auto range + Type K Temp.
optional Humidity, Light, Anemometer

SOUND LEVEL METER

Model : SL-4112   *ISO-9001, CE, IEC1010*

EM-900P probe
（ optional ）

SOUND LEVEL METER
Type K , Auto range , RS 232 Interface
Option : Humidity , Light , Anemometer

*LT*Lutron   **SL-4112**

LUTRON ELECTRONIC

The Art of Measurement

Auto range + Type K Temp.
Optional probe for Humidity, Light, Humidity
USB/RS232 computer interface

SOUND LEVEL METER
Model : SL-4112

FEATURES

* Large LCD display, easy to read.
* Frequency and Time weighting meet IEC 61672 class 2.
* A, C frequency weighting networks is selected.
* Time weighting (Fast & Slow) dynamic characteristic modes.
* 0.5" standard microphone head.
* AC output for system expansion.
* RS232/USB computer interface.
* Auto range & Manual range selection.
* Available for external calibration adjustment.
* Condenser microphone for high accuracy & long-term stability.
* Memory function to store the Max. & Min. value.
* Hold and Peak Hold functions.
* Build in type K and type J thermometer.
* Optional probe (EM-900P) for Humidity/Temp., Light and Anemometer measurement.
* Data logger with 1,600 no. memory, sampling time can select to 1, 2, 5, 10, 30, 60, 600, 1800 or 3600 seconds.
* DC 1.5 V battery (UM-4, AAA) X 6 or DC 9V adapter in.
* Operation key used push button.
* LCD display for low power consumption & clear read-out even in bright ambient light condition.
* Using the durable, long-lasting components, including a strong, light weight ABS-plastic housing case.
* Small and light weight design allow one hand operation.
* Patent.

Electrical specification for Sound level meter

Function	dB (A & C frequency weighting), Time weighting (Fast, Slow), Hold, Memory (Max. & Min.), Peak hold, AC output, RS232 output.
Meter default function	Range set to auto range. Frequency weighting set to A weighting. Time weighting set to fast.
Measurement Range	30 - 130 dB.
Resolution	0.1 dB.
Range selector	Auto range : 30 to 130 dB. Manual range : 3 range, 30 to 80 dB, 50 to 100 dB, 80 to 130 dB, 50 dB on each step, with over & under range indicating.
Frequency	31.5 to 8,000 Hz.
Microphone type	Electric condenser microphone.
Microphone size	Out size, 12.7 mm DIA. (0.5 inch).
Frequency weighting network	Characteristics of A & C. * A weighting : The characteristic is simulated as "Human Ear Listing" response. Typical, if making the environmental sound level measurement, always select to A weighting. * C weighting : The characteristic is near the "FLAT" response. Typical, it is suitable for checking the noise of machinery (Q.C. check) & knowing the sound pressure level of the tested equipment.
Range selector	Manual range: 3 ranges (30 to 80 dB, 50 to 100 dB, 80 to 130 dB). Auto range: 30 - 130 dB.
Time weighting (Fast & Slow)	Fast - t= 200 ms, Slow - t = 500 ms, * "Fast" range is simulated the human ear response time. * "Slow" range is easy to get the avg. values of vibration sound level. * The "Fast" & "Slow" response range are designed to meet IEC 61672 class 2 requirement.
Calibrator	B & K (Bruel & kjaer), MULTIFUCTION ACOUSTIC CALIBRATOR 4226.
Output Signal	* AC output : AC 0.5 Vrms corresponding to each range step. Out put impedance - 600 ohm. * RS232 output.
Output terminal	Terminal 1 : RS232 computer interface terminal, photo couple isolated. Terminal 2 : AC output terminal. Terminal socket size : 3.5 mm dia. phone socket.
Calibration VR	Build in external calibration VR, easy to calibrate on 94 dB level by screw driver.

Electrical specification for Type K/J thermometer

Sensor Type	Reso-lution	Range	Accuracy
Type K	0.1 ℃	-50.0 to 1300.0 ℃	± (0.4 % + 0.8 ℃)
		-50.1 to -199.9 ℃	± (0.4 % + 1 ℃)
	0.1 ℉	-58.0 to 2372.0 ℉	± (0.4 % + 1.5 ℉)
		-58.1 to -327.8 ℉	± (0.4 % + 1.8 ℉)
Type J	0.1 ℃	-50.0 to 1100.0 ℃	± (0.4 % + 0.8 ℃)
		-50.1 to -199.9 ℃	± (0.4 % + 1 ℃)
	0.1 ℉	-58.0 to 2012.0 ℉	± (0.4 % + 1.5 ℉)
		-58.1 to -327.8 ℉	± (0.4 % + 1.8 ℉)

* Accuracy value is specified for the meter only.
* Temp. probe (Type K, TP-01 TP-02A, TP-03. TP-04) is the optional accessories.

GENERAL SPECIFICATION

Display	51 mm x 37 mm LCD (Liquid crystal display), 5 digits with annunciator.
Operating Temp.	0 to 50 ℃ (32 to 122 ℉).
Operating Humidity	Less than 80% RH.
Power Supply	DC 1.5 V battery (UM4, AAA) x 6 PCs, or equivalent.
Power Consumption	Approx. DC 19 mA.
Dimension	245 x 68 x 41 mm (9.6 x 2.7 x 1.6 inch).
Weight	358 g/0.79 LB (including battery).
Accessory Included	Instruction Manual .... 1 PC.
Optional Accessories	94 dB Sound Calibrator : Model : SC-941. SC-942. Sound wind shield ball Model : SB-01 USB cable Model : USB-01 RS232 cable (isolated RS232 cable) : Model : UPCB-02. * Data Acquisition software Model : SW-U801-WIN. * Data logger transfer software Model : SW-DL2005. Type K Temperature probe : Model : TP-01 TP-02A, TP-03. TP-04

ELECTRICAL SPECIFICATIONS FOR OPTIONAL PROBE EM-900P

Anemometer

A. Air velocity

Measure-ment	Range	Resolu-tion	Accuracy
m/S	0.4 - 25.0 m/s	0.1 m/s	± (2% + 0.2 m/s)
km/h	1.4 - 90.0 km/h	0.1 km/h	± (2% + 0.8 km/h)
mph	0.9 - 55.9 mile/h	0.1 mile/h	± (2% + 0.4 mile/h)
knot	0.8 - 48.6 knots	0.1 knots	± (2% + 0.4 knots)
FPM	80 - 4930 ft/min	1 ft/min	± (2%+40 ft/min.)

Note:
  m/S - meters per second   km/h - kilometers per hour
  FPM - feet per minute   knot - nautical miles per hour
  mph - miles per hour   (international knot)

B. Temperature

Measuring Range	0 ℃ to 50 ℃/32 ℉ to 122 ℉
Resolution	0.1 ℃/0.1 ℉
Accuracy	± 0.8 ℃/1.5 ℉

Humidity/Temp. meter

A. Humidity

Measuring Range	0 % to 95 % R.H.	
Resolution	0.1 % R.H.	
Accuracy	≧70%RH	± (3% reading + 1% RH).
	< 70%RH	± 3% RH.

B. Temperature

Measuring Range	0 ℃ to 50 ℃/32 ℉ to 122 ℉
Resolution	0.1 ℃/0.1 ℉
Accuracy	± 0.8 ℃/1.5 ℉

Light meter

Measuring Range	LUX	0 to 20,000 LUX.
	Ft-cd	0 to 1,860 Ft-cd
Resolution	LUX	1 LUX
	Ft-cd	0.1 Ft-cd
Accuracy	± (5% rdg + 8 dgt)	

Note: Ft-cd : Feet candle