# **MI-86A Infrared Sensor Instruction**



- Realize the ambient light illumination automatically.
- Adjust the detect time-delay discretionarily.
- Adjust the ambient light illumination discretionarily
- Various light source of E27 type can be installed.
- Available in ceiling mount and wall mount.
- Detect the infrared radiation signal from human body.

### Summary

1. The product is a PIR sensor and intelligent light, utilizes the infrared energy from human as control-signal source and determine the light to need to work or not, and control the light on and off automatically .

2. When one enters the detection filed and trigger the sensor to work ,the light turns on; when one leaves the detection filed and the setting time reaches, the light will turn off.

3. It can detect the ambient light illumination automatically and set and adjust the value according to the fact need. Such as, the light will turn on and works when the ambient light illumination is under setting value. once it exceeds the setting value, the light will stop working.

4. The light will be on until the time-delay comes when the sensor is triggered. Once detected the constant signal, the time will be overlaid and the light will be on constantly.

5. Standard lamp holder is E27, E26 lamp holder can be customized. Rated load and type refer to the specifications, the saving-energy light is recommended.

6. It can be installed in indoor, corridor and public-building.

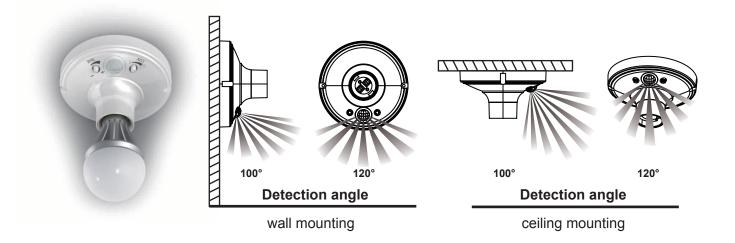
#### Specifications

Power source: 110V/AC-130V/AC □ 220V/AC-240V/AC □ Power frequency: 50/60Hz Rated load: 60W Max.(tungstencosφ=1) 110-130V/AC&220-240V/AC 600W Max.(tungstencosφ=0.5) 220-240V/AC 300W Max.(tungstencosφ=0.5) 110-130V/AC Detection range: 6-8m Time setting: 6S~7min±2min (adjustable) Light-control: 10~2000LUX (adjustable) Detection angle:120°/100° Applicable mounting :ceiling/wall Installation height:2.5~3.5m/1.5~3m(wall) Working temperature: -10°C ~40°C Working temperature: <93%RH Detection speed: 0.6 ~1.5m/s Lamp socket type: E27(Standard)

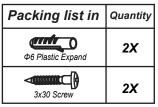
Available lamp type:



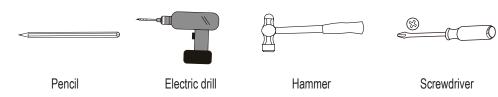
# **Sensor information**



# Procedure of installation



Note:Please bring the following tools



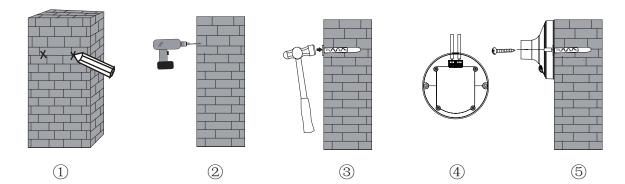


1. Please keep it away from the children.

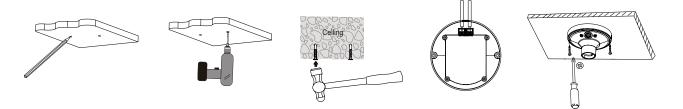
2. This product can installed for outdoor, but we suggest that against for the rain/storm & High lights.

- 1. Mark the place where the product is installed.
- 2. Drill the hole with inflated screw.
- 3. Fix the inflated screw with hammer.
- 4. Connect the power wiring.
- 5. Fix the product to the wall with screw.

# wall mounting



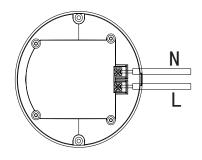
## ceiling mounting



- Turn off the power.
- The bottom-stand is fixed on the selected position with inflated screw.
- Connect the power into the connection-wire column of the sensor according to connection-wire diagram.
- Tighten the screw and switch on the power to test.
- Installation is ok.

## **Connection-wire diagram**

- 1. Unscrew the terminal screw.
- 2. Put the power line through the line hole to connect on the wiring L; N terminal.
- 3. Fix the screw.



## Structure and function display

**Time knob**: set and adjust the time that the light turns on under indicator signal condition to turn off under no indicator signal condition.

**Sensor**: assemble signal from human body and trigger the sensor lamp to work.

**Light-control knob**: set and adjust the ambient light illumination, the ambient light illumination dividing point both lights and little lights.

Lamp adapter: install the light source.



#### Test

1. Turn the LUX knob clockwise to max  $\dot{O}$ , turn the TIME knob anti-clockwise to min, after switching on the power approx 30sec, the controlled load start to work. As the light is off, the inductor gets signal and starts to work, as the light is on, the inductor stops working. Under the no inductor signals condition, the load should stop working within 6±2sec.

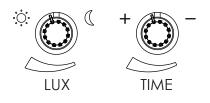
2. Turn the LUX knob clockwise to  $\dot{\dot{C}}$ , turn the TIME knob clockwise to max, the load starts to work .Under the no inductor signals condition, the load should stop working within 7±2 minutes.

3. Turn the LUX knob clockwise to  $\mathcal{D}$ , turn the TIME knob anti-clockwise to min; the ambient-light more than 10lux during test, the indicator lamp will stop working as the load stop working; If you cover the detection window with the opaque objects (towel elc), the load should work. Under the no inductor signals condition, the load should stop working within 6±2sec.

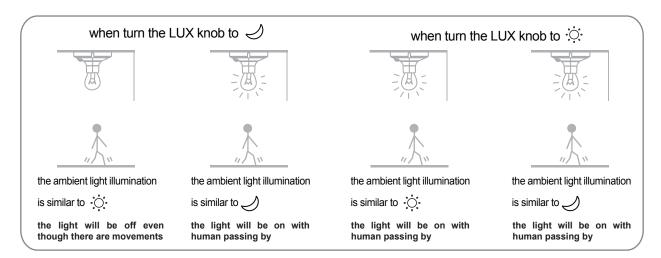
## **Function setting**

**Lux knob**: when the light begins to turn on, set the ambient light illumination by adjusting the LUX knob to the appropriate location.

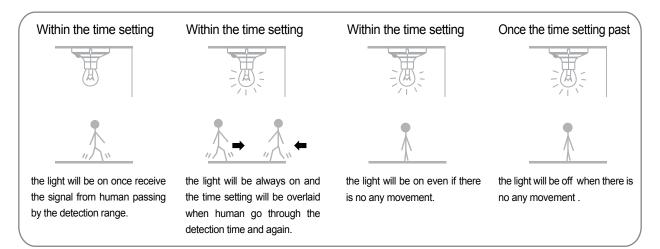
**Time knob**: In order to set the time from on to off, adjust he TIME knob to the appropriate location .



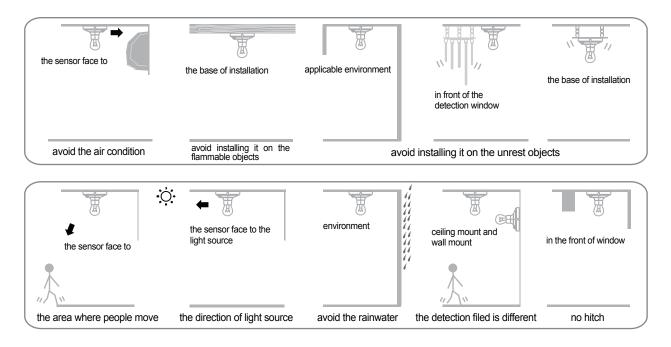
## Operating principle of the light-control



## **Operating principle of time-setting**



# Pay attention to installation



## Remark

- 1. Keep the sensor face to the area where human usually move.
- 2. Keep the sensor face to the position of the ambient light in order to get much more exact illuminance setting.
- 3. The detection range is different between ceiling mount and wall mount.
- 4. If detect the signal again within the time-delay, the time-delay will be over lied.
- 5. LUX knob: the luminance of working conditions . When the knob switches, it means it can detect all day, when the knob switches, it will only work below the luminance <10 LUX.
- 6. TIME knob: It is a period that the light turns on slowly to no any signal gradually, till out of work.



- 1. Should be installed by electrician or experienced man.
- 2. Should be installed in indoor in order to avoid the rainwater.
- 3. Avoid installing it on the unrest objects.
- 4. Avoid installing it on the flammable objects.
- 5. There shouldn't be hindrance in front of the detection window effecting detection.
- 6. There shouldn't be moving object in front of the detection window.
- 7. Avoid installing it near air temperature alteration zones such as air condition, central heating, etc.
- 8. Considering your safety, please don't open the cover when you find the hitch after installation.