

*SD card real time recorder*

# AC/DC MAGNETIC METER

Model : MG-3003SD

*ISO-9001, CE, IEC1010*



**Lutron**

**LUTRON ELECTRONIC**

*The Art of Measurement*

# SD card real time data recorder AC/DC MAGNETIC METER

**Model : MG-3003SD**

## FEATURES

* Wide range, professional magnetic measurement.
* Unit : G ( Gauss ), mT ( milli Tesla ).
* DC or AC magnetic measurement.
* DC magnetic range : 300.00 mT, 3000.0 mT.
* AC magnetic range : 150.00 mT, 1500.0 mT.
* Resolution : 0.01 mT/0.1 mT, 0.1 G/1 G.
* DC polarity : N/S ( north/south pole ).
* Sensor : Hall sensor.
* Zero adjustment.
* Separate probe, easy to make the measurement.
* Real time SD memory card Datalogger, built-in Clock and Calendar, sampling time can set from 1 sec to 8 hour 59 min. 59 sec.
* Manual datalogger is available, during execute the manual datalogger function, it can set the different location no. ( position 1 to position 99 ).
* Innovation and easy operation, computer is not need to setup extra software, after execute datalogger, just take away the SD card from the meter and plug in the SD card into the computer, it can down load the all the measured value with the time information ( year/month/date/ hour/minute/second ) to the Excel directly, then user can make the further data or graphic analysis by themselves.
* SD card capacity : 1 GB to 16 GB.
* LCD with green light backlight, easy reading.
* It can default auto power off or manual power off.
* Data hold, record max. and min. reading.
* Microcomputer circuit, high accuracy.
* Power by UM3/AA ( 1.5 V ) x 6 batteries or DC 9V adapter.
* RS232/USB PC COMPUTER interface.
* Wide applications: PCB industries, water conditioning, aquariums, beverage, fish hatcheries, food processing, photography, laboratory, paper industry, plating industry, quality control, school & college, water conditioning.

## GENERAL SPECIFICATIONS

Circuit	Custom one-chip of microprocessor LSI circuit.		
Display	LCD size : 52 mm x 38 mm. Dot matrix LCD with backlight.		
Measurement Unit	mT	milli Tesla	
	G	Gauss	
Measurement Range ( DC function )	mT	Range 1	300.00 mT x 0.01 mT
		Range 2	3,000.0 mT x 0.1 mT
	G	Range 1	3,000.0 G x 0.1 G
		Range 2	30,000 G x 1 G
Measurement Range, AC ( AC function )	mT	Range 1	150.00 mT x 0.01 mT
		Range 2	1,500.0 mT x 0.1 mT
	G	Range 1	1,500.0 G x 0.1 G
		Range 2	15,000 G x 1 G
Accuracy ( 23± 5 °C )	DC	± ( 5 % rdg. + 10 digit )	
	AC	± ( 5 % rdg. + 20 digit )	
Sensor	Hall sensor.		
Frequency Response	AC measurement : 50 Hz / 60 Hz		
Temp. Compensation for hall sensor	Probe head build the Temp. sensor for using the ATC ( automatic Temp. compensation ).		
Field Direction	Uni-axial.		

Datalogger Sampling Time Setting range	Auto	1 sec to 8 hour 59 min. 59 sec. @ Sampling time can set to 1 second, but memory data may loss.
	Manual	Push the data logger button once will save data one time. @ Set the sampling time to 0 second. @ Manual mode, can also select the 1 to 99 position ( Location ) no.
Memory Card	SD memory card. 1 GB to 16 GB.	
Advanced setting	* SD memory card Format * Set clock time ( Year/Month/Date, Hour/Minute/ Second ) * Set sampling time * Auto power OFF management * Set beep Sound ON/OFF * Decimal point of SD card setting * Unit setting	
Data Hold	Freeze the display reading.	
Memory Recall	Maximum & Minimum value.	
Sampling Time of Display	Approx. 1 second.	
Data Output	RS 232/USB PC computer interface. * Connect the optional RS232 cable UPCB-02 will get the RS232 plug. * Connect the optional USB cable USB-01 will get the USB plug.	
Operating Temperature	0 to 50 °C .	
Operating Humidity	Less than 85% R.H.	
Power Supply	* Alkaline or heavy duty DC 1.5 V battery ( UM3, AA ) x 6 PCs, or equivalent.	
	* DC 9V adapter input. ( AC/DC power adapter is optional ).	
Power Current	Normal operation ( w/o SD card save data and LCD Backlight is OFF ) : Approx. DC 14 mA.	
	When SD card save the data and LCD Backlight is OFF ) : Approx. DC 37 mA. * If LCD backlight on, the power consumption will increase approx. 12 mA.	
Weight	489 g/1.08 LB.	
Dimension	Meter	177 x 68 x 45 mm ( 7.0 x 2.7 x 1.9 inch )
	Probe	198 x 25 x 19 mm ( 7.8 x 1.0 x 0.7 inch ).
Accessories Included	* Instruction manual..... 1 PC * Magnetic Probe..... 1 PC * Hard carrying case ( CA-06 )..... 1 PC	
Optional Accessories	* 1.413 mS Conductivity Standard Solution..... CD-14 SD memory card ( 2 GB ) AC to DC 9V adapter. USB cable, USB-01. RS232 cable, UPCB-02. Data Acquisition software, SW-U801-WIN. Excel data Acquisition software, SE-E802.	

PATENT	CHINA : ZL 2008 2 0189918.5 ZL 2008 2 0189917.0	TAIWAN : M 358970 M 359043
	Germany : Nr. 20 2008 016 337.4	JAPAN : 3151214 U.S.A. : Pending

\* Appearance and specifications listed in this brochure are subject to change without notice.

1209-MG3003SD