## ABR1E112F

input interface module - 17.5 mm - electromechanical - 110..127 V DC - 1 NO





#### Main

Range of product	Interface for discrete signals
Product or component type	Electromechanical input interface module
Contacts type and composition	1 NO
[Uc] control circuit voltage	110127 V
Control circuit type	DC
Width pitch dimension	17.5 mm
Maximum [In] rated current	15 mA DC
Reverse polarity protection	With
Short-circuit protection	16 A external fuse gF (lk <= 2.5 kA AC and lk <= 100 A DC) 16 A external fuse gG (lk <= 2.5 kA AC and lk <= 100 A DC)
[lth] conventional free air thermal current	2 A conforming to IEC 60947-1
Local signalling	Green mechanical indicator for position of contacts and 1 green LED control signal state

### Complementary

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Control circuit voltage limits	140 V energization threshold: 75 V
Housing colour	Grey
Connections - terminals	Screw clamp terminal
Drop-out voltage	16 V
Minimum holding current	1.5 mA DC
Maximum power dissipation in W	1.5 W
Maximum switching voltage	125 V DC 252 V AC
[Ue] rated operational voltage	<= 125 V DC conforming to IEC 60947-5-1 <= 230 V AC conforming to IEC 60947-5-1
Network frequency	50/60 Hz
[le] rated operational current	1 A AC-13 Ue: 230 V per 1000000 cycles conforming to IEC 60947-5-1 1 A AC-14 Ue: 230 V per 1000000 cycles conforming to IEC 60947-5-1 1 A AC-15 Ue: 230 V per 1000000 cycles conforming to IEC 60947-5-1 1 A DC-13 Ue: 24 V per 1000000 cycles conforming to IEC 60947-5-1 2 A AC-12 Ue: 230 V per 1000000 cycles conforming to IEC 60947-5-1 2 A DC-12 Ue: 24 V per 1000000 cycles conforming to IEC 60947-5-1
Minimum switching current	3 mA
Minimum switching voltage	17 V
Electrical reliability	<= 0.00000001
Operating time	<= 12 ms between de-energisation of coil and closing of NC contact <= 12 ms between de-energisation of coil and closing of NO contact <= 12 ms between energisation of coil and closing of NC contact <= 12 ms between energisation of coil and closing of NO contact
Contact bounce time	<= 3 ms
Operating rate in Hz	6 Hz at no-load 0.5 Hz at le
Mechanical durability	20000000 cycles
[Ui] rated insulation voltage	250 V conforming to IEC 60947-1 250 V conforming to VDE 0110 group C

Flame retardance	V0 conforming to UL 94
Cable cross section	0.342.5 Mm², 1 or 2 wires flexible with cable end 0.62.5 Mm², 1 or 2 wires flexible without cable end 0.272.5 Mm², 2 wires rigid 0.274 mm², 1 wire rigid
Operating position	Any position
Installation category	II conforming to IEC 60947-1
Mounting support	Symmetrical DIN rail Combination rail Asymmetrical DIN rail
Net weight	0.095 kg

### Environment

Immunity to microbreaks	10 ms
Dielectric strength	1500 V between independent contacts 2500 V between wired interface and earth
	4000 V between coil circuit and contact circuits
Standards	IEC 60947-5-1
Product certifications	DNV
	LROS (Lloyds register of shipping)
	UL
	BV
	CSA
IP degree of protection	IP20 conforming to IEC 60529
Protective treatment	TC
Fire resistance	850 °C conforming to IEC 60695-2-1
Shock resistance	50 gn for 11 ms conforming to IEC 60068-2-27
Vibration resistance	6 gn conforming to IEC 60068-2-6 (f = 1055 Hz)
Electromagnetic compatibility	1.2/50 ms shock waves immunity test conforming to IEC 255-4
	Electrostatic discharge immunity test, level 3 8 kV conforming to IEC 61000-4-2
	Rapid transients immunity test on input/output 1 kV conforming to IEC 61000-4-4
	Rapid transients immunity test on power supply 2 kV conforming to IEC 61000-4-4
Ambient air temperature for operation	-2060 °C at Un
	-540 °C unrestricted operation
Ambient air temperature for storage	-4070 °C
Operating altitude	<= 3000 m
Pollution degree	3 conforming to IEC 60947-5-1

### **Packing Units**

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Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Weight	92 g
Package 1 Height	2 cm
Package 1 width	7.5 cm
Package 1 Length	8 cm
Unit Type of Package 2	BB1
Number of Units in Package 2	5
Package 2 Weight	486 g
Package 2 Height	7.8 cm
Package 2 width	9 cm
Package 2 Length	12 cm
Unit Type of Package 3	S02
Number of Units in Package 3	50
Package 3 Weight	4.83 kg
Package 3 Height	15 cm
Package 3 width	30 cm
Package 3 Length	40 cm

### Offer Sustainability

Sustainable offer status	Green Premium product
REACh Regulation	REACh Declaration
EU RoHS Directive	Pro-active compliance (Product out of EU RoHS legal scope) EU RoHS  Declaration
Mercury free	Yes
RoHS exemption information	₫Yes
China RoHS Regulation	☑ China RoHS Declaration
Environmental Disclosure	Product Environmental Profile
WEEE	The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins

### Contractual warranty

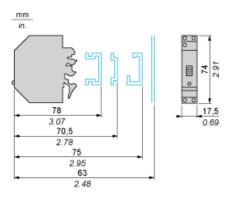
Warranty	18 months
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# Product data sheet Dimensions Drawings

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### Electromechanical Interface Module

### **Dimensions**

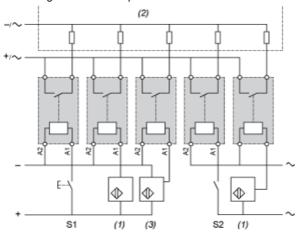


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### Electromechanical Interface Module

### Example of Application with PLC

Interfacing PLC discrete inputs



S1, Pushbuttons series contacts

S2

(1) 2-wire sensors

(2) PLC positive logic discrete inputs

(3) 3-wire sensors

### Interface with Mechanical Indication + LED

### Circuit Diagram

1 N/O