

## Datasheet - AZM 161SK-12/12RI-024-B1

Solenoid interlock / AZM 161I / AZM 161I-B1



(Minor differences between the printed image and the original product may exist!)

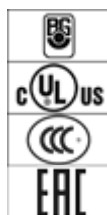
- Compact design
- Interlock with protection against incorrect locking.
- Individual coding
- Coding level "High" according to ISO 14119
- Double-insulated
- High holding force
- Long life
- 130 mm x 90 mm x 30 mm
- 1 Cable entry M 20 x 1.5
- Screw connection
- Manual release from side
- Particularly suitable for sliding doors

### Ordering details

Product type description	AZM 161SK-12/12RI-024-B1
Article number	101213351
EAN Code	4030661396002
eCl@ss	27-27-26-03

### Approval

Approval



### Classification

Standards	EN ISO 13849-1
B10d Normally-closed contact (NC)	2.000.000
Mission time	20 Years
notice	$MTTF_d = \frac{B_{10d}}{0,1 \times n_{op}}$ $n_{op} = \frac{d_{op} \times h_{cp} \times 3600 \text{ s/h}}{t_{cycle}}$

### Global Properties

Permanent light	AZM 161I
Standards	EN 60947-5-1, BG-GS-ET-19
Compliance with the Directives (Y/N)	Yes
Number of actuating directions	3

Active principle	electromechanical
- Individual coding	
- Coding level "High" according to ISO 14119	
Duty cycle	Magnet 100
Materials	
- Material of the housings	glass-fibre reinforced thermoplastic, Plastic self-extinguishing,
- Material of the actuator	Stainless steel
- Material of the contacts	Silver
Housing coating	None
Weight	490

## Mechanical data

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Design of electrical connection	Screw connection
Cable section	
- Min. Cable section	1 x 0,25
- Max. Cable section	1 x 1.5, flexible
Mechanical life	> 1.000.000 operations
notice	All indications about the cable section are including the conductor ferrules.
Emergency unlocking device (Y/N)	No
Manual release (Y/N)	Yes
Emergency release (Y/N)	No
Latching force	30
Positive break force	20
positive break travel	10
Clamping force	2000
Max. Actuating speed	2
Minimum actuating radius	150
Actuating frequency	1000 /

## Ambient conditions

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Ambient temperature	
- Min. environmental temperature	-25
- Max. environmental temperature	+60
Protection class	IP67 to IEC/EN 60529

## Electrical data

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Design of control element	Normally open contact (NO), Opener (NC)
Switching principle	Creep circuit element
Number of auxiliary contacts	2
Number of safety contacts	4
Power to unlock	Yes
Power to lock	No
Rated control voltage	24 V/DC
Power consumption	10
Rated impulse withstand voltage	4
Rated insulation voltage	250
Thermal test current	6 A
Utilisation category	AC-15: 230 V / 4 A DC-13: 24 V / 2,5 A
Max. fuse rating	6 A gG D-fuse To DIN EN 60269-1

## ATEX

Explosion protection categories for gases	None
Explosion protected category for dusts	None

## Miscellaneous data

Applications



sliding safety guard,



removable guard,



hinged safety guard

## Dimensions

Dimensions of the sensor

- Width of sensor	130
- Height of sensor	90
- Length of sensor	30

## notice

On hinged guards, minimum actuating radius at 90° to the plane of the actuator 180 mm  
minimum actuating radius on hinged guards in line with the plane of the actuator 150 mm

**The actuator is not available separately.**

The axis of the hinge should be 5 mm above the top edge of the safety switch and in the same plane

Manual release

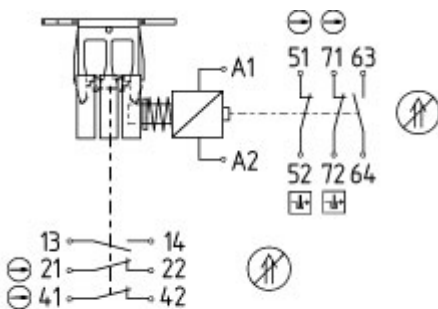
- For manual release using M5 triangular key, available as accessory
- For maintenance, installation, etc.

## Included in delivery

Included in delivery

- Individually coded actuator
- tamperproof screws
- Slot sealing plugs

## Diagram






13	14	21	22	41	42	51	52	63	64	71	72	A1	A2
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Note Diagram

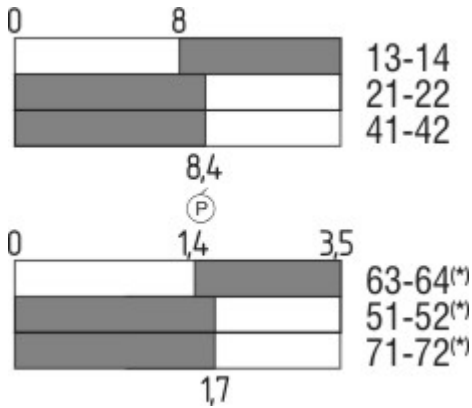
positive break NC contact

active






-  no active
-  Normally-open contact
-  Normally-closed contact

## Switch travel diagram

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Notes Switch travel diagram

-  Contact closed
-  Contact open
-  Setting range
-  Break point
-  Positive opening sequence/- angle
- VS** adjustable range of NO contact
- VÖ** adjustable range of NC contact
- N** after travel

## Ordering suffix

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The applicable ordering suffix is added at the end of the part number of the safety switch.  
Order example: AZM 161SK-12/12RI-024-B1-**1637**

...-**1637**

0,3 µm gold-plated contacts

## Documents

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**Operating instructions and Declaration of conformity** (en) 574 kB, 16.11.2017

Code: mrl\_azm161i\_en

**Operating instructions and Declaration of conformity** (jp) 767 kB, 12.04.2016

Code: mrl\_azm161i\_jp

**Operating instructions and Declaration of conformity** (nl) 620 kB, 29.11.2017

Code: mrl\_azm161i\_nl

**Operating instructions and Declaration of conformity** (da) 618 kB, 21.11.2017

Code: mrl\_azm161i\_da

**Operating instructions and Declaration of conformity** (de) 577 kB, 16.11.2017

Code: mrl\_azm161i\_de

**Operating instructions and Declaration of conformity** (pl) 648 kB, 29.11.2017

Code: mrl\_azm161i\_pl

**Operating instructions and Declaration of conformity (es)** 617 kB, 23.11.2017

Code: mrl\_azm161i\_es

**Operating instructions and Declaration of conformity (pt)** 623 kB, 29.11.2017

Code: mrl\_azm161i\_pt

**Operating instructions and Declaration of conformity (sv)** 619 kB, 29.11.2017

Code: mrl\_azm161i\_sv

**Operating instructions and Declaration of conformity (cs)** 640 kB, 21.11.2017

Code: mrl\_azm161i\_cs

**Operating instructions and Declaration of conformity (it)** 618 kB, 29.11.2017

Code: mrl\_azm161i\_it

**Operating instructions and Declaration of conformity (fr)** 624 kB, 23.11.2017

Code: mrl\_azm161i\_fr

**EAC certification (ru)** 809 kB, 05.10.2015

Code: q\_6040p17\_ru

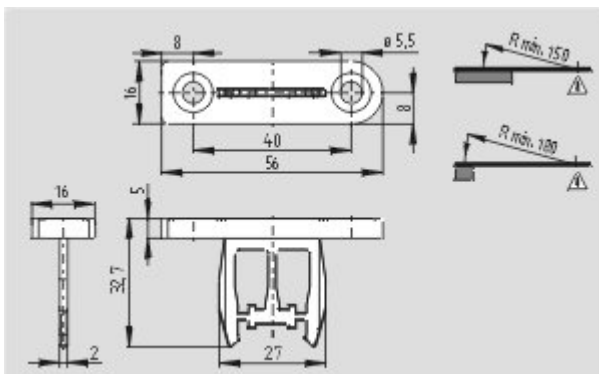
## Images

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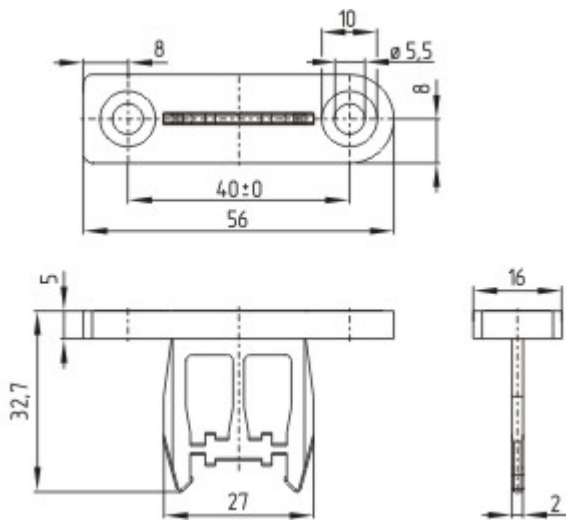
Product photo

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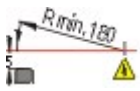
Dimensional drawing (miscellaneous)

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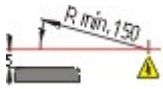
Dimensional drawing (miscellaneous)

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Actuating radius

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Actuating radius

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The data and values have been checked thoroughly. Technical modifications and errors excepted.

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