

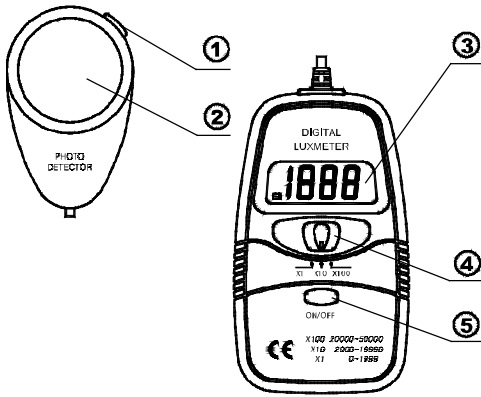
Your purchase of this Digital Luxmeter marks a step forward for you into the field of precision measurements. Although this Luxmeter is a complex and delicate instrument, its ruggedness will allow many years of use if proper operating techniques are developed. Please read the following instructions carefully and always keep this manual within easy reach.

## CONTENTS

1. FEATURES.....	1
2. FRONT PANEL DESCRIPTION.....	3
3. SPECIFICATIONS.....	3
4. SPECTRUM FOR PHOTO DETECTOR.....	6
5. MEASURING PROCEDURE.....	7
6. MAINTENANCE.....	8
7. RECOMMENDED ILLUMINATION.....	9

## **1. FEATURES**

- \* Precise and easy readout.
- \* High accuracy and wide measurement range.
- \* LSI-circuit use provides high reliability and durability.
- \* In build LOW BATTERY indicator.
- \* LCD display allows clear read out even at bright places.
- \* LCD display provides low power consumption.
- \* Compact, lightweight, and excellent operation.
- \* Separate PHOTO DETECTOR allows user take measurements at an optimum position.
- \* Data Hold function for holding measuring values.



## **2. FRONT PANEL DESCRIPTION**

- ① HOLD key
- ② Photo Detector
- ③ LCD display
- ④ Function switch
- ⑤ POWER key

## **3. SPECIFICATIONS**

### **3-1 General Specification**

Environment Conditions:

Operating Temperature: 0°C to 40°C ≤80% RH, non-condensing

Storage Temperature: -10°C to 60°C ≤70% RH, battery removed

Operating principle: dual slop integration

Sample Rate: 2 times/sec for digital data

Display: 3 1/2 digits LCD Display with max. Reading 1999,

Over-range Display: "1" is displayed.

Power Supply: DC 9V battery (NEDA 1604 6F22 006P).

Low Battery Indicator:


The "" is displayed when the battery is under the proper operation range.

Photo Detector Lead Length: 150cm (approx.)

Photo Detector Size: 83×52×20.5mm

Dimension: 125.5(L)×72(W)×27(H)mm

Weight: 140g approx. (battery removed)

Accessories: Carrying case, battery, user's manual

**3-2 Technical Specification**

Accuracy:  $\pm$ (% of reading + number of digits) at 18°C to 28°C (64°F to 82°F) with relative humidity to 80%.

Range	Resolution	accuracy
0-1,999 Lux	1 Lux	$\pm$ (5%+2d)
2,000-19,990 Lux	10 Lux	$\pm$ (5%+2d)
20,000-50,000 Lux	100 Lux	$\pm$ (5%+2d)

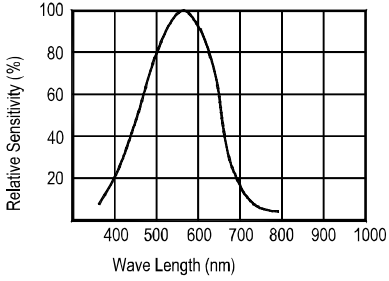
NOTE: Accuracy tested by a standard parallel light tungsten lamp of 2854 °K temperature

**3-3 Correction Factor**

- Mercury Lamp ..... x 1.1
- Fluorescent Lamp.....x 1.0
- Incandescent Light.....x 1.0

Daylight.....x 1.0

#### 4. SPECTRUM FOR PHOTO DETECTOR





## 5. MEASURING PROCEDURE

Power-up: Press the POWER key to turn the meter on.

Selecting the LUX scale: Set the Function switch to desired LUX range.

Face the photo detector to light source in a horizontal position.

Read the illuminance value from the LCD display.

Data-Hold mode: Press the HOLD key to select Hold mode. When HOLD mode is selected, the illuminance meter stops all further measurements. Press the HOLD key again to cancel HOLD mode. Then it resumes normal operation.

When the measurement is completed, turn the power off.

**NOTE:** If display indicates one or more leading zeros, user has to shift the Function switch to the next lower range scale to improve resolution and accuracy.

## **6. MAINTENANCE**


### **6-1 General maintenance**

To keep the instrument clean, wipe the case with a dry cloth and detergent, do not use abrasives or solvents.

The white plastic disc on the top of the detector should be cleaned with a damp cloth when necessary.

Any adjustment maintenance and repair shall be by a qualified person.

### **6-2 Battery Replacement**

When the battery voltage drop below proper operation range the  symbol will appear on the LCD display and the battery need to be replaced..

Slide the battery cover away from the instrument and remove the battery.

Replace with 9V battery and reinstall the cover

## 7. RECOMMENDED ILLUMINATION

<b>LOCATIONS</b>	<b>Lux</b>
<b>¥ OFFICE</b>	
Conference, Reception room.	200 ~ 750
Clerical work	700 ~ 1500
Typing, drafting	1000 ~ 2000
<b>¥ HOTEL</b>	
Public room, Cloakroom	100 ~ 200
Reception, Cashier	200 ~ 1000

<b>LOCATIONS</b>	<b>Lux</b>
<b>¥ FACTORY</b>	
Packing work, Entrance passage	<b>150 ~ 300</b>
Visual work at production line	<b>300 ~ 750</b>
Inspection work	<b>750 ~ 1500</b>
Electronic parts assembly line	<b>1500 ~ 3000</b>
<b>¥ STORE</b>	
Indoors, Stairs, Corridor	<b>150 ~ 200</b>
Show windows, Packing table	<b>750 ~ 1500</b>
Forefront of show windows	<b>1500 ~ 3000</b>

<b>LOCATIONS</b>	<b>Lux</b>
<b>¥ HOSPITAL</b>	
Sickroom, Warehouse	<b>100 ~ 200</b>
Medical Examination room	<b>200 ~ 750</b>
Operating room	<b>750 ~ 1500</b>
Emergency Treatment	<b>750 ~ 1500</b>
<b>¥ SCHOOL</b>	
Auditorium, Indoor Gymnasium	<b>100 ~ 300</b>
Class room	<b>300 ~ 750</b>
Laboratory, Library, Drafting room	<b>750 ~ 1500</b>

WLS211