

Safety switches



Emergency stop switches

The emergency stop switch (**SG-E1 series**) is equipped with push-to-lock and turn-to-reset functionality. For use as an emergency shutoff in the semiconductor industry, models adhering to SEMI standards (EMO) are also available.

- Push to lock, turn to reset
- Compatible with section 12.1 of the SEMI standards (S2 0706)



Grip switches

The grip switch (**SG-C1 series**) allows safe operation of a machine when the operator is present in a hazardous area. With three grip positions and multiple operating patterns, the grip switch can be used in many different applications.

- Solid tactile feedback
- Three switch positions
- Multiple operating patterns



Safety door switches / Key selector switches

These products feature key-based operation for worker protection in larger areas that could be hazardous. The safety door switch (**SG-B2 series**) and the key selector switch (**SG-D1 series**) can be used in tandem to add multiple layers of protection.

- One key operates both series
- Prevents workers from being trapped

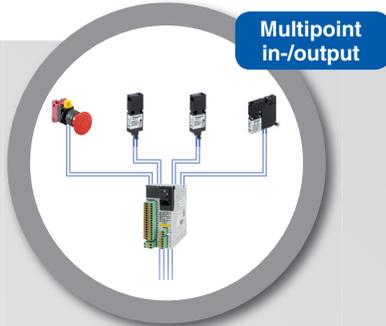


Safety door switches

The Panasonic safety door switches (**SG-B1 / SG-A1**) are among the world's thinnest. The **SG-B1 series** features a solenoid interlock and five built-in contacts. The **SG-A1 series** safety door switch contains three built-in contacts.

- **SG-B1 series:** Solenoid interlock with 5 built-in contacts;
- Low current consumption (110mA at 24VDC)
- **SG-A1 series:** 3 Built-In contacts
- Thin design (15mm thickness)

Safety control unit SF-C21



**Multipoint
in-/output**



Small



**Easy
operation**



**Easy
customization**

Space-saving and easy to wire

- One SF-C21 can do the work of four safety relay units. Input: 10 points / Output: 8 points
- Compact size (height 97 mm × width 45 mm)

Absolutely no programming skills required

- Eight preset logics, safety-certified and compatible to control category 4 PLe
- The OFF delay time can be easily set by turning the rotary switch
- Password protection prevents inadvertent to the logic changes

Application-based customization

- Easy to create reliable safety circuit
- Configurator SF-C software to build own safety circuits

Easy to monitor status with a PLC

- Four auxiliary outputs are provided
- RS-485 communications (MODBUS RTU)

Please note: We also offer the safety control unit SF-C10 series, which is ideal for controlling Panasonic's safety light curtain, because its connectors make wiring easier.

Specifications											
Safety standards	IEC 61508-1 to 7, EN 61508-1 to 7(SIL3), ISO 13849-1 (up to Category 4, PLe), IEC 61131-2, IEC 61010-2-201, IEC 62061(SILCL3), UL 61010-1, UL 61010-2-201										
EMC standards	IEC 61000-6-2, IEC 61326-3-1, EN 55011										
Related standards	IEC 60947-1, IEC 60947-5-1, IEC 60947-5-2, IEC 60947-5-5, IEC 60947-5-8, IEC 61496-1, IEC TS 62046, ISO 13851										
Safety input	2 × 4 inputs (ON - OFF max. 0.7ms; OFF - ON max. 10ms)										
Safety control output	PNP open-collector transistor with 2 outputs × 2 (ON - OFF max. 10ms; OFF - ON max. 100ms)										
Auxiliary output	PNP open-collector transistor with 1 output × 4 (Any of the auxiliary outputs can be customized using the software tool)										
Logic selection function	<table border="0"> <tr> <td>No. 0: Customization control</td> <td>No. 1: Overall stop control</td> </tr> <tr> <td>No. 2: Parallel muting control</td> <td>No. 3: Sequential muting control</td> </tr> <tr> <td>No. 4: Partial stop control 1</td> <td>No. 5: Partial stop control 2</td> </tr> <tr> <td>No. 6: Two-hand control</td> <td>No. 7: OR control</td> </tr> <tr> <td>No. 8: Operation mode selection control</td> <td></td> </tr> </table>	No. 0: Customization control	No. 1: Overall stop control	No. 2: Parallel muting control	No. 3: Sequential muting control	No. 4: Partial stop control 1	No. 5: Partial stop control 2	No. 6: Two-hand control	No. 7: OR control	No. 8: Operation mode selection control	
No. 0: Customization control	No. 1: Overall stop control										
No. 2: Parallel muting control	No. 3: Sequential muting control										
No. 4: Partial stop control 1	No. 5: Partial stop control 2										
No. 6: Two-hand control	No. 7: OR control										
No. 8: Operation mode selection control											
Communication	RS-485: Detachable spring-cage terminal block, USB: Mini-B male										

Panasonic®

Panasonic Electric Works Europe AG

Rudolf-Diesel-Ring 2 • 83607 Holzkirchen
Tel: +49 (0) 8024 648-0 • Fax: +49 (0) 8024 648-111
e-mail: info.peweu@eu.panasonic.com
www.panasonic-electric-works.com

Your distributor:

