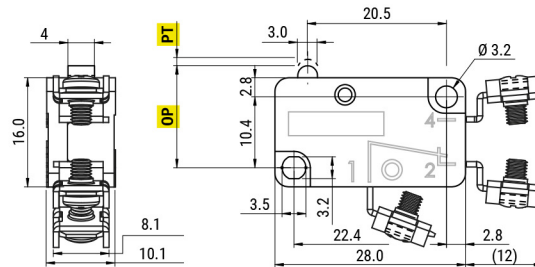
Micro switches with screw terminals



1 NC - 1 NO
SNAP ACTION

MFI.Ex

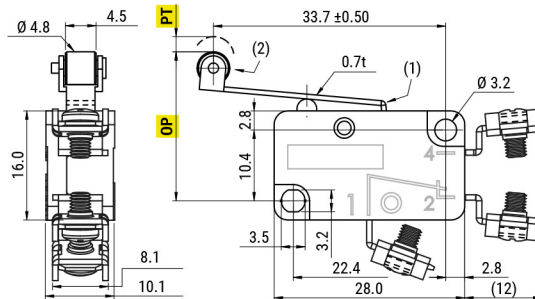
Pin plunger



OF	max 5.1	N
RF	min 1.9	N
PT	max 1.4	mm
OT	min 0.8	mm
OP	14.4 ±0.5	mm

MFI.1Ex

Long roller lever

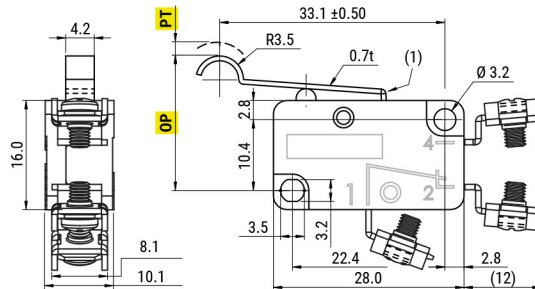


OF	max 3.2	N
RF	min 1.0	N
PT	max 3.3	mm
OT	min 0.8	mm
OP	20.3 ±1.2	mm

(1) Lever in stainless steel
(2) Roller in plastic

MFI.2Ex

Simulated roller lever

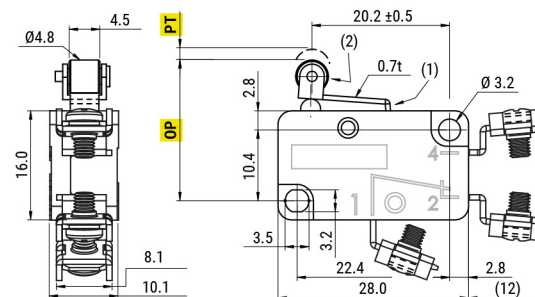


OF	max 3.2	N
RF	min 1.0	N
PT	max 3.3	mm
OT	min 0.8	mm
OP	18.4 ±1.2	mm

(1) Lever in stainless steel

MFI.3Ex

Roller lever

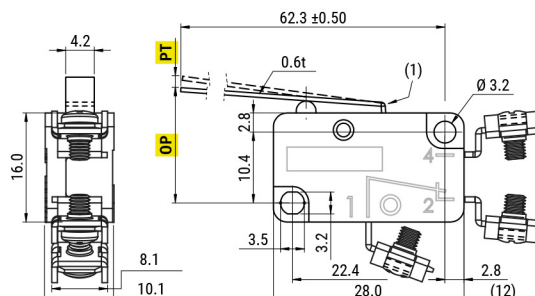


OF	max 5.1	N
RF	min 1.9	N
PT	max 1.4	mm
OT	min 0.6	mm
OP	20.3 ±0.8	mm

(1) Lever in stainless steel
(2) Roller in plastic

MFI.4Ex

Long lever



OF	max 1.3	N
RF	min 0.15	N
PT	max 7.6	mm
OT	min 2.2	mm
OP	15.1 ±2.6	mm

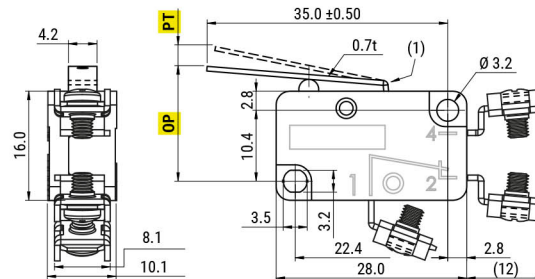
(1) Lever in stainless steel

Micro switches with screw terminals



1 NC - 1 NO
SNAP ACTION

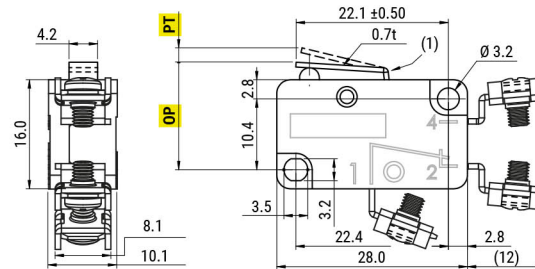
MFI.5Ex
Lever



OF	max 3.2	N
RF	min 1.2	N
PT	max 3.3	mm
OT	min 0.8	mm
OP	15.1 ± 1.2 mm	

(1) Lever in stainless steel

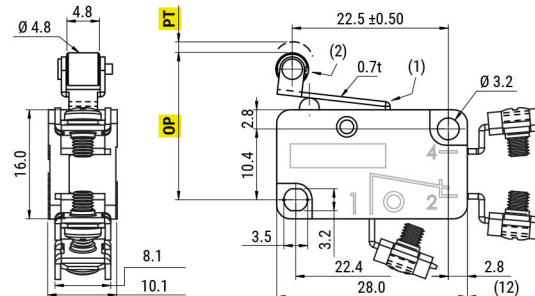
MFI.6Ex
Short lever



OF	max 5.1	N
RF	min 1.9	N
PT	max 1.6	mm
OT	min 0.6	mm
OP	15.1 ± 0.6 mm	

(1) Lever in stainless steel

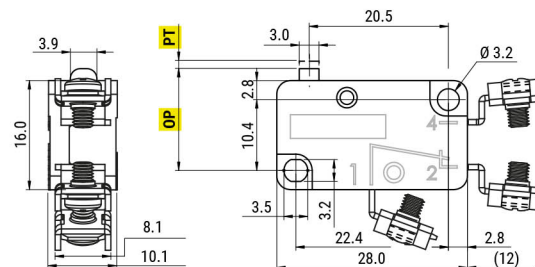
MFI.7Ex
Roller lever L = 16 mm



OF	max 4.5	N
RF	min 1.9	N
PT	max 1.8	mm
OT	min 0.8	mm
OP	21.1 ± 0.6 mm	

(1) Lever in stainless steel
(2) Roller in plastic

MFI.8Ex
Pin plunger 90°



OF	max 5.1	N
RF	min 1.9	N
PT	max 1.4	mm
OT	min 0.8	mm
OP	14.4 ± 0.5 mm	