

Stopped Motion Units

Description

The Stopped Motion Unit (SMU) is used in applications that require the detection of stopped motion of mechanical parts of a machine. The SMU uses inductive proximity sensors to detect motion and the CU2 control unit to monitor the sensors.

The CU2 requires a PNP and an NPN output type proximity sensors. When the proximity sensors stop detecting movement, the CU2 activates its output, powering an internal solenoid. With the solenoid energized, one or two trapped keys can be removed from the SMU.

The removable trapped keys (one or two) can be used to continue the next sequence in allowing access to the hazardous area.

See the CU2 control unit for details on setting the delay time.

Additional proximity sensors can be found in the Sensors catalog.



Features

- Stopped motion detection
- NPN and PNP proximity sensors
- Timed-delay output up to 40 minutes
- Category 1 Stop
- Replaceable code barrel assembly

The Prosafe Advantage



Stainless steel construction.

Specifications

Safety Ratings

Standards	EN1954-1, IEC/EN60204-1, EN1088, IEC/EN60947-5-1, ISO13849-1, ISO12100-1&2, ISO14119, GS-ET-19, AS4024.1
Category	Cat. 3 per EN 954-1 (ISO 13849-1)
Certifications	CE Marked for all applicable directives and BG

Operating Characteristics

Electrical Life	100,000 operations
Mechanical Life	100,000 operations
Solenoid Voltage	24V DC, 110V AC, and 230V AC
Time Delay	0.1 s...40 min
Zero Speed Sensors	2x inductive sensors

Environmental & Physical Characteristics

Operating Temperature [C (F)]	0...40° (32...104°)
Relative Humidity	95%
Shear Force to Key	15.1 k•N (3398 lbs)
Torque to Key	14 N•m (124 lb•in)
Material	Trapped key components: 316L stainless steel Face plate: 316L stainless steel Optional box: ABS plastic or stainless steel Inductive sensors: stainless steel barrel, plastic face
Mounting	Tamper resistant screws
Weight	2.0 kg (4.4 lbs)

Product Selection

Type	Solenoid Voltage	Contact Set 1	Contact Set 2	Cat. No.
Single key out Panel mounted	24V DC	3 N.O. 40 A	1 N.O. 20 A	440T-MSMSE10*
		2 N.O. 20 A	1 N.C. 20 A	440T-MSMSE11*
	110V AC	3 N.O. 40 A	1 N.O. 20 A	440T-MSMSE20*
		2 N.O. 20 A	1 N.C. 20 A	440T-MSMSE22*
	230V AC	3 N.O. 40 A	1 N.O. 20 A	440T-MSMSE30*
		2 N.O. 20 A	1 N.C. 20 A	440T-MSMSE33*
Dual key out Panel mounted	24V DC	3 N.O. 40 A	1 N.O. 20 A	440T-MDMSE10* *
		2 N.O. 20 A	1 N.C. 20 A	440T-MDMSE11* *
	110V AC	3 N.O. 40 A	1 N.O. 20 A	440T-MDMSE20* *
		2 N.O. 20 A	1 N.C. 20 A	440T-MDMSE22* *
	230V AC	3 N.O. 40 A	1 N.O. 20 A	440T-MDMSE30* *
		2 N.O. 20 A	1 N.C. 20 A	440T-MDMSE33* *

* Substitute the desired primary code for this symbol (key not included). See **Key Coding** for code selection.

Accessories

Description	Size [mm]	Type	Additional Information	Cat. No.
Stainless steel key	—	—	Accessories	440T-AKEYE10*
Stainless steel replacement code barrel with dust cap	—	—		440T-ASCBE14*
Stainless steel weatherproof replacement dust cap	—	—		440T-ASFCE10*
500 mA fuse—Bussmann Cat. No. ETF-500 mA	—	500 mA @ 250V	NA	440R-A31562
Optional plastic enclosure	—	—	For use with 20 A units	440T-AIPB20
			For use with 40 A units	440T-AIPB23
Optional stainless steel enclosure	—	—	For use with all units	440T-AIPB46
Inductive Proximity Sensor, Three-wire, DC	12	NPN	Accessories	872C-D3NN12-E2
		PNP		872C-D3NP12-E2
	18	NPN		872C-D5NN18-E2
		PNP		872C-D5NP18-E2
	30	NPN		872C-D10NN30-E2
		PNP		872C-D10NP30-E2

* Substitute the desired primary code for this symbol (key not included). See **Key Coding** for code selection.

Approximate Dimensions

Dimensions are shown in mm (in.). Dimensions are not intended to be used for installation purposes.



