

Product data sheet

Specifications



discrete output module, Modicon TM5, 6 DO, 24V DC, 0.5A, 2 wires

TM5SDO6T

Main

Range of product	Modicon TM5
Product or component type	Discrete output module
Discrete output number	6
Discrete output type	Transistor

Complementary

Range compatibility	PacDrive LMC motion controller Modicon LMC058 Modicon M258
Product compatibility	Logic controller PacDrive LMC Pro PacDrive LMC Pro 2 PacDrive LMC Eco Motion controller
Output voltage	24 V DC
Output voltage limits	20.4...28.8 V
Discrete output logic	Source
Current per channel	0.5 A
Maximum current per output common	3 A
Colour	White
Peak output current	12 A
Switching frequency	<= 500 Hz resistive load
Response time	<= 300 µs from state 0 to state 1 for output <= 300 µs from state 1 to state 0 for output
Maximum leakage current	5 µA when switched off
Protection type	Short-circuit protection Overload protection Reverse polarity protection
Isolation	500 Vrms AC insulation between channel and bus No insulation between channels
Maximum voltage drop	<0.3 V at 500 mA for output <2 V at 500 mA for sensor supply
Maximum supply current for sensors	500 mA
Current consumption	36 mA at 5 V DC bus 30 mA at 24 V DC input/output
Maximum power dissipation in W	1.2 W

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

Local signalling	1 LED green for power supply 1 LED red for power supply 6 LEDs yellow for output status
Electrical connection	2 wires
Marking	CE
Net weight	0.025 kg

Environment

Standards	UL 508 CSA C22.2 No 213 IEC 61131-2 CSA C22.2 No 142
Product certifications	cULus CSA C-Tick GOST-R
Ambient air temperature for operation	-10...55 °C without derating (horizontal installation) -10...60 °C with derating factor (horizontal installation) -10...50 °C (vertical installation)
Ambient air temperature for storage	-40...70 °C
Relative humidity	5...95 % without condensation
IP degree of protection	IP20 conforming to IEC 61131-2
Pollution degree	2 conforming to IEC 60664
Operating altitude	0...2000 m
Storage altitude	0...3000 m
Vibration resistance	1 gn at 8.4...150 Hz on DIN rail 3.5 mm at 5...8.4 Hz on DIN rail
Shock resistance	15 gn for 11 ms
Electromagnetic compatibility	Electrostatic discharge immunity test, 4 kV on contact conforming to IEC 61000-4-2 Electrostatic discharge immunity test, 8 kV in air conforming to IEC 61000-4-2 Susceptibility to electromagnetic fields, 1 V/m 2...2.7 GHz conforming to IEC 61000-4-3 Susceptibility to electromagnetic fields, 10 V/m 80...2000 MHz conforming to IEC 61000-4-3 Electrical fast transient/burst immunity test, 1 kV I/O conforming to IEC 61000-4-4 Electrical fast transient/burst immunity test, 1 kV shielded cable conforming to IEC 61000-4-4 Electrical fast transient/burst immunity test, 2 kV power lines conforming to IEC 61000-4-4 1.2/50 µs shock waves immunity test, 0.5 kV differential mode conforming to IEC 61000-4-5 1.2/50 µs shock waves immunity test, 1 kV common mode conforming to IEC 61000-4-5 Conducted RF disturbances conforming to IEC 61000-4-6 Conducted and radiated emissions conforming to CISPR 11

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Height	2.000 cm
Package 1 Width	6.000 cm
Package 1 Length	10.600 cm
Package 1 Weight	38.000 g
Unit Type of Package 2	S02

Number of Units in Package 2	97
Package 2 Height	15.000 cm
Package 2 Width	30.000 cm
Package 2 Length	40.000 cm
Package 2 Weight	3.980 kg

Contractual warranty

Warranty	18 months
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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	
Environmental Disclosure	Product Environmental Profile

Use Better

Materials and Substances	
Packaging made with recycled cardboard	No
Packaging without single use plastic	Yes
EU RoHS Directive	Pro-active compliance (Product out of EU RoHS legal scope)
REACH Regulation	REACH Declaration
California proposition 65	WARNING: This product can expose you to chemicals including: Lead and lead compounds, which is known to the State of California to cause cancer and birth defects or other reproductive harm. For more information go to www.P65Warnings.ca.gov
PVC free	Yes

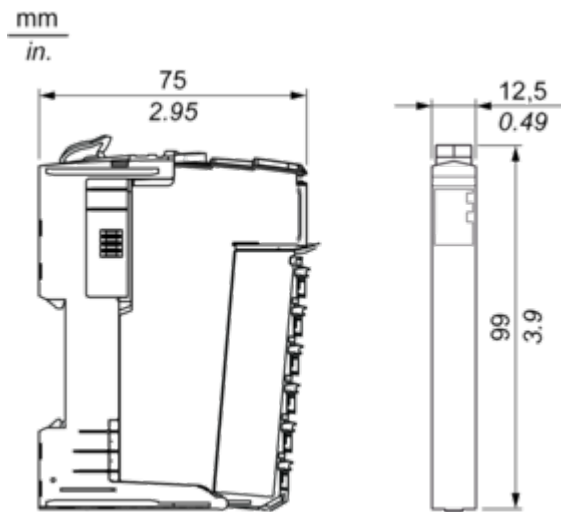
Use Again

Repack and remanufacture	
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

TM5 Slice

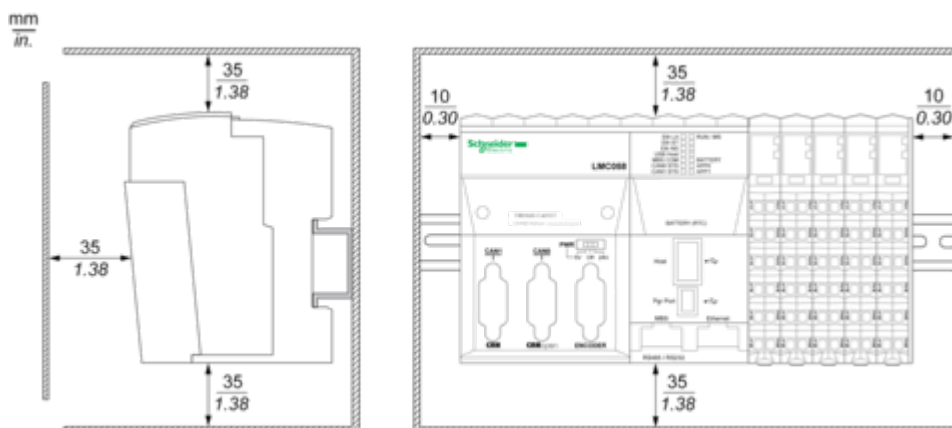
Dimensions



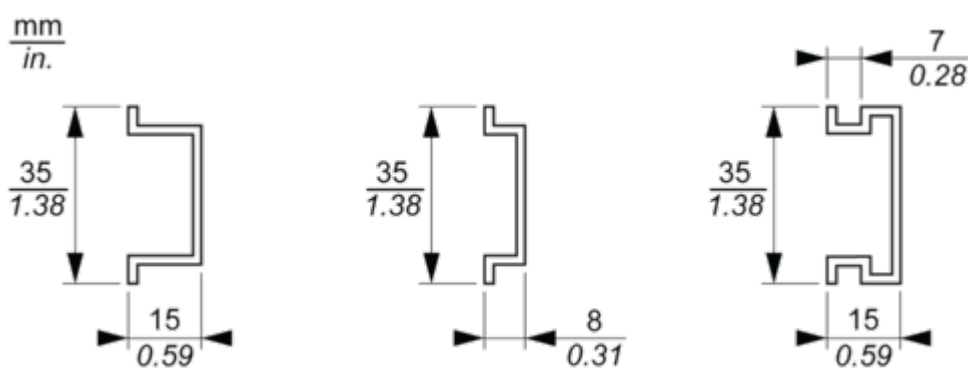
Mounting and Clearance

TM5 System

Spacing Requirements



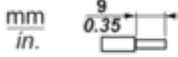
Mounting on a DIN Rail



Connections and Schema

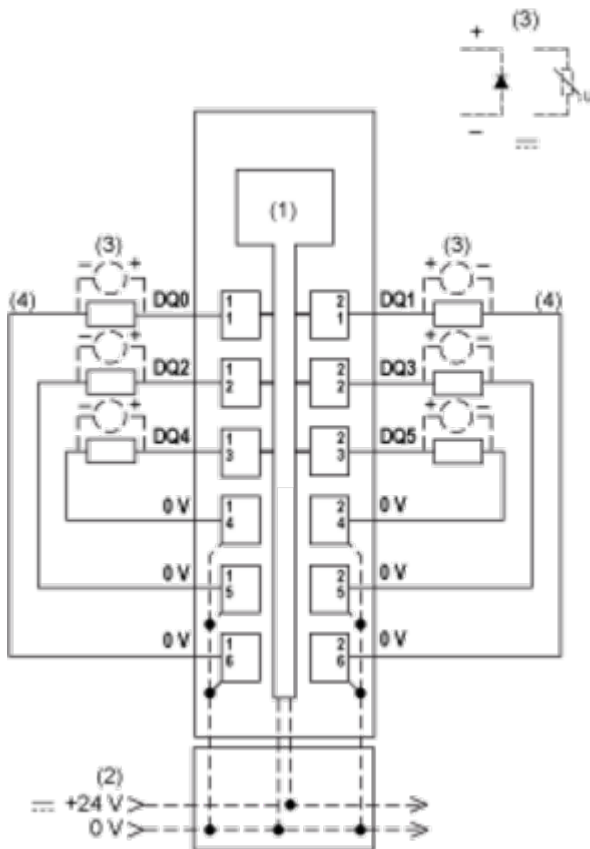
TM5 System Wiring Recommendations

Wire Sizes to Use with the Removable Spring Terminal Blocks

				
mm ²	0,08...2,5	0,25...2,5	0,25...1,5	2 x 0,25...2 x 0,75
AWG	28...14	24...14	24...16	2 x 24...2 x 18

Electronic Module 6DO 24 Vdc Tr 0.5 A 2 Wires

Wiring Diagram



- (1) Internal electronics
- (2) 24 Vdc I/O power segment integrated into the bus bases
- (3) Inductive load protection
- (4) 2-wire load