



Main

Range of product	Modicon M238 logic controller
Product or component type	Analog input module
Analogue input number	4
Analogue input type	Voltage 0...10 V non differential Pt 100/Pt 1000 temperature probe - 200...600 °C non differential Ni 100/Ni 1000 temperature probe - 50...150 °C non differential Current 0...20 mA non differential
Cross talk	<= 1 LSB

Complementary

Range compatibility	Twido Advantys OTB
Analogue input resolution	12 bits
LSB value	2.5 mV voltage voltage 4.8 µA current current 0.2 °C temperature probe Pt 100/Pt 1000 0.05 °C temperature probe Ni 100/Ni 1000
Permissible continuous overload	40 mA current 13 V voltage
Input impedance	>= 10 kOhm temperature probe 470 Ohm current 10 kOhm voltage
Sampling duration	160 ms
Acquisition period	320 ms per channel + 1 controller cycle time temperature probe 160 ms per channel + 1 controller cycle time voltage/current
Measurement error	+/- 0.2 % of full scale 0...10 V 0...10 V 25 °C +/- 0.2 % of full scale 4...20 mA 4...20 mA 25 °C +/- 0.4 % of full scale Pt 100/Pt 1000, Ni 100/ Ni 1000 25 °C
Temperature coefficient	+/- 0.004 %FS/°C temperature probe +/- 0.009 %FS/°C current +/- 0.009 %FS/°C voltage
Repeat accuracy	+/-0.1 %FS
Non-linearity	+/- 0.02 %FS
Total error	+/-0.5 %FS
Type of cable	Shielded cable
Insulation between channel and internal logic	Photocoupler
Supply	External supply
[Us] rated supply voltage	24 V DC
Supply voltage limits	20.4...28.8 V
Electrical connection	1 removable screw terminal block
Current consumption	50 mA 5 V DC internal 60 mA 24 V DC external
Net Weight	0.19 lb(US) (0.085 kg)

Environment

Dielectric strength	2500 V between the I/O and internal logic
Maximum Width	0.93 in (23.5 mm)
Maximum Depth	2.76 in (70 mm)
Maximum Height	3.54 in (90 mm)

Ordering and shipping details

Category	22531 - PLCS, TWIDO, TWD
Discount Schedule	PC12
GTIN	00785901629450
Nbr. of units in pkg.	1
Package weight(Lbs)	0.33 lb(US) (0.15 kg)
Returnability	No
Country of origin	FR

Packing Units

Unit Type of Package 1	PCE
Package 1 Height	2.95 in (7.5 cm)
Package 1 width	4.13 in (10.5 cm)
Package 1 Length	4.92 in (12.5 cm)

Offer Sustainability

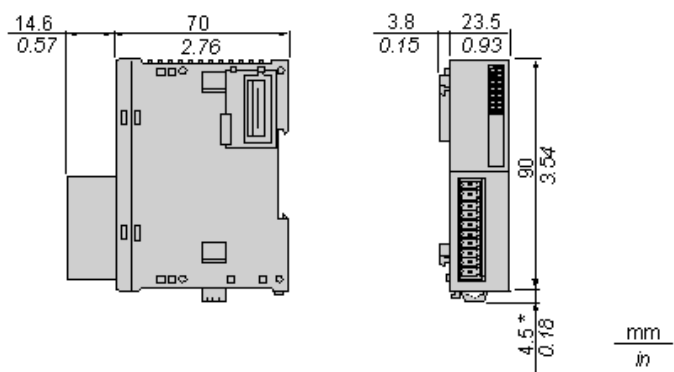
Sustainable offer status	Green Premium product
EU RoHS Directive	Pro-active compliance (Product out of EU RoHS legal scope) EU RoHS Declaration
Mercury free	Yes
RoHS exemption information	Yes
China RoHS Regulation	China RoHS Declaration
Environmental Disclosure	Product Environmental Profile
Circularity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

Contractual warranty

Warranty	18 months
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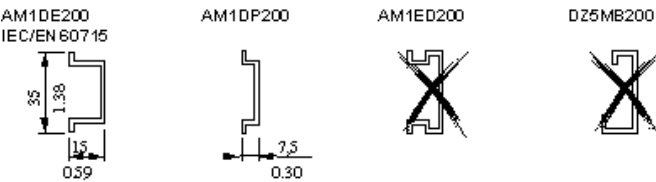
Analog Input Module (4-channel, Voltage/Current/Temperature)

Dimensions



NOTE: * 8.5 mm (0.33 in) when the clip-on lock is pulled out.

DIN Rail Mounting

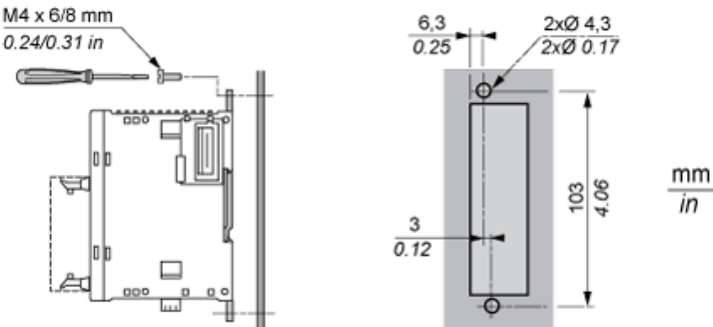


Rail depth	Catalogue part number
15 mm (0.59 in.)	AM1DE200
7,5 mm (0.30 in.)	AM1DP200

NOTE: Do not use AM1ED200 and DZ5MB200

Module Mounting on a Panel Surface

Mounting Hole Layout



Wiring Requirements

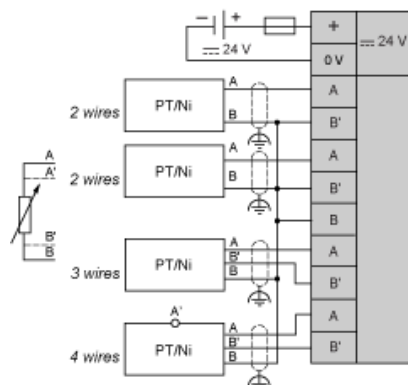
Cable Types and Wire Sizes for Removable Screw Terminal Block

mm ²	0,14...1,5	0,25...0,5	0,25...1,5	0,14...0,5	0,14...0,75	0,25...0,34	0,5
AWG	26...16	24...20	24...16	26...20	26...18	24...22	20

Analog Input Module (4-channel, Voltage/Current/Temperature)

Wiring Diagrams

Inputs configured for measuring temperature



Inputs configured for measuring voltage/current

