Product datasheet

Specifications

analogue I/O extension module - 4 I O - 24 V DC - for Zelio Logic

Local distributor code:

389838401 SR3XT43BD

EAN Code: 3389119203968

Main

Range of product	Zelio Logic
Product or component type	Analogue I/O extension module

Complementary

Analogue input number	2
Analogue input type	Common mode
Analogue input range	0...10 V 0...20 mA -25...125 °C
Temperature probe type	Pt 100, 3-wire conforming to IEC 751
Maximum permissible voltage	30 V for analogue input circuit
[Imp] maximum permanent current	30 mA for analogue input circuit
Analogue input resolution	10 bits on the input range
Input impedance	18 kOhm, input range: 0...10 V for analogue input circuit 247 Ohm, input range: 0...20 mA for analogue input circuit
Analogue output number	2
Analogue output range	0...10 V
Analogue output resolution	10 bits on the output range
Load type	Resistive load for analogue output
Maximum load current	10 mA for analogue output
Short-circuit protection	With analogue output
LSB value	0.15 °C, - 25...125 °C for analogue input circuit 20 µA, 0...20 mA for analogue input circuit 9.8 mV, 0...10 V for analogue input circuit 9.8 mV, 0...10 V for analogue output
Conversion time	Smart relay cycle time for analogue input circuit Smart relay cycle time for analogue output
Conversion error	+/- 1 % of the full scale value, input range: 0...10 V (25 °C) for analogue output +/- 1 % of the full scale value, input range: 0...10 V (55 °C) for analogue output +/- 1 %, input range: 0...10 V (25 °C) for analogue input circuit +/- 1 %, input range: 0...10 V (55 °C) for analogue input circuit +/- 1 %, input range: 0...20 mA (25 °C) for analogue input circuit +/- 1 %, input range: 0...20 mA (55 °C) for analogue input circuit +/- 1.5 °C, input range: - 25...125 °C (25 °C) for analogue input circuit +/- 1.5 °C, input range: - 25...125 °C (55 °C) for analogue input circuit
Repeat accuracy	< +/- 0.3 °C, input range: - 25...125 °C at 25 °C for analogue input circuit <= +/- 1 %, input range: 0...10 V at 25 °C for analogue input circuit <= +/- 1 %, input range: 0...10 V at 55 °C for analogue output <= +/- 1 %, input range: 0...20 mA at 25 °C for analogue input circuit

Disclaimer: This documentation is not intended as a substitute for and is not to be used for determining suitability or reliability of these products for specific user applications

Operating distance	10 m with screened cable for analogue input circuit 10 m with screened cable for analogue output
Reverse polarity protection	Analogue input circuit: with
Connections - terminals	Screw terminals, 1 x 0.25...1 x 2.5 mm² (24 AWG...14 AWG) semi-solid Screw terminals, 1 x 0.25...1 x 2.5 mm² (24 AWG...14 AWG) solid Screw terminals, 2 x 0.25...2 x 1.5 mm² (23 AWG...16 AWG) solid Screw terminals, 1 x 0.25...1 x 2.5 mm² (24 AWG...14 AWG) flexible with cable end Screw terminals, 2 x 0.25...2 x 0.75 mm² (24 AWG...18 AWG) flexible with cable end
Tightening torque	0.5 N.m
Product weight	0.11 kg

Environment

Product certifications	GOST UL C-Tick CSA
Standards	IEC 61000-4-12 IEC 61000-4-5 IEC 61000-4-3 IEC 61000-4-4 level 3 IEC 61000-4-6 level 3 IEC 61000-4-2 level 3 IEC 60068-2-6 Fc IEC 61000-4-11 IEC 60068-2-27 Ea
IP degree of protection	IP20 (terminal block) conforming to IEC 60529 IP40 (front panel) conforming to IEC 60529
Environmental characteristic	EMC directive conforming to IEC 61000-6-2 EMC directive conforming to IEC 61000-6-3 EMC directive conforming to IEC 61000-6-4 EMC directive conforming to IEC 61131-2 zone B Low voltage directive conforming to IEC 61131-2
Disturbance radiated/conducted	Class B conforming to IEC 55022-11 Group 1
Pollution degree	2 conforming to IEC 61131-2
Ambient air temperature for operation	-20…40 °C conforming to IEC 60068-2-1 and IEC 60068-2-2 -20…55 °C conforming to IEC 60068-2-1 and IEC 60068-2-2
Ambient air temperature for storage	-40…70 °C
Operating altitude	2000 m
Maximum altitude transport	3048 m
Relative humidity	95 % without condensation or dripping water

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Height	6.000 cm
Package 1 Width	6.500 cm
Package 1 Length	11.000 cm
Package 1 Weight	105.000 g
Unit Type of Package 2	S03
Number of Units in Package 2	48
Package 2 Height	30.000 cm
Package 2 Width	30.000 cm

Package 2 Length	40.000 cm
Package 2 Weight	5.516 kg

Logistical informations

Country of origin	FR

Contractual warranty

Warranty (in months)	18

Environmental Data

Schneider Electric aims to achieve Net Zero status by 2050 through supply chain partnerships, lower impact materials, and circularity via our ongoing “Use Better, Use Longer, Use Again” campaign to extend product lifetimes and recyclability.

Environmental Data explained >

How we assess product sustainability >

Environmental footprint

Total lifecycle Carbon footprint	**153 kg CO2 eq.**
Carbon footprint of the manufacturing phase [A1 to A3]	**1 kg CO2 eq.**
Carbon footprint of the distribution phase [A4]	**0 kg CO2 eq.**
Carbon footprint of the installation phase [A5]	**0 kg CO2 eq.**
Carbon footprint of the use phase [B2, B3, B4, B6]	**152 kg CO2 eq.**
Carbon footprint of the end-of-life phase [C1 to C4]	**0.2 kg CO2 eq.**
Environmental Disclosure	**Product Environmental Profile**

Use Better

Materials and Substances

Packaging made with recycled cardboard	**Yes**
Packaging without single use plastic	**Yes**
SCIP Number	**Ab7a5df6-4d23-4fb1-96de-7c15d64130aa**
EU RoHS Directive	**Compliant By Exemption**
REACh Regulation	**Reference contains Substances of Very High Concern above the threshold**
PVC free	**Yes**

Use Longer

Lifetime extension

Repair	**No**

Use Again

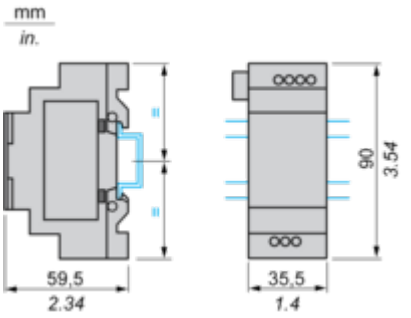
Repack and remanufacture

Recyclability potential, in %	**10**
End of life manual availability	**End of Life Information**
Take-back	**No**
WEEE Label	**The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins**

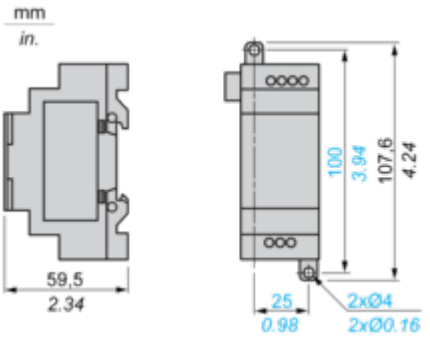
Dimensions Drawings

Analog I/O Extension Modules

Mounting on 35 mm/1.38 in. DIN Rail



Screw Fixing (Retractable Lugs)



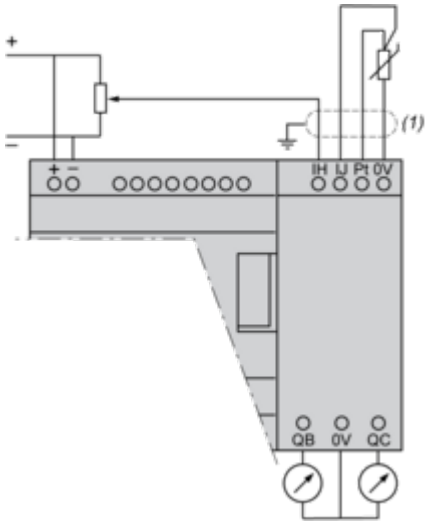
Connections and Schema

Connection of Smart Relays on DC Supply, with Analog I/O Extension Module

Connection Alternatives

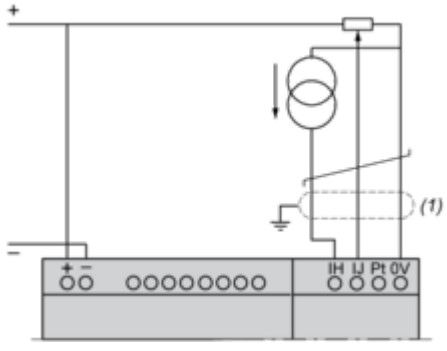
0 - 10 V	0 - 20 mA	Pt100
2	0	0
1	1	0
0	2	0
1	0	1
0	1	1

Application Example with 1 x 0 - 10 V Input and 1 x Pt100 Input



(1) Screened cables, maximum length 10 m/32.80 ft.

Application Example with 1 x 0 - 20 mA Input and 1 x 0 - 10 V Input



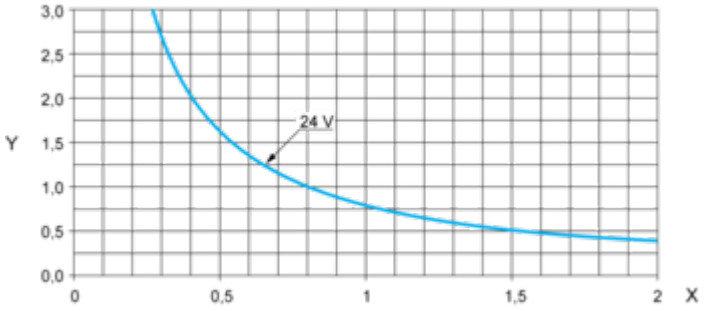
(1) Screened cables, maximum length 10 m/32.80 ft.

Performance Curves

Compact and Modular Smart Relays

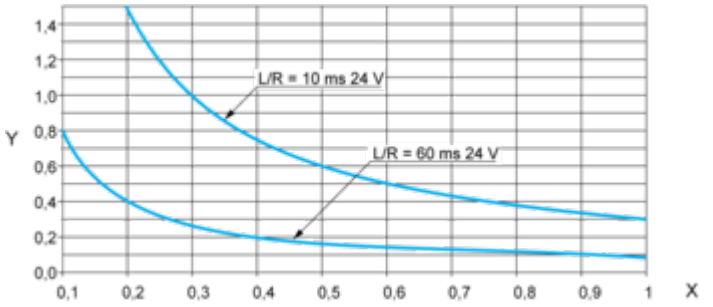
Electrical Durability of Relay Outputs

(in millions of operating cycles, conforming to IEC/EN 60947-5-1)
DC-12 (1)



X: Current (A)
Y: Millions of operating cycles
(1) DC-12: control of resistive loads and of solid state loads isolated by opto-coupler, L/R ≤ 1 ms.

DC-13 (1)



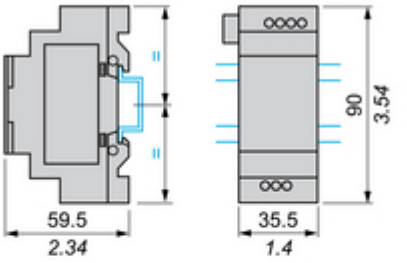
X: Current (A)
Y: Millions of operating cycles
(1) DC-13: switching electromagnets, L/R ≤ 2 x (Ue x Ie) in ms, Ue: rated operational voltage, Ie: rated operational current (with a protection diode on the load, DC-12 curves must be used with a coefficient of 0.9 applied to the number in millions of operating cycles).

Technical Illustration

Dimensions

mm
in.

Mounting on 35 mm/1.38 in. DIN Rail



Screw Fixing

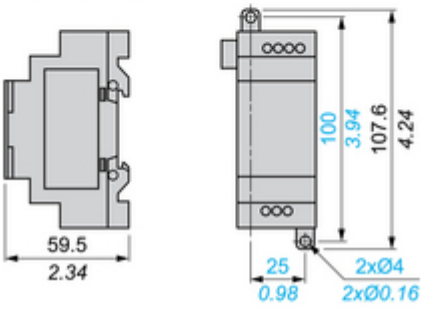


Image of product / Alternate images

Alternative


0V
Analog Inputs
SR3 XT43BD
Analog Outputs