# 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



# Logic controller. Modicon M258. compact base 42 + 4 I/O. 24 V DC

TM258LD42DT4L

Price: 60,397.42 ZAR

### Main

Range Of Product	Modicon M258		
Product Or Component Type	Logic controller		
Product Specific Application	-		
Discrete I/O Number	42		
Analogue Input Number	4		
Discrete Output Number	12 output 4 fast output		

### Complementary

Discrete Input Number	10 for fast input 12 for input 4 for regular input		
Discrete Input Logic	Sink for fast input Sink for regular input Source for input		
Discrete Input Voltage	24 V		
Discrete Input Voltage Type	DC		
Analogue Input Type	Current: 020 mA Current: 420 mA Voltage: +/- 10 V		
Analogue Input Resolution	12 bits		
Voltage State 1 Guaranteed	>= 15 V for fast input >= 15 V for fast output >= 15 V for regular input		
Voltage State 0 Guaranteed	<= 5 V for fast input <= 5 V for fast output <= 5 V for regular input		
Discrete Input Current	4 mA for fast input 4 mA for regular input		
Input Impedance	6 kOhm for fast input 6 kOhm for regular input		
Configurable Filtering Time	0 ms for fast input/regular input and fast output 1.5 ms for fast input/regular input and fast output 12 ms for fast input/regular input and fast output 4 ms for fast input/regular input and fast output		
Anti Bounce Filtering	2 μs4 ms configurable fast input/regular input and fast output		
Maximum Cable Distance Between Devices	<30 m for fast input <30 m for fast output <30 m for regular input		
Isolation Between Channels And Internal Logic	500 Vrms AC		

Excluding VAT and subject to change. Please check with your local distributor through "Where to buy"

Isolation Between Channels	None			
Discrete Output Logic	Source			
Discrete Output Voltage	24 V DC			
Output Voltage Limits	19.228.8 V			
Discrete Output Current	4 mA for fast output			
[Us] Rated Supply Voltage	24 V DC for embedded expert modules power 24 V DC for I/O power segment 24 V DC for main supply			
Supply Voltage Limits	20.428.8 V			
[In] Rated Current	0.04 A for embedded expert modules power 10 A for I/O power segment 0.31 A for main supply			
Peak Current	100 kA (duration = <= 70 s) for main supply 25 kA (duration = <= 500 s) for I/O power segment 50 kA (duration = <= 150 s) for embedded expert modules power 1.2 A (duration = > 70 s) for main supply			
Power Consumption In W	14.14 W			
Memory Description	Flash 128 MB Internal RAM 64 MB			
Realtime Clock	Without any user calibration clock, clock drift < 30 s/month at 25 °C With user calibration clock, clock drift <= 6 s/month			
Data Backed Up	Variables of type retain and retain persistent CR2477M Renata, 1.5 years autonomy			
Integrated Connection Type	1 isolated serial link with female RJ45 connectorModbus with master/slave RTU/ASCII or character mode ASCII, physical interface: RS232/RS485, transmission rate: 300115200 bps 1 isolated serial link with female RJ45 connectorEthernet Modbus TCP/IP with slave, physical interface: 10BASE-T/100BASE-TX 1 isolated serial link with mini B USB connector, transmission rate: 480 Mbit/s 1 isolated serial link with USB type A connector, transmission rate: 480 Mbit/s 2 free slots PCI			
Counting Input Number	8 counting input(s) at 200 kHz			
Local Signalling	1 LED per channel for I/O state 1 LED for CAN0 STS 1 LED for MBS COM 1 LED green/red for APP0 1 LED green/red for APP1 1 LED green/red for Eth NS (Ethernet network status) 1 LED green/red for Eth ST (Ethernet status) 1 LED green/red for RUN/MS (module status) 1 LED green/red for USB host 1 LED green/yellow for Eth LA (Ethernet activity) 1 LED red for BATT (battery status)			
Marking	CE			
Mounting Support	Symmetrical DIN rail			
Width	237.5 mm			
Height	99 mm			
Depth	85 mm			
Net Weight	0.77 kg			

### **Environment**

Standards

IEC 61131-2 CSA C22.2 No 213 CSA C22.2 No 142 UL 508

Product Certifications	cULus			
	CSA			
	GOST-R			
	C-Tick			
Ambient Air Temperature For	055 °C without derating (horizontal installation)			
Operation	060 °C with derating factor (horizontal installation)			
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	050 °C (vertical installation)			
Ambient Air Temperature For Storage	-2570 °C			
Relative Humidity	595 % without condensation			
	595 // Without Condensation			
Ip Degree Of Protection	IP20 conforming to IEC 61131-2			
Pollution Degree	2 conforming to IEC 60664			
Operating Altitude	02000 m			
	02000 III			
Storage Altitude	03000 m			
Vibration Resistance	1 gn at 8.4150 Hz on DIN rail			
	3.5 mm at 58.4 Hz on DIN rail			
Shock Resistance	45 m for 44 ma			
	15 gn for 11 ms			
Resistance To Electrostatic	4 kV on contact conforming to IEC 61000-4-2			
Discharge	8 kV in air conforming to IEC 61000-4-2			
	o kV iii ali colliolilliig to IEO 01000-4-2			
Resistance To Electromagnetic	1 V/m 22.7 GHz conforming to IEC 61000-4-3			
Fields	•			
	10 V/m 802000 MHz conforming to IEC 61000-4-3			
Resistance To Fast Transients	1 kV (I/O) conforming to IEC 61000-4-4			
	1 kV (shielded cable) conforming to IEC 61000-4-4			
	2 kV (power lines) conforming to IEC 61000-4-4			
Surge Withstand	0.5 kV differential mode conforming to IEC 61000-4-5			
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	1 kV common mode conforming to IEC 61000-4-5			
Disturbance Radiated/Conducted	CISPR 11			

# **Packing Units**

Unit Type Of Package 1	PCE
Number Of Units In Package 1	1
Package 1 Height	13.300 cm
Package 1 Width	15.800 cm
Package 1 Length	37.000 cm
Package 1 Weight	926.000 g
Unit Type Of Package 2	S04
Number Of Units In Package 2	6
Package 2 Height	30.000 cm
Package 2 Width	40.000 cm
Package 2 Length	60.000 cm
Package 2 Weight	6.499 kg

## **Contractual warranty**

Warranty 18 months

### Sustainability

**Green Premium<sup>TM</sup> label** is Schneider Electric's commitment to delivering products with best-inclass environmental performance. Green Premium promises compliance with the latest regulations, transparency on environmental impacts, as well as circular and low-CO<sub>2</sub> products.

**Guide to assessing product sustainability** is a white paper that clarifies global eco-label standards and how to interpret environmental declarations.

Learn more about Green Premium >

Guide to assess a product's sustainability >

### Well-being performance

Reach Fre	ee Of Svhc	
V Toxic Hea	avy Metal Free	
Mercury F	ree	
Rohs Exe	mption Information	Yes
Pvc Free		
Reach Regulat	tion	REACh Declaration
Eu Rohs Direc	tive	Pro-active compliance (Product out of EU RoHS legal scope)
		EU RoHS Declaration
China Rohs Re	egulation	China RoHS declaration
Weee		The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins

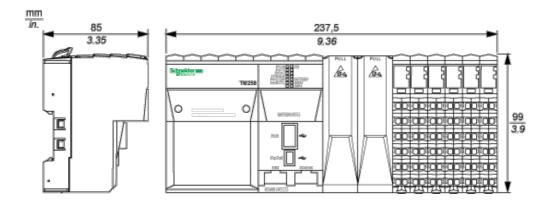
# **Product datasheet**

### TM258LD42DT4L

**Dimensions Drawings** 

### Controller

### **Dimensions**



### **Product datasheet**

### TM258LD42DT4L

Connections and Schema

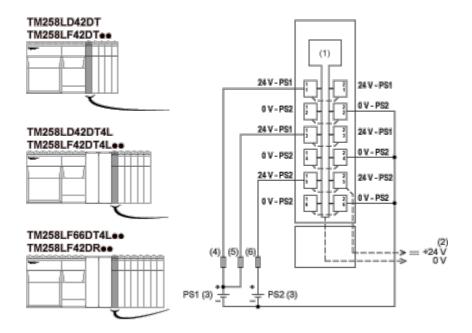
### TM5 System Wiring Recommendations

### Wire Sizes to Use with Removable Spring Terminal Blocks

mm ån.	0.35		=	===	
	$\mathrm{mm}^2$	0,082,5	0,252,5	0,251,5	2 x 0,252 x 0,75
	AWG	2814	24 14	2416	2 x 242 x 18

### **External Power Supplies**

### Wiring Diagram of the Controller Power Distribution Module



- (1) Internal electronics
- (2) 24 Vdc I/O power segment integrated into the bus bases
- (3) PS1/PS2: External isolated SELV power supply 24 Vdc
- (4) External fuse, Type T slow-blow, 3 A 250 V
- (5) External fuse, Type T slow-blow, 2 A 250 V
- (6) External fuse, Type T slow-blow, 10 A max., 250 V