pro**s**ense® Digital Panel Meters - DPM1 Series 1/32 DIN

This model in the ProSense DPM1 series offers a simple, low cost digital display of an analog 4-20mA signal. The 4-digit red LED display is easily scaled into any engineering units from -1999 to 9999 with a selectable decimal point location. Two point direct or reverse acting linear scaling values can be entered manually or by introducing actual sensed process values in Teach mode. The meter is powered from the mA loop and requires no external power supply. The 1/32 DIN housing takes up minimal panel space and the meter face has an IP65 rating. Configuration parameters can be locked out to prevent unauthorized or accidental changes to the meter's operation. ProSense digital panel meters are backed by a 3 year warranty.

Features:

- 48 x 24mm 1/32 DIN
- Simple menu driven pushbutton configuration
- 10mm 4-digit (-1999 to 9999) red LED display
- Selectable decimal point
- Process input (4-20mA DC)
- Loop powered
- Display scaling or process teaching modes
- Configuration for direct or reverse acting linear processes
- Total configuration lock out
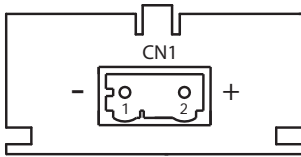- 3 year warranty

DPM1 Series Panel Meters			
Model	**Description**	**Weight (lbs)**	**Price**
DPM1-A-LP	ProSense digital panel meter, 1/32 DIN, 10mm 4-digit red LED, input current signal range(s) of 4 - 20 mA, loop powered.	0.2	

Technical Specifications		
Input	Current Range	4-20mA
	Current Resolution	±0.01mA
	Impedance	10Ω
Accuracy (@ 23ºC ±5ºC)	Maximum error	±(0.1% of reading ÷3 digits)
	Temperature coefficient	100 ppm/ºC
	Warm-Up time	5 minutes
Power Supply		Loop powered
Voltage Drop on Input Loop	4-20 mA	<5V
Conversion	Technique	Single slope
	Resolution	16 bits
	Conversion rate	62 times per second
Display	Range	-1999 to 9999, selectable decimal point position
	Type	4-digit 10mm (0.4"), red*
	Display refresh rate	2 times per second
	Display/input overrange indication	0uE
Environmental Conditions	Operating temperature	-10ºC to +60ºC (14ºF to 140ºF)
	Storage temperature	-25ºC to +85ºC (-13ºF to 185ºF)
	Relative humidity (non-condensing)	<95% @ 40ºC (104ºF)
	Maximum altitude	2000m
	Frontal protection degree	IP65
Environmental Air		No corrosive gases permitted
Agency Approvals		CE

* Illumination based on available loop current and will not be as bright as the powered Digital Panel Meters
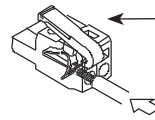
pro*sense*® Digital Panel Meters - DPM1 Series 1/32 DIN

Wiring

CN1	
1	(-) 4-20mA loop
2	(+) 4-20mA loop

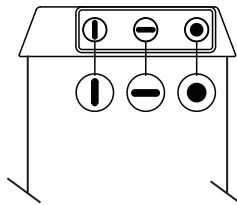| Terminal	
Connector	**CN1**
Wire cross section	0.08 to 2.5mm² (28 to 12 AWG)
Strip length	8 to 9mm
Manufacturer	Wago 231-302/026-000
Cage clamp connection	Insertion tool or screwdriver with 0.5 mm x 3.0 mm blade

Connection Terminal

Insertion Tool (included with meter)

Insert wires into the proper terminal while using the insertion tool to open the clip inside the connector. Release the insertion tool to fix wire to the terminal.
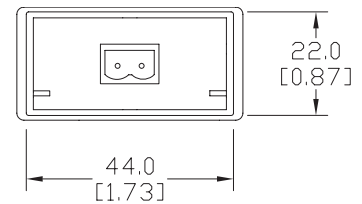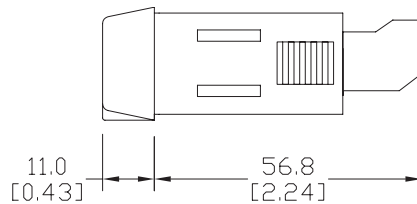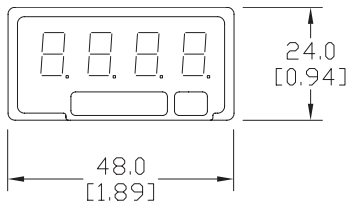
Programming Keys (Bottom View)

⊙ **ENTER:** Enters configuration and validates data and parameters.

⊖ **SHIFT:** Selects mode or shifts blinking digit in configuration.

⊘ **UP:** Increases value of blinking digit in configuration.

Dimensions

mm [inches]

24.0 [0.94]

48.0 [1.89]

11.0 [0.43]   56.8 [2.24]

22.0 [0.87]

44.0 [1.73]

Installation	
Dimensions	48 x 24 x 56.8mm (1/32 DIN)
Panel Cutout	45 x 22mm (Max. panel thickness 7mm)
Case Material	Polycarbonate UL 94 V-0

See our website for complete Engineering drawings.

Insert

Scan or click the above QR code to be taken to the DPM1-A-LP Series Quick Start Guide

prosense® Digital Panel Meters DPM Series

Description

The ProSense DPM family of digital panel meters includes both 1/32 DIN and 1/8 DIN meter sizes with simple menu-driven pushbutton configuration. A wide variety of input signals can be accepted for process, temperature, load cell, voltage, current, pulse, frequency, and other applications. Available output options include alarm relays, analog signal retransmission, and sensor excitation voltage. Backed by a 3-year warranty, ProSense digital panel meters offer outstanding features and performance at an incredible price point.

Type DPM1-A-LP   Type DPM1-A-T   Type DPM1-A-2R

Type DPM2   Type DPM2L   Type DPM3

Click on the thumbnail or go to
https:///VID-PS-0007
for a short video on Digital Panel Meters

DPM Series Digital Panel Meters Process Input Selection Guide

Model	Size	Display	Inputs	Outputs	Power	Price
DPM1-A-LP	1/32 DIN	10mm, Red LED*, -1999 to 9999 Selectable decimal point	4-20mA	None	Loop Powered	
DPM1-A-H			±20mA, ±100mV ±10V, ±20V ±200V		85-265 VAC, 50/60 Hz 100-300 VDC	
DPM1-A-L					21-53 VAC, 50/60 Hz 10.5-70 VDC	
DPM1-T-H		10mm, Red LED, -1999 to 9999	RTD Pt100 (3-wire) TC Type J, K, T or N		85-265 VAC, 50/60 Hz 100-300 VDC	
DPM1-T-L					21-53 VAC, 50/60 Hz 10.5-70 VDC	
DPM1-A-2R-H		8mm, Red LED, -1999 to 9999 Selectable decimal point	±20mA, ±100mV ±10V, ±60V	2 Relays Form A SPST Normally Open	85-265 VAC, 50/60 Hz 100-300 VDC	
DPM1-A-2R-L					21-53VAC 50/60 Hz 10.5-70VDC	
DPM1-A-A2R-H				2 Relays Form A SPST Normally Open 4-20mA	85-265 VAC, 50/60 Hz 100-300 VDC	
DPM1-A-A2R-L					21-53 VAC, 50/60 Hz 10.5-70 VDC	
DPM2-AT-HL	1/8 DIN	DPM2: 14mm, Red LED, -9999 to 9999 DPM2L: 20mm, Red LED, -1999 to 9999 Selectable decimal point	±20mA, ±10V ±200V, 100-100k Ohm potentiometer, 1k-50k Ohm resistance, RTD Pt100 (3-wire) RTD Pt1000 (4-wire) TC Type J, K, T or N	None	20-265 VAC, 50/60 Hz 11-265 VDC	
DPM2L-AT-HL						
DPM2-AT-2R-HL				2 Relays Form C SPDT		
DPM2L-AT-2R-HL						
DPM3-AT-H	1/8 DIN	14mm, Red, Green, Amber LED -19999 to 39999 Selectable decimal point	±20mA, ±10V RTD Pt100 (3-wire) TC Type J, K, T or N Load Cell ±15mV, ±30mV, ±150mV Potentiometer	None	85-265 VAC, 50/60Hz 100-300 VDC	
DPM3-AT-2R-H				2 Relays Form C SPDT		
DPM3-AT-4R-H				4 Relays Form A Normally Open with shared common		
DPM3-AT-A-H				4-20mA		
DPM3-AT-A2R-H				2 Relays Form C SPDT 4-20mA		
DPM3-AT-L				None	22-53 VAC, 50/60 Hz 10.5-70 VDC	
DPM3-AT-2R-L				2 Relays Form C SPDT		
DPM3-AT-4R-L				4 Relays Form A Normally Open with shared common		
DPM3-AT-A-L				4-20mA		
DPM3-AT-A2R-L				2 Relays Form C SPDT 4-20mA		

* Illumination based on available loop current and will not be as bright as the powered Digital Panel Meters

prosense® Digital Panel Meters DPM Series

DPM Series Digital Panel Meters Electrical Input Selection Guide						
Model	**Size**	**Display**	**Inputs**	**Outputs**	**Power**	**Price**
DPM1-E-H	1/32 DIN	10mm, Red LED, -1999 to 9999 Selectable decimal point	100 / 600 VAC or VDC 1A / 5A AC or DC	None	85-265 VAC, 50/60 Hz 100-300 VDC	
DPM1-E-L					21-53 VAC, 50/60Hz 10.5-70 VDC	
DPM2-E-HL		14mm, Red LED, -9999 to 9999	600 / 200 / 20 VAC or VDC 1A / 5A / shunt 60mV / shunt 100mV AC or DC	None	20-265 VAC, 50/60 Hz 11-265 VDC	
DPM2-E-2R-HL				2 Relays Form C SPDT		
DPM3-E-H	1/8 DIN	14mm, Red, Green, Amber LED -19999 to 19999 Selectable decimal point	600 / 200 / 20 / 2 VAC True RMS or VDC 1A / 5A / shunt 50mV / shunt 60mV / shunt 100mV AC True RMS or DC	None	85-265 VAC 100-300 VDC	
DPM3-E-A2R-H				2 Relays Form C SPDT 4-20mA		
DPM3-E-L				None	22-53 VAC 10.5-70 VDC	
DPM3-E-A2R-L				2 Relays Form C SPDT 4-20mA		

DPM Series Digital Panel Meters Pulse, Frequency Input Selection Guide						
Model	**Size**	**Display**	**Inputs**	**Outputs**	**Power**	**Price**
DPM1-P-H	1/32 DIN	10mm, Red LED, 0 to 9999 Selectable decimal point	7kHz (tachometer rpm or rate modes) 9999Hz (frequency meter mode)	None	85-265 VAC 100-300 VDC	
DPM1-P-L					1-53 VAC 10.5-70 VDC	
DPM1-P-A2R-H		8mm, Red LED, 0 to 9999 Selectable decimal point	12kHz (tachometer rpm or rate modes) 9999Hz (frequency mode) 100Hz (duty/PWM mode)	2 Relays Form A SPST Normally Open 4-20mA	85-265 VAC 100-300 VDC	
DPM1-P-A2R-L					21-53 VAC 10.5-70 VDC	
DPM2-P-HL	1/8 DIN	14mm, Red LED, 0 to 9999, 0 to 999999 Totalizer Selectable decimal point	7.5 kHz (counter mode) 25kHz (tachometer rpm or rate modes)	None	20-265 VAC 11-265 VDC	
DPM2-P-2R-HL				2 Relays Form C SPDT 4-20mA		
DPM3-P-H		14mm Red, Green, Amber LED -99999 to 99999, -9999999 to 99999999 Totalizer Programmable decimal point	19kHz (without totalizer) 9.9 kHz (with totalizer)	None	85-265 VAC 100-300 VDC	
DPM3-P-A2R-H				2 Relays Form C SPDT 4-20mA		
DPM3-P-L				None	22-53 VAC 10.5-70 VDC	
DPM3-P-A2R-L				2 Relays Form C SPDT 4-20mA		