

# Flexi Classic

Efficient and easy-to-use safety controller







#### Technical data overview

Safety level	PL e, SIL 3
Configuration method	Via rotary switch / hard wired (depending on type)
System construction	Modular 1 main module 0 11 expansion modules 0 8 relay modules 0 1 gateways
Fieldbus, industrial network	EtherNet/IP™, Modbus, PROFINET, PROFIBUS DP, CANopen, DeviceNet™ (depending on type)
Safe networking	Global emergency stop
Safe series connection with Flexi Loop	Flexi Loop

#### **Product description**

The Flexi Classic modular safety controller enables straightforward configuration without any software. This allows the user to adapt the logic evaluation settings to the requirements of the application concerned. Logic functions are configured through rotary switches. These switches are located directly on the modules, enabling quick and easy commissioning. Communication between the individual modules is achieved via an internal bus, providing users interface information about the diagnostics of the safety system. The product portfolio includes gateways, which have no influence on the adjusted logic and are used for connection to a higher-level, non-safe control. The gateways collect and forward the information of the system, ensuring quick diagnostics. The Flexi Classic also offers the Flexi Classic configurator tool as a configuration aid to provide a wiring diagram for the created project. Special modules for muting complete this product family, which provides efficient solutions for a whole host of applications.

### At a glance

- · Rotary switch for easy function adjustment
- · Modular extension possible
- · Direct wiring for all types of sensors
- · Logic functions: AND, OR, muting, bypass, reset, EDM
- · Integration into all common fieldbuses
- Integration of the Flexi Loop safe series connection
- · Special muting modules are able to meet all the requirements of a demanding muting application

#### Your benefits

- The optimal scalability thanks to the modular construction prevents redundant inputs and outputs as well as reducing hardware
- Configuration via rotary switch simplifies logic configuration
- Flexi Classic configurator tool offers easy logic configuration and wiring help
- Complete diagnostics for the system, preventing unplanned downtime
- The compact design enables significant reduction of the control cabinet width
- · Significantly reduced wiring compared with conventional safety solutions. Wiring with Flexi Loop is even easier.

#### Fields of application

- · Machines with simple to medium safety logic
- Safety-relevant applications for a variety of industries, e.g. electronics, robotics, packaging, logistics and automotive

## Ordering information

Other models and accessories → www.sick.com/Flexi\_Classic

- Flexi Classic CPU
- Main modules
- Applications: Universal

Inputs	Number of mut- ing sensors	Outputs	Delay time (out- puts Q3/Q4)	Connection type	Туре	Part no.
4 safety inputs 4 switching inputs	0/2	4 safety outputs 2 test outputs	-	Plug-in screw- type terminals	UE410-MU3T0	6035242
				Plug-in spring terminals	UE410-MU4T0	6035243
			0 s 5 s	Plug-in screw- type terminals	UE410-MU3T5	6026136
				Plug-in spring terminals	UE410-MU4T5	6032669
			0 s 50 s	Plug-in screw- type terminals	UE410-MU3T50	6026137
				Plug-in spring terminals	UE410-MU4T50	6032670
		0 s 300 s	Plug-in screw- type terminals	UE410-MU3T300	6026138	
			Plug-in spring terminals	UE410-MU4T300	6032671	

- Flexi Classic CPU
- Main modules
- Applications: Muting experts

Inputs	Number of mut- ing sensors	Outputs	Connection type	Туре	Part no.
2 safety inputs 2 switching inputs	2 / 4	2 safety outputs 2 test outputs	Plug-in screw- type terminals	UE410-MM3	6034482
4 muting inputs		2 application diagnostic outputs	Plug-in spring terminals	UE410-MM4	6034645

- Flexi Classic CPU
- Main modules
- Applications: global emergency stop

Inputs	Outputs	Connection type	Туре	Part no.
4 safety inputs	1 safety output	Plug-in screw-type terminals	UE410-GU3	1072177
2 switching inputs 2 inputs for the global emergency stop function	2 test outputs 1 diagnostic output 2 outputs for the global emergency stop function	Plug-in spring terminals	UE410-GU4	1094339

# Flexi Classic

- Flexi Classic I/O
- I/O modules
- Applications: Universal

Inputs	Number of mut- ing sensors	Outputs	Delay time (out- puts Q3/Q4)	Connection type	Туре	Part no.							
4 safety inputs 4 switching inputs	0/2	4 safety outputs 2 test outputs	-	Plug-in screw- type terminals	UE410-XU3T0	6035244							
				Plug-in spring terminals	UE410-XU4T0	6035245							
			0 s 5 s	Plug-in screw- type terminals	UE410-XU3T5	6032470							
											Plug-in spring terminals	UE410-XU4T5	6032672
							0 s 50 s	Plug-in screw- type terminals	UE410-XU3T50	6032471			
				Plug-in spring terminals	UE410-XU4T50	6032673							
									0 s 300 s	Plug-in screw- type terminals	UE410-XU3T300	6032472	
				Plug-in spring terminals	UE410-XU4T300	6032674							
8 safety inputs	8 safety inputs – 8 test outputs	8 test outputs	-	Plug-in screw- type terminals	UE410-8DI3	6026139							
			Plug-in spring terminals	UE410-8DI4	6032675								

- Flexi Classic I/O
- I/O modules
- **Applications:** Muting experts

Inputs	Number of mut- ing sensors	Outputs	Connection type	Туре	Part no.
2 safety inputs 2 switching inputs	2/4	2 safety outputs 2 test outputs	Plug-in screw- type terminals	UE410-XM3	6034483
4 muting inputs		2 application di- agnostic outputs	Plug-in spring terminals	UE410-XM4	6034646
3 switching inputs	+	-	Plug-in screw- type terminals	UE410-MDI3	6034484
			Plug-in spring terminals	UE410-MDI4	6034647

- Flexi Classic Gateway
- Gateways

Fieldbus, indus- trial network	Connection type	Number of ap- plication diag- nostic outputs	Application di- agnostic output connection type8	Туре	Part no.
EtherNet/IP™	2 x female con- nector, RJ-45	4	Plug-in screw- type terminals	UE410-EN1	1042964
Modbus <sup>®</sup> TCP	2 x female con- nector, RJ-45	4	Plug-in screw- type terminals	UE410-EN3	1042193
PROFINET	2 x female con- nector, RJ-45	4	Plug-in screw- type terminals	UE410-EN4	1044078

Fieldbus, indus- trial network	Connection type	Number of ap- plication diag- nostic outputs	Application di- agnostic output connection type8	Туре	Part no.
PROFIBUS DP	1 x female connector, D-Sub, 9-pin	4	Plug-in screw- type terminals	UE410-PR03	6028407
			Plug-in spring terminals	UE410-PR04	6032678
CANopen	1 x female connector, Open Style, 5-pin	4	Plug-in screw- type terminals	UE410-CAN3	6033111
			Plug-in spring terminals	UE410-CAN4	6033112
DeviceNet™	DeviceNet <sup>TM</sup> 1 x female connector, Open Style, 5-pin	4	Plug-in screw- type terminals	UE410-DEV3	6032469
			Plug-in spring terminals	UE410-DEV4	6032679

## • Relay modules

Number of enable cur- rent contacts	Number of signaling cur- rent paths	Number of signaling cur- rent contacts	Connection type	Protective coating	Туре	Part no.	
2	1	1	1	Plug-in screw- type terminals	-	UE410-2R03	6026144
			Plug-in spring	-	UE410-2R04	6032677	
			terminals	✓	UE410-2R0401	1118380	
4	2	2 2	Plug-in screw- type terminals	-	UE410-4R03	6026143	
			Plug-in spring	-	UE410-4R04	6032676	
		terminals	✓	UE410-4R0401	6053182		

# SICK AT A GLANCE

SICK is one of the leading manufacturers of intelligent sensors and sensor solutions for industrial applications. A unique range of products and services creates the perfect basis for controlling processes securely and efficiently, protecting individuals from accidents and preventing damage to the environment.

We have extensive experience in a wide range of industries and understand their processes and requirements. With intelligent sensors, we can deliver exactly what our customers need. In application centers in Europe, Asia and North America, system solutions are tested and optimized in accordance with customer specifications. All this makes us a reliable supplier and development partner.

Comprehensive services complete our offering: SICK LifeTime Services provide support throughout the machine life cycle and ensure safety and productivity.

For us, that is "Sensor Intelligence."

# **WORLDWIDE PRESENCE:**

Contacts and other locations -www.sick.com

