

BIDIRECTIONAL ISOLATING MODULE AE/SA-AB

Description

The bidirectional isolating module AE/SA-AB allows short circuits to be controlled and isolated in the algorithmic detection loop, leaving the affected zone out of service between 2 plant isolators implemented in closed loop, or that which depends on this isolator for open loop facilities.

The operation of the isolator is associated with that of the line control card AE/SA-CTL, and with the actual operation of the algorithmic loop and the equipment connected thereto, acting jointly for the detection of the short circuit.

The bidirectional isolating module does not occupy a position in the algorithmic loop, for which reason it does not need coding.

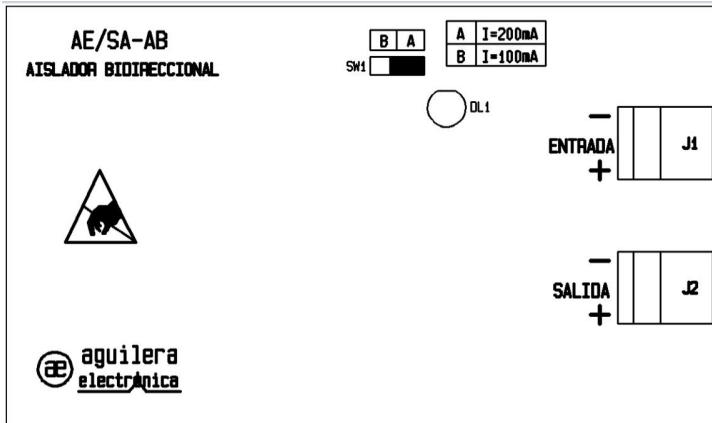
No more than 32 items should be connected after an isolator, or between 2 isolators in an installation section. .

It incorporates the following functions:

- * Bidirectional switch, allows the loop to be cut safely, without causing voltage drops when continuity is given.
- * Voltage detector. It supervises the loop voltage, impeding operation until the voltage has not passed the lower limit established.
- * Luminous indicator, it is activated when a short circuit is detected in the loop, or excessive current consumption.
- * Removable jacks for input and output connection, to facilitate installation in the field.
- * The circuit's protective case leaves the status LED of the unit visible.



Wiring Schematic



Assembly

For the installation of the modules, open the module cover by pressing on its central part. Secure the module with 4 screws using the fastening holes foreseen for this purpose.

Wiring

Disconnect the supply voltage of the detection loop before installing the module.

- Connect the positive input of the detection loop to the + terminal of the input jack.
- Connect the negative input of the detection loop to the - terminal of the input jack.
- Connect the positive output of the detection loop to the + terminal of the output jack.
- Connect the negative output of the detection loop to the - terminal of the output jack.

TECHNICAL CHARACTERISTICS

Power supply voltage:	18 ~27 V (AE/SA-CTL Algorithmic loop card).
Consumption when idle:	100 μ A
Maximum permitted current:	200 mA.
Maximum current after detecting short circuit:	<50 mA
Algorithmic loop wiring:	2-wire. Recommended cross-section 1.5 mm ²
Temperature range:	0° - +50° C (ambient temperature)
Humidity range:	Relative humidity 10% - 90% without condensation.

Casing material:	ABS
Luminous indicator:	Activation: Red permanent
Size:	105 x 82 x 25 mm
Fastening:	4 holes, diam. 3.5 mm
Weight:	100 g

CERTIFICATION

0099/CPD/A74/0093

