



Light Meter

User Manual

1. Instruction

The digital illuminance meter is a precision instrument that used to measure illuminance (Lux, footcandle) in the field.

The illuminance meter is small , tough and easy to handle owing to its construction.

The light sensitive component that used in the meter is made of a very stable, long-life silicon photo diode and spectral response filter.

It can make fully compensation and adjustment aiming to input light in different angle .

2. Specification

- Light Range: 0Lux~40kLux/0FC~4kFC, repeatedly
- High accuracy and rapid response.
- Data-hold function for holding measuring values.
- Unit conversion function for easy reading
- Short rise and fall times.
- Capable of selecting measuring mode in Lux or FC scale alternatively.
- Auto power off in 10minutes
- Maximum and minimum measurement
- Bluetooth4.0, APP Software.

3. Technical Data

Display:	3-3/4 digit LCD with high speed 40 segment bar graph.
Measuring Range:	400.0 Lux,4000 Lux,40.00 KLux /40.00 FC,400.0 FC,4000 FC
Note:	1FC=10.76Lux,1KLux=1000Lux,1KFC=1000FC
Over range Display:	LCD will show "OL" symbol
Accuracy:	±5% rdg ± 10dgt. (<10,000Lux), ±10% rdg ± 10dgt. (>10,000Lux)
Repeatability:	±3%
Sampling Rate:	2 times/sec of analog bar-graph indication; 2 times/sec of digital display.
Operating temperature & Humidity :	0°C to 40°C(32°F to 104°F) 0% to 80% RH.
Storage Temperature & Humidity:	-10°C to 50°C(14°F to 140°F) & 0% to 80% RH.
Power Source:	1 piece 9V battery.
Meter Dimensions:	206L×54W×35.6H(mm);
Weight:	173g

4. Photo and function description

1-Photo detector

2-LCD display: 3-3/4 digit displays with a maximum reading of 3999, and display the indicating signs of measured values, unit function symbols and decimal points etc.

3-HOLD / ☀️ button: Short press the button to keep /release the data; Long press to switch back light.

4-MAX / MIN button: Min/Max reading recorder control key.

5-Power on/ off, Auto-power off:

Power on: Short press button " ⏻ " to power on, system default auto power off . Long press to power on and disable auto power off function. Long press the button again to enable the auto power off function

Power off: Short press button " ⏻ " to power off.

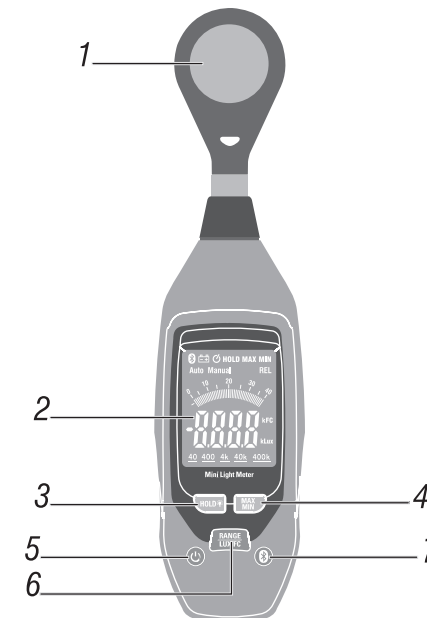
Auto-power off : Auto-power off signal " ⏻ " displays in the left corner of LCD and the instrument will auto-power off in 10minutes of no button operations.

If press the power on/off button for over 1minutes, it will be recognized as faulty operation and the instrument will auto power off.

6-RANGE(LUX/FC) button: Short press to choose auto-range or manual range; Long press to switch the unit displayed.

(LUX/FC)(1FC =10.76 LUX)

7-Bluetooth button: Long press to switch on/off the bluetooth.



5. Operating Instructions

1. Press the power key to power on/off.
2. Long press RANGE(LUX/FC) button to choose LUX or FC.
3. Short press RANGE(LUX/FC) button to choose auto-range or manual range.
4. Face it light source in a horizontal position.
5. Read the illuminance nominal from the LCD display.
6. Over range: If the instrument only displays "OL", the input signal is too strong, and a higher range should be selected. The range will show at the bottom of the LCD, LUX :400 -> 4K -> 40k -> 400k; FC: 40 -> 400-> 4k -> 40k.
7. Data-Hold mode: Press the hold key to select Data-Hold mode. When HOLD mode is selected, the illuminance meter stops all further measurements. Press the HOLD key again to exit Data-Hold mode. Then it resumes normal operation.
8. Maximum and Minimum mode: Press MAX/MIN key to choose the Maximum (MAX) reading, Minimum (MIN) reading and current reading (MAX/MIN blink) mode. Press MAX/MIN key again to exit this mode.
9. Bluetooth function: Long press Bluetooth key to switch on the function. User can transfer datas from the instrument to Phone APP.

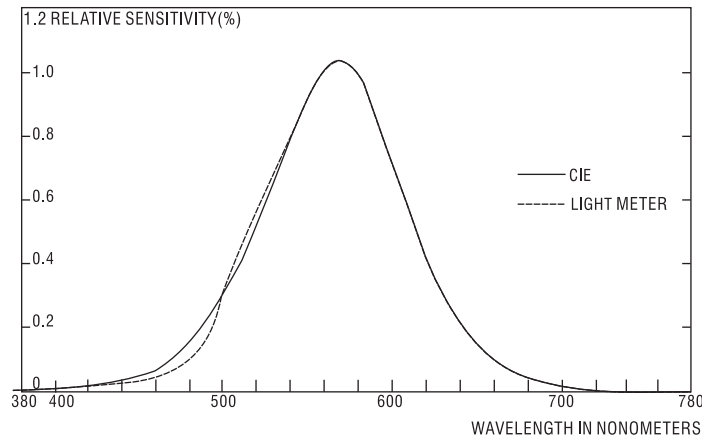
10. Meterbox Pro Operation Download Meterbox Pro APP to the smartphone before using the Bluetooth communication function. Meterbox Pro APP is compatible with instruments with Bluetooth: Laser Distance Meters, Multimeters Clamp Meters, Multifunction Insulation Tester, Environment Meter etc. The Meterbox Pro for Environment Meter detailed introduction please look at the help files in GUIDE which is in the Environment Meter interface of Meterbox Pro.

6. Battery Check-Up & Replacement

1. LCD will display low battery when the battery power is not sufficient, pls replace one new battery.
2. Disconnect the battery cover after power off the instrument.
3. Then replace the exhausted battery with a standard 9V battery.

7. Spectral Sensitivity Characteristic

To the detector, the applied photo diode with filters makes the spectral sensitivity characteristic almost meet C.I.E.(INTERNATIONAL COMMISSION ON ILLUMINATION) Photo curve V(λ) as the following chart described.



8. Maintain

1. The white plastic disc on the top of the detector should be cleaned with a damp cloth when necessary.
2. Do not store the instrument where temperature or humidity is excessively high.
3. The calibration interval for the photo detector will vary according to operational conditions, but generally the sensitivity decreases in direct proportion to the product of luminous intensity by the operational time. In order to maintain the basic accuracy of the instrument, periodic calibration is recommended.

9. Recommended Illumination

LOCATIONS		Lux	FC
OFFICE	Conference, Reception room	200~750	18~70
	Clerk office	700~1,500	65~140
	Typing drafting	1,000~2,000	93~186
FACTORY	Visual work at production line	300~750	28~70
	Inspection work	750~1,500	70~140
	Electronic parts assembly line	1,500~3,000	140~279
	Packing work, Entrance passage	150~300	14~28
HOTEL	Public room, Cloakroom	100~200	9~18
	Reception	200~500	18~47
	Cashier	750~1,000	70~93
STORE	Indoors, Stairs, Corridor	150~200	14~18
	Display window, Packing table	750~1,500	70~140
	Forefront of show window	1,500~3,000	140~279
HOSPITAL	Ward, Warehouse	100~200	9~18
	Examination room	300~750	28~70
	Operating room, emergency treatment	750~1,500	70~140
SCHOOL	Auditorium, Indoor Gymnasium	100~300	9~28
	Class room	200~750	18~70
	Laboratory, Library, Drafting, room	500~1,500	47~140

