



# ZELUS

## ENABLING/OPERATIONAL UNIT

# Safety solutions from a single source

Years of experience, innovative products, concentrated know-how  
in the area of machine safety



The technical and normative requirements for safety technology in robotics and automation are becoming increasingly complex. Consequently, implementation of safety solutions is often unnecessarily complicated. At SSP we think differently: We want to make the safety technology applications again as simple as possible and have committed ourselves to the 'We Simplify Safety' mission. However, with this commission just to modify or improve existing products is not enough: We wanted to reinvent the 'safety wheel', so to speak. In the form of a comprehensive, coordinated product range, which offers everything from a single source: from safety fences and sensors to control technology and safety services.

In order to achieve this aim, a dynamic team of engineers and technicians works daily on developing products and solutions. With our partners Fortress Interlocks and ReeR we complete our product range with two outstanding specialists from the respective disciplines. Competent service and distribution partners are available worldwide.

**we simplify safety**

# ZEUS



## Enabling - ergonomic and safe

If it is necessary to provide the operator a special operating mode for work such as commissioning, maintenance, repair or process set-up, important legal requirements must be observed.

The enabling mode has proven effective. In this operating mode, the machine operator has the option to bypass certain safety devices, like safety doors, by selecting the operating mode and actuating the enabling unit.

The important point here is the three-level function. The enabling unit allows certain hazardous movements only in the middle position and with additional precautions. If the operator releases the unit or pushes it into the Level 3, the system switches off for safety.

ZEUS guarantees a fatigue-free work thanks to its ergonomic design and low weight. It is suitable for left-handed or right-handed operators and easy to operate even when wearing gloves.

# Technical Information

## Important features

- Ergonomic design
- Dimensions 186 × 70 mm  
(without mounting bracket and emergency stop switch)
- Robust housing in IP65 and IP67
- Modular design
- Standard delivery of 10 m connection cable  
(stop switch configurations with M12 8-pole plug)
- Individual connection via terminal block

## Additional functions

- Operation of up to 120 axes/functions
- Extended LED diagnosis
- Increased protection against manipulation
- in-hand sensor (hand detection)
- "Operation monitoring" with activity sensor
- Rocker/function button
- Large selection of plug connectors



### Information

Please observe following requirements during configuration of your enabling switch:  
The emergency stop switch cannot be configured with a plug connector acc. to EN ISO 13850.

## Model code

**ZEUS 11-15 15 31**

### Emergency stop/stop switch

- 0 no emergency stop switch
- 1 with emergency stop switch
- 2 with stop switch

### Connection

- 1 internal wiring

### Diagnosis

- 0 no LED
- 1 red/green LED
- 2 green/green LED (on request)
- 3 red/red LED (on request)

### Control keys

- 0 no Button
- 1 button front
- 2 button top
- 3 button front and top
- 4 rocker button
- 5 button front and rocker button

## Online configurator

Configure your individual ZEUS on our website!

[www.safety-products.de](http://www.safety-products.de)



## Enabling/operational unit with control functions

Denomination	Item	Item Number
ZEUS 00-00 05 00	enabling switch, 10 m cable	SP-X-85-900-01
ZEUS 01-00 00 00	enabling switch, individual wiring	SP-X-85-900-02
ZEUS 00-00 01 00	enabling switch, spiral cable 0.5 m/2.5 m	SP-X-85-900-03
ZEUS 00-11 11 00	enabling switch, 1 control key, spiral cable 0.5 m/2.5 m	SP-X-85-900-04
ZEUS 00-13 11 00	enabling switch, 2 control keys, spiral cable 0.5 m/2.5 m	SP-X-85-900-05
ZEUS 11-13 15 30	enabling switch, 2 control keys, sensor function, 10 m cable	SP-X-85-900-06
ZEUS 10-00 05 00	enabling switch, emergency stop switch, 10 m cable	SP-X-85-900-07
ZEUS 11-00 00 00	enabling switch, emergency stop button individual wiring	SP-X-85-900-08
ZEUS 11-14 15 31	enabling switch, emergency stop switch, control and sensor function, 10 m line	SP-X-85-900-09
ZEUS 20-00 07 00	enabling switch, stop switch black, M12 8-pole plug	SP-X-85-900-11
ZEUS 21-00 00 00	enabling switch, stop switch black, individual wiring	SP-X-85-900-12

\*additional configurations are available on request.

## ZEUS equipment

Denomination	Item	Item Number
ZEUS H	Holding bracket for ZEUS with holding hook	SP-X-85-800-00
ZEUS H2	Holding bracket for mounting on aluminium profiles	SP-X-85-800-10
ZEUS ZHS	Additional hook set with separate holding hook	SP-X-85-801-00
SP UH-K	Universal hook	SP-X-45-030-20

## Safe Control Technology

Denomination	Item	Item Number
Safety relay S2	Standard safety relay - 1 safety function	SP-K-70-001-00
Safety relay T2	Time delay safety relay - 1 safety function	SP-K-70-001-02
Safety relay X2	Multi function safety relay - 2 safety functions	SP-K-70-001-03
Safety Simplifier	Safety PLC with wireless communication	→ Online Configurator

Base plate	Wiring	Sensor functions	Control functions
0 base plate without bracket	0 no connection line	0 no function (bottom)	0 no function (top)
1 base plate with bracket	1 spiral line 0,5 m/2,5 m	1 activity sensor	1 32 control functions
	2 spiral line 1 m/5 m	3 in-hand- and activity sensor	2 120 control functions
	4 connection line 5 m		
	5 connection line 10 m		
	6 M12 5-pin connector		
	7 M12 8-pin connector		
	8 M12 12-pin connector		
	9 M23 12-pin connector		
	B special item		

# Individual selection, control and detection

Maximum operating comfort and reliable protection against manipulation



Control functions



Support bracket & spiral cable



Hand detection with in-hand sensor

With the operating terminal ZEUS enabling/operational unit, up to 120 functions can be triggered in the binary-coded, such as axes, valves or grippers. The seven-segment display integrated in the interface indicates the selected function and makes the operation easier for you. The extended LED diagnosis provides you a helpful feedback.

The in-hand sensor provides protection against manipulation; it detects the operators hand and reliably protects against bypass or other manipulations. The ZEUS enabling/operational unit detects via activity sensor when it is removed from the support bracket. Only then it is switched into the special operating mode. This makes sure that no unwanted operation errors occur.

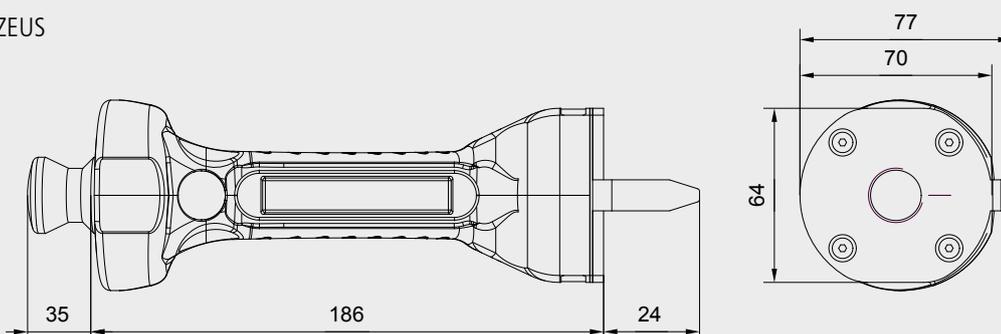
The ZEUS enabling/operational unit can be integrated easily into your system thanks to the universal connection via a plug, cable or terminal.



Fully equipped ZEUS

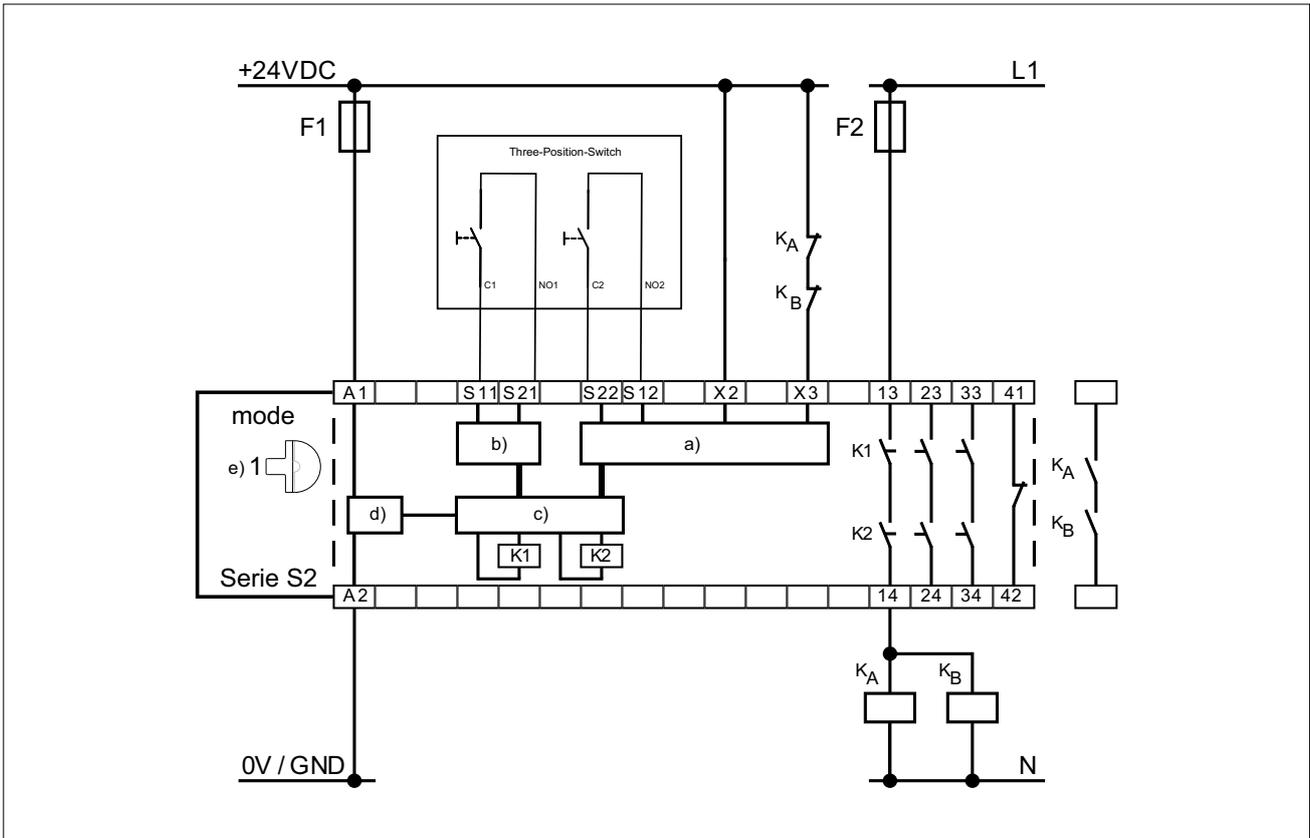
## Dimensioning

ZEUS

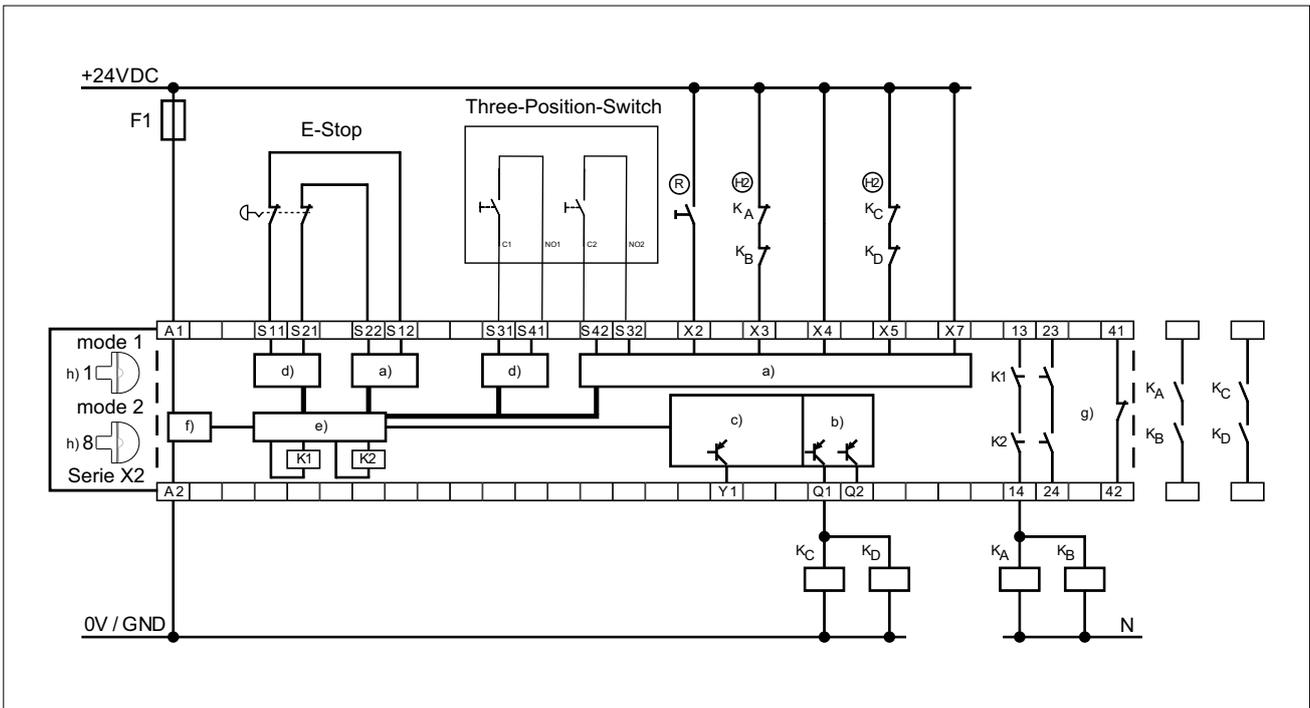


# Wiring examples

## Wiring with SSP safety relay S2 series



## Wiring with SSP safety relay X2 series





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#### **INTERNATIONAL PARTNERS**

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**Find them on our website**

[www.safety-products.de](http://www.safety-products.de)



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