

Digital multimeter

MD 9231 Industrial TRMS AC/DC Current Clamp Meter

NEW



The MD 9231 is an industrial TRMS AC and DC current clamp meter with a wide jaw opening and is capable of measuring currents up to 1000 A. It has the ability to measure capacitance and frequency and is equipped with a built-in VFD feature that makes the instrument capable of measuring the true values in accordance with frequency. The MD 9231 has a wide range of extra features, including peak value, data and MAX hold functions, auto power off, auto-ranging and a relative zero function. It uses state-of-the-art measurement technology and is housed in a sturdy industrial-grade case. It also has a flashlight for work in dark conditions.

MEASURING FUNCTIONS

- DC and TRMS AC voltage measurement up to 1000 V;
- DC and TRMS AC current measurement up to 1000 A;
- Resistance measurement;
- Acoustic continuity test;
- Diode test;
- Frequency measurement;
- Capacitance measurement.

KEY FEATURES

- **Auto-ranging.**
- LCD display with **backlight**, 3-5/6 digit, 6000 count.
- **Flashlight.**
- Automatic, **non-contact detection** of electromagnetic fields to locate and trace live conductors.
- **Data hold** function.
- **MIN/MAX/AVG** function.
- **Relative zero.**
- **51 mm** jaw opening.
- **CAT IV / 600 V**, CAT III / 1000 V overvoltage categories.

APPLICATION

- System maintenance;
- Power system checking;
- High level industrial testing;
- High level electrical testing.

STANDARDS

- CAN/CSA C22.2 No. 61010-1 Ed. 3.0
- EN61326-1:2006
- EN55022
- EN61000-3-2
- EN61000-3-3
- EN61000-4-2
- EN61000-4-3
- EN61000-4-4
- EN61000-4-5
- EN61000-4-6
- EN61000-4-8
- EN61000-4-11
- IEC/UL/EN61010-1 Ed. 3.0
- IEC/EN61010-2-033 Ed. 1.0
- IEC/EN61010-2-032 Ed. 3.0
- IEC/EN61010-031 Ed. 1.1

Directives

- 2004/108/EC EMC
- 2006/95/EC LVD

TECHNICAL SPECIFICATION

Function	Range	Accuracy
DC Voltage	600.0 V ... 1000.0 V	$\pm(0.8\% \text{ of reading} + 5 \text{ digits})$
AC Voltage (50 Hz ... 400 Hz)	600.0 V ... 1000.0 V	From $\pm(0.8\% \text{ of reading} + 5 \text{ digits})$ to $\pm(10\% \text{ of reading} + 5 \text{ digits})$
DC+AC Voltage (DC, 50 Hz ... 400 Hz)	600.0 V ... 1000.0 V	From $\pm(1.0\% \text{ of reading} + 7 \text{ digits})$ to $\pm(12\% \text{ of reading} + 7 \text{ digits})$
PEAK-rms (ACV & ACA)	Response: 80 ms to > 90%.	
CREST (Peak-Hold)	Accuracy: Add 250 digits to specified accuracy for changes > 5ms	
Audible Continuity Tester	Audible Threshold: At between 10 Ω and 250 Ω . Response time: 32 ms approx.	
Ohm	600.0 Ω , 6.000 k Ω , 60.00 k Ω	$\pm(1.0\% \text{ of reading} + 5 \text{ digits})$
Capacitance	200.0 μF , 2500 μF	$\pm(2.0\% \text{ of reading} + 4 \text{ digits})$
Diode Tester	2.000 V	$\pm(1.5\% \text{ of reading} + 5 \text{ digits})$
AmpTip™ clamp-on DCA	00.00 A ... 60.00 A	From $\pm(1.5\% \text{ of reading} + 5 \text{ digits})$ to $\pm(3.0\% \text{ of reading} + 5 \text{ digits})$
AmpTip™ clamp-on ACA (40 Hz ... 400 Hz)	00.00 A ... 60.00 A	From $\pm(1.5\% \text{ of reading} + 5 \text{ digits})$ to $\pm(3.0\% \text{ of reading} + 5 \text{ digits})$
AmpTip™ clamp-on DC+ACA (DC, 40 Hz ... 400 Hz)	00.00 A ... 60.00 A	From $\pm(2.0\% \text{ of reading} + 7 \text{ digits})$ to $\pm(3.0\% \text{ of reading} + 7 \text{ digits})$
Regular Clamp-on DCA	60.00 A ... 1000 A	$\pm(1.8\% \text{ of reading} + 5 \text{ digits})$
Regular Clamp-on ACA (40 Hz ... 400 Hz)	60.00 A ... 1000 A	From $\pm(1.8\% \text{ of reading} + 5 \text{ digits})$ to $\pm(2.2\% \text{ of reading} + 5 \text{ digits})$
Regular Clamp-on DC+ACA (DC, 40 Hz ... 400 Hz)	60.00 A ... 1000 A	From $\pm(2.2\% \text{ of reading} + 7 \text{ digits})$ to $\pm(2.5\% \text{ of reading} + 7 \text{ digits})$
Hz Line Level Frequency	5.00 Hz ... 999.9 Hz	$\pm(1.0\% \text{ of reading} + 5 \text{ digits})$
Non-Contact EF-Detection	20 V ... 440 V	Tolerance: 10 V ... 1000 V
Detection Frequency	50/60Hz	
Transient Protection	8.0 kV (1.2/50 μs surge)	
Overload Protections	Current & Hz functions via jaws: 1000 ADC/AAC rms at < 400 Hz Other functions via terminals: 1000 VDC/VAC rms	
Power Supply	1.5 V AAA Size battery X 2	
Power Consumption	Typical 13 mA for Current functions	
Dimension (L x W x H)	258 x 94 x 44 mm	
Weight	392 g	
Jaw opening & Conductor diameter	51 mm max	

ORDERING INFORMATION



Standard set MD 9231

- MD 9231 Current clamp
- Test lead, 2 pcs
- Battery, 2 pcs
- Pouch, 1 pcs
- User manual

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Note! Photographs in this catalogue may slightly differ from the instruments at the time of delivery.
Subject to technical change without notice.

