

83893 plastic solenoid locking switch 838932 2-pole Part number 83893201



- Monitoring of moving guards for machines with a stopping time which is greater than the time taken to access the danger zone
- Locked by removing the voltage, unlocked by applying voltage to the electromagnet
- Plastic heads and bodies
- Heads have 4 possible positions at 90°
- Positive opening contacts

Туре	Type of contacts	Action
83893201 838932 2-pole	NC+NO break before make	Slow action
83893202 838932 2-pole	NC+NO break before make	Slow action
83893203 838932 2-pole	NC+NO break before make	Slow action

Environment

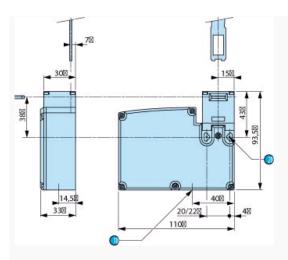
Environment	
Conforming to standards Products	IEC 947-5-1, EN 60 947-5-1, UL 508, CSA C22-2 no.14, JIS C4520 (See P.3/4)
Conforming to standards Machine assemblies	IEC 204-1, EN 60 204-1, EN 1088, EN 292
Certifications	UL, CSA
Protective treatment in normal operation	"TC"
Temperature Use (°C)	-25 →+70
Storage temperature (⁰ C)	-40 →+70
Vibration resistance according to IEC 68-2-6	
Schok resistance according to IEC 28-2-27	
Degree of protection according to IEC 529 and IEC 947-5-1	IP 67
Cable entry	Cable gland 11
Electrical characteristics	
Assigned working characteristics	AC 15 B300 Ue = 240 V, le = 1.5 A or Ue = 120 V, le = 3A, DC 13 Q300 Ue = 250 V, le = 0.27 A or Ue = 125 V, le = 0.55 A
Assigned insulation voltage according to IEC 947-5-1	Ui = 500 V
Assigned insulation voltage according to UL 508, CSA C22-2 no.14	Ui = 300 V
Assigned impulse voltage according to IEC 947-5-1	Uimp = 4 KV
Thermal rating according to IEC 947-5-1	Ithe = 6 A
Electric shock protection Class 2 according to IEC 536	•
Resistance between terminals according to IEC 954-5-4	≤ 30 mΩ
Protection against short circuits	Cartridge fuse 10 A gG (gI)
Connection Screw clamp terminals	•
Clamping capacity with or without ferrule	min. $1 \times 0.5 \text{ mm}^2$, max. 1.5 mm^2
Electrical life according to IEC 947-5-1 appendix C	

Electromagnet supply voltage (50/60 Hz in)

Maximum actuation speed	0,5 m/s
Minimum actuation speed	0,01 m/s
Resistance to removal of key	500 N
Mechanical life (operating cycles)	10 ⁶
Minimun operating frequency (operating cycles per hour)	600
Minimum positive opening force	15 N
Cable entry according to NFC 68 300	1 PG 11
Weight (g)	360

Symbol	Accessories	Code
	Straight key	79214581
	Key with wide fixing bar	79214582
	Short key with wide fixing bar	79214585
	Angled key	79214584
	Flexible key	79214583

Dimension Diagram: 83 893 2



Legend

- 1 threaded hole for cable gland 11
- 2 slots Ø 4.3 x 8.3 fixing centres 22; 2 holes Ø 4.3 fixing centres 20 2

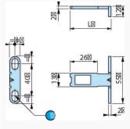
Dimension Diagram : Straight key79 214 581



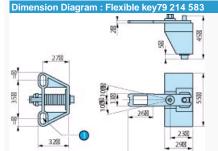
Legend

2 slots Ø 4.7 x 10

Dimension Diagram : Key with wide fixing bar79 214 582 / 585



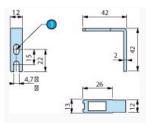
2 slots Ø 4.7 x 10



Legend

2 slots Ø 4.7 x 10

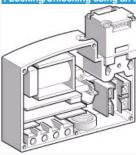
Dimension Diagram : Angled key79 214 584



N° L

1 slot Ø 4.7 x 10

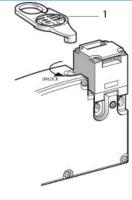
: Locking/Unlocking using an electromagnet



With the guard locked, the force required to remove the key is

In addition to the 2-pole contact element actuated by the key, type 83 893 2 limit switches also have a positive break type element, The "NC" contact is integrated in the machine safety circuit.

: Unlocking using a special tool



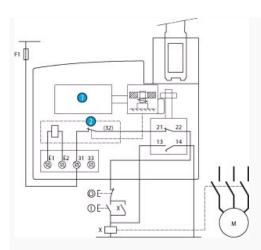
Unlocking using a tool is recommended in the following cases:

- machine maintenance (if the tool is in the "UNLOCK" position and then removed, this will prevent the machine from restarting accidentally, therefore ensuring the safety of maintenance personnel).
- mains failure
- problem with unlocking (locking cannot be released: fail-safe condition). Unlocking by applying power to the electromagnet always takes priority over unlocking using a tool. The "NC" contact is integrated in the machine safety circuit.

The electromagnet for type 83 893 2 safety switches is supplied by an electronic circuit which increases its service life. As the 24 V version is protected by a , an A.C. or D.C. supply can therefore be used. The 120 V and 230 V versions are A.C. only.

It is also protected against voltage surges.

: Category 1 connection according to EN 954-1



Legend

Electromagnet

Nº 1 2 Auxiliary contact

E1-E2: Power supply for electromagnet

13-14: Safety contact for redundancy or signalling