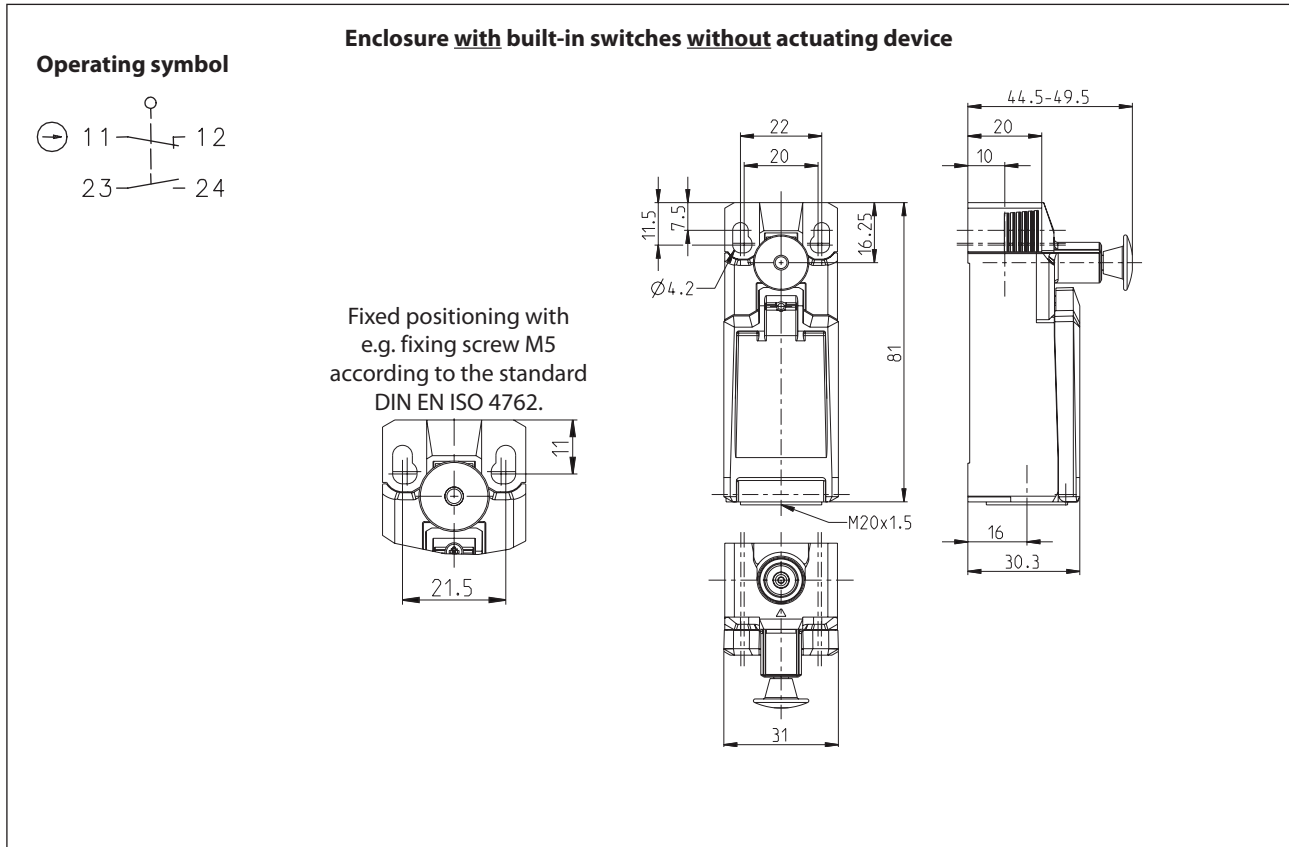


**Plastic bodied limit switch**  
Series I81-modular system

Description **I81-U1Z M20**

Article number **6083000315**



Electrical Data		
Rated insulation voltage	$U_i$	400 V
Rated impulse withstand voltage	$U_{imp}$	4 kV
Rated operational voltage	$U_e$	240 V AC / 24 V DC
Rated supply frequency AC		50 / 60 Hz
Overvoltage category		II acc. EN 60947-1 annex H table H1
Conv. thermal current	$I_{the}$	5 A
Minimum current		1 mA
Utilization category		AC 15, $U_e/I_e$ 240 V / 3 A DC 13, $U_e/I_e$ 24 V / 1,5 A
Direct opening action	$\ominus$	acc. IEC/EN 60947-5-1, annex K
Short-circuit protective device		Fuse 4 A gG
Rated conditional short-circuit current		400 A
Max. contact resistance		25 mOhm (unused)

Mechanical data	
Enclosure	Thermoplastic, glass fibre reinforced (UL 94-V0)
Cover	Thermoplastic, glass fibre reinforced (UL 94-V0)
Reset facility	pull blue RESET - button
Actuating force	$F_B$ 10 N $\leq F_B \leq$ 30 N
Operating temperature	-30 °C ... +75 °C
Storage temperature	-40 °C ... +80 °C
Protection type	IP66 / IP67 acc. EN 60529
Pollution degree (built-in switch)	3
Contact material	silver
Device Class (built-in switch)	Category E (MC3+CC2+SC1) acc. EN 60947-1 annex Q
Contact type	1 N.C. (Form Zb), 1 N.O.
Isolating distance	4 mm (2x2 mm)
Operating rate	$V$ 0,06 m/min $\leq V \leq$ 30 m/min
Bounce duration	ms The value depends on the operating rate.
Switchover time	ms The value depends on the operating rate.
Switching frequency	$\leq$ 60 / min.
Mechanical life	1 x 10 <sup>5</sup> operating cycles
Mission time	$\leq$ 20 years
Connection	4 screw connections (M3)
Conductor cross-sections	Solid or Litz wire with ferrules 0,34 mm <sup>2</sup> - 1,5 mm <sup>2</sup> ; AWG 22-16
Cable entrance	1 x M20 x1,5
Weight	$\approx$ 0,06 kg
Installation position	operator definable

ID for safety engineering	
B10d N.C.	2 x 10 <sup>5</sup> cycles
B10d N.O.	1 x 10 <sup>5</sup> cycles

Standards	
	DIN EN 60947-5-1
	UL 508 / CSA C22.2 No.14
	DIN EN ISO 13849-1

EC Conformity	
	acc. to directive 2006/42/EC (Safety-of-Machinery-Directive)

Approvals	
	CCC (AC 15, U <sub>e</sub> /I <sub>e</sub> 240 V / 1,5 A; DC 13, U <sub>e</sub> /I <sub>e</sub> 24 V / 1,5 A)
	cCSA <sub>US</sub> B300, 240Vac 1.5A G.P., 24Vdc 1.5A R. Enclosure Type 4X

Notes	
The degree of protection (IP code) specified applies solely to a property closed cover, the use of an equivalent cable gland with adequate cable and mounted actuating device.	
The information on the switching travel can be found in the data sheets of the actuator, as these depend on the actuator used.	
Approvals / properties applies only to the fully assembled device.	