# **Transmission Meter**

Code:86160/86160A User Manual V6.05

## Please read this manual carefully before using and reserve it for reference.

Note: IR peak wavelength of 86160 is 940nm, and IR peak wavelength of 86160A is 1400nm.

# I. Product introduction

Transmission Meter is a small size, portable product for transmission value measurement. It is able to simultaneously measure and display UV, IR rejection value and visible light transmission value.

#### Standards for the product

GB/T 31849-2015 Film mounted motor vehicle glass GA/T 744-2013 Automotive solar control window films JJF 1225-2009 Calibration Specification for Transmittance Meter of Automobile JJG 178-2007 Ultraviolet, Visible, Near-Infrared Spectrophotometers

## **II. Parameters**

- 1. Dimension: 93mm \*52mm \*25mm (L\*W\*H)
- 2. Weigh: 65g (exclude batteries)
- 3. Thickness of testing sample: < 0.8mm
- 4. Resolution: 0.1%
- 5. Accuracy: ±2%
- 6. VL Peak wavelength: 530nm
- 7. UV Peak wavelength: 365nm
- 8. IR Peak wavelength: 940nm/1400nm
- 9. Power Supply: 4\*AAA alkaline battery
- 10. Supply Voltage: DC5V
- 11. Operating Current: 10mA
- 12. Operating Power Consumption: 50mW

# **III. Operation**

### 1. Power on

When the meter is off, press the "ON/Hold" button to power on.

### 2. Power off

Press "ON/Hold" button and hold for longer than 3 seconds, the meter will be powered off.

## 3. Auto off

No button is pressed in 3 minutes, and then the meter will power off automatically.

### 4. Manual hold

If "ON/Hold" button is short pressed during measure status, the transmission value will hold on the LCD, "HOLD" symbol is displayed on the LCD. Press the "ON/Hold" button again will release the "Hold" mode. When backlight is off, press the "ON/Hold" button turn on the backlight.

## 5. Measurement

When UVR (Ultraviolet Rejection) and IRR (Infrared Rejection) display 0% and VLT (Visible light transmission) display 100%, insert the testing sample in the "OPENING", VLT, UVR and IRR value will display simultaneously.

## **IV. Features**

- 1. UV rejection meter, IR rejection meter, light transmittance meter. Three functions in ONE device.
- 2. Small size, portable product for transmission value measurement.
- 3. Simple operation, putting the testing sample in the "OPENING", VLT, UVR and IRR values of the sample will simultaneously display.
- 4. For window film, solar film and other transparence material testing.

# V. Notes

- 1. When battery symbol is empty and flash, please replace the battery.
- 2. Keep the "OPENING" is empty before turning on the meter. Otherwise the meter will display "Error" interface or testing interface, empty the "OPENING", turn off and turn on again.
- 3. ±2% Accuracy is for Colorless and transparent material, for colorful or optical coating product etc, it will be low accuracy.

# VI. Standard packing list

| No. | Description                 | Quantity | Unit |
|-----|-----------------------------|----------|------|
| 1   | Transmission Meter          | 1        | pcs  |
| 2   | User Manual                 | 1        | pcs  |
| 3   | Certificate / warranty card | 1        | pcs  |

# **VII. Service**

- 1. The meter has one-year warranty. If the meter works abnormally, please send the whole meter to the company for maintenance.
- 2. Provide users with spare parts and lifelong maintenance services.
- 3. Provide the users with the meter inspection service for free.
- 4. Free technical support for long term.