深圳市越宏普照照明科技有限公司

技术规格书

TECHNICAL SPECIFICATION

一、 概述　Summary

　　2.4G 无线智能 LED 灯控制系统包含超薄 LED 电源、主控制盒、无线开关（感应器）、LED 灯四部分，本规格书仅定义主控制盒、无线开关（感应器）的技术参数及相关安装、使用说明，电源、LED 灯部分请另行查阅对应资料。

　　RF 2.4G wireless smart LED control system include four parts ： supper thin LED driver、main control box、wireless sensor、LED light，this technical specification only for the main control box and the wireless sensor.

二、 技术要求及参数　Technology requirement

1.1　使用环境　Environment

工作条件：环境温度-20℃ 至+45℃、湿度 10%RH-65%RH。
Work condition: temperature -20 degree ~ +45 degree 、humidity 10% ~ /65%.
存储条件： 温度-20℃ 至+60℃、湿度 10%RH~65%RH。
Storage condition: temperature -20 degree ~ +60 degree 、humidity 10% ~65%.

1.2　电性参数 Electronic Parameter

A　主控制盒（Main Control Box）

- 无线类型（Wireless Type）：RF 2.4G
- 无线通讯距离（Wireless Communication Range）>6m
- 输入电压（Input Voltage）：DC 12V/24V
- 输入电流（Input Current）：5A　Max
- 待机电流（Standby Current）：<20mA
- 输出端口（Output Port）：6（each　port 2.5A　max）+1（8A　max）;
- 输出功率（Output Wattage）：10W*6@12V；15W*6@24V
- 调光方式（Dimming Type）：PWM　1Khz
- 渐亮渐灭时间(Soft On/Off Time)：1S

B　Switch(Sensor)

- 无线类型（Wireless Type）：RF 2.4G
- 无线通讯距离（Wireless Communication Range）>6m
- 开关种类（Switch Type）：Touch、IR、PIR
- 供电类型（Power Supply Type）：Button Battery 3V CR2450

- 待机电流（Standby Current）：<20uA
- 红外感应距离（IR Sensor Detection Range）：0~50mm
- PIR 感应距离（PIR Sensor Detection Range）：0~3000mm

1.3　特性 Features

A　主控制盒（**Main Control Box**）
- 6 个常规 DC 输出端口+1 个大电流 DC 输出端口；
  Six Normal DC output and one large current DC output;
- 支持多种类型探头接入；
  Support various kinds of sensor;
- 最大支持 16 个探头接入；
  Support online Sensors 16PCS max;
- 掉电记忆功能；
  Voltage drop memory function;
- 渐亮渐灭功能；
  Soft ON or OFF function;
- 可单机也可多机联机工作；
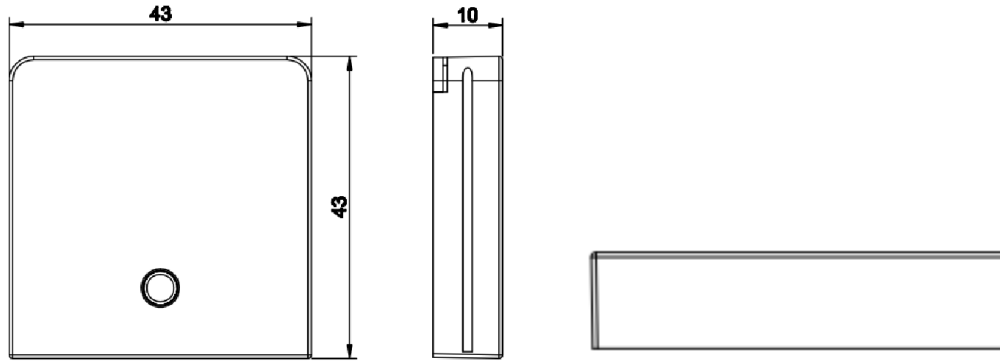 Single box mode or multi box mode;

B　Switch(Sensor)
- 表贴与嵌入式安装底座
  Recessed and surface mounting base;
- 小巧易安装
  Small and easy for installation;
- 低功耗待机
  Low energy standby;
- 多种类感应器以适用不同应用场景
  Various kinds of sensor for different application scenario;
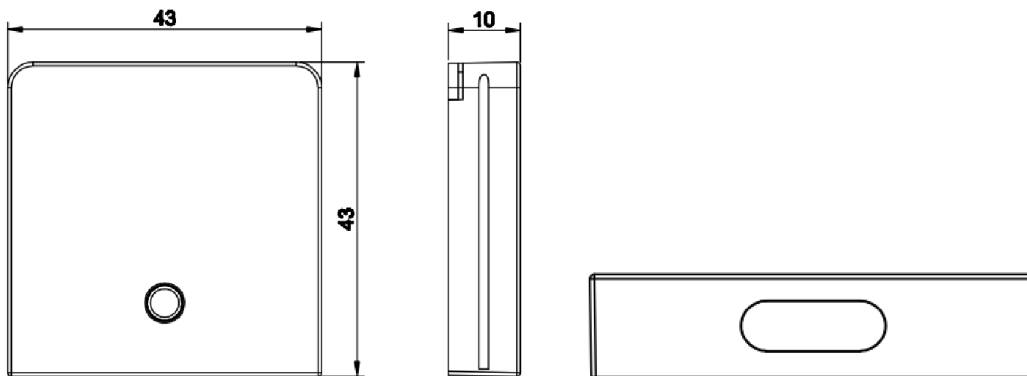
三.　外观及尺寸 Appearance & Size
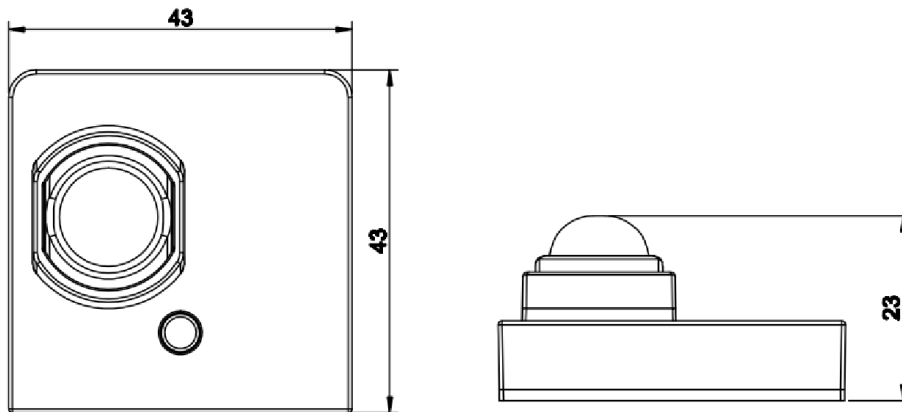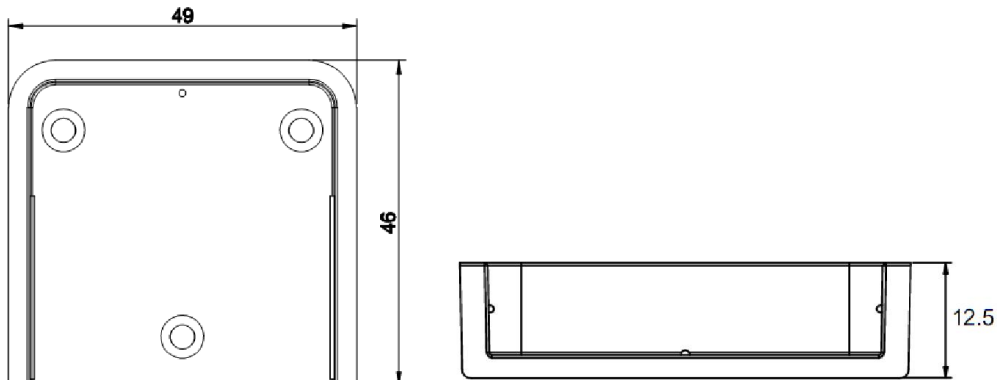
主控制盒（**Main Control Box**）
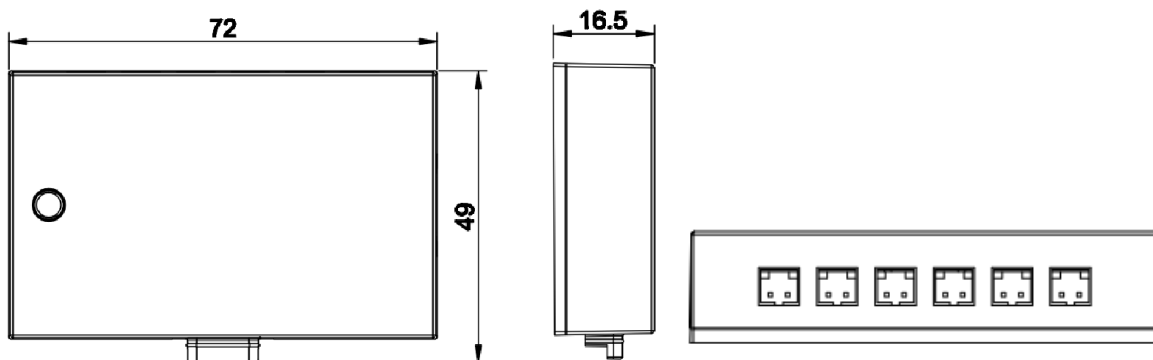
触摸开关（Touch Switch）

IR 开关（IR Switch）

PIR 开关（PIR Sensor）

安装座（Mounting Base）

四．应用 Application

1. 本系统产品广泛应用于橱柜照明，可选取不同的开关或感应器满足不同的单一或者群组应用场景。

   These products are widely used in cabinet lighting. Different switches or sensors can be selected to satisfy single or group application scenarios.

2. IR 系列开关（感应器）有 ON_OFF、Dimmer、Door 三个类型。

   IR series switches (sensors) have three types: ON_OFF, Dimmer, and Door.

3. Touch 系列开关（感应器）有 ON_OFF、Dimmer 两个类型。

   Touch series switches (sensors) have two types: ON_OFF, Dimmer.

4. Motion 系列开关（感应器）有 PIR 一个类型。

   Motion series switches (sensors) have one type: PIR.

5. 使用说明 Instruction

   5.1 主控制盒插接于本公司配套的 Class II 电源上；

   The main control box plugged into our company's Class II power supply.

   5.2 主控制盒输出口配接符合电压要求的 LED 灯；

   The output of the main control box is matched with the LED lamp that meets the voltage requirements.

   5.3 在首次应用前，需要根据场景需求进行主控制盒与开关（感应器）对码设置，对码步骤如下：

   Before the first application, the main control box and the switch (sensor) must be set according to the scene requirements as follows:

   5.3.1 把主控制盒的电源由关闭启动一次，主控制盒红色指示灯长亮。

   Turn on the power of the main control box once from the off state. The red indicator of the main control box is on.

   5.3.2 在主控制盒红色指示灯长亮的时候，按所要关联的开关或感应器的按键一次，看到主控制盒红色指示灯闪动三次表示对码成功。

   When the red LED of the main control box is on, press the button of the switch or sensor you want to associate with. The red indicator of the main control box flashes three times indicate that the code set successfully.

   5.3.3 如有需要继续按 2.2 步骤关联其它开关或感应器。

   If necessary, continue to follow steps 2.2 to associate other switches or sensors.

   5.3.4 关联好的开关或感应器已经可以控制连接至主控制盒的 LED 灯具了。

   Associated switches or sensors already can control the LED lamps which connected to the main control box.

   5.4 开关（感应器）操作 Switch（Sensor）Operating

   5.4.1 IR ON_OFF 开关（感应器）对好码后，在 IR 窗口前方 50mm 内，手掌或非透明物体划过一次即可触发主控制盒上的 LED 灯进行一次亮或者灭。

   After the IR ON_OFF switch (sensor) is coded, within 50 mm in front of the IR window, the palm or a non-transparent object can be stroked once to trigger the LED on the main control box to turn on or off once.

   5.4.2 IR Dimmer 开关（感应器）对好码后，在 IR 窗口前方 50mm 内，手掌或非透明物体划过一次即可触发主控制盒上的 LED 灯进行一次亮或者灭，遮挡在前方不动则可以进行调光；

   调光遵循反方向调光原则，比如上次调光是减暗，则当前调光就会增亮，反之亦然；当调至最暗或最亮的时候，亮度将维持不变；从最暗调至 100%

亮度约 5S；

After IR Dimmer switch (sensor) is coded, within 50mm in front of the IR window, palm or non-transparent objects across once can trigger the LED lights on the main control box to make a light on or off, blocking the front can Dimming;

Dimming follows the principle of dimming in the opposite direction. For example, if the last dimming is darken, the current dimming will brighten, and vice versa; when dimmed or brightest, the luminance will not be maintained. Change from darkest to 100% brightness about 5S.

5.4.3 IR Door 开关（感应器）对好码后，在 IR 窗口前方 50㎜ 内无非透明物体则 LED 灯点亮，否则熄灭。

群组内多个 Door 开关（感应器）时逻辑功能：所有 OFF 即 OFF，有 ON 就 ON；

After IR Door switch (sensor) is coded, within 50mm in front of the IR window, without palm or non-transparent objects, the LED lights turn on otherwise turn off.

More Door sensor in group logic: any sensor turn on the LED light is on, all sensors turn off the LED light is off.

5.4.4 Touch ON_OFF 开关（感应器）对好码后，触摸开关一次即可触发主控制盒上的 LED 灯进行一次亮或者灭。

After Touch ON_OFF switch (sensor) is coded, touch the switch once to trigger the LED light on/off on the main control box .

5.4.5 Touch Dimmer 开关（感应器）对好码后，触摸开关一次即可触发主控制盒上的 LED 灯进行一次亮或者灭，按住触摸开关不动，LED 灯可进行调光；调光遵循反方向调光原则，比如上次调光是减暗，则当前调光就会增亮，反之亦然；当调至最暗或最亮的时候，亮度将维持不变；从最暗调至 100% 亮度约 5S；

After Touch Dimmer switch (sensor) is coded, touch the switch once to trigger the LED lights on/off, press the touch switch and does not move, LED lights can be dimming; Dimming follows the opposite direction Light principle, such as the last dimming is darken, the current dimming will increase brightness, and vice versa; when adjusted to the darkest or brightest, the brightness will remain unchanged; from the darkest to 100% brightness About 5S.

5.4.6 PIR 开关（感应器）对好码后，在其前方 3m 内有人体移动，即可触发主控制盒上的 LED 灯点亮，直至人体静止或离开 30S 后，LED 灯自动熄灭。

After the PIR switch (sensor) is coded, when human-body moves in the detection of range (0-3m), light will turn on. Until the human body is stationary or leave for 30 seconds, the LED light automatically off.

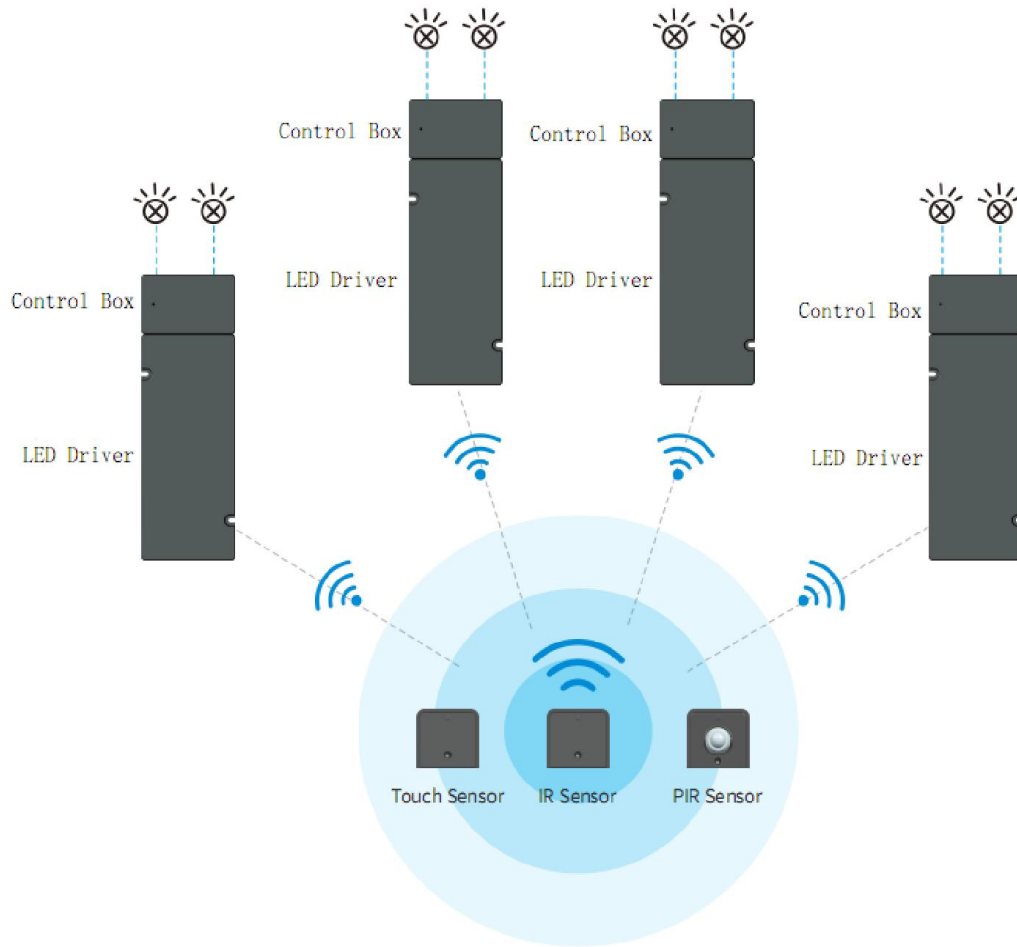5.5 开机渐亮与关机渐灭功能：LED 灯开启时由灭逐渐慢慢点亮，关灯时慢慢熄灭（100%亮度时开关灯效果明显）。

Power-on and off gradually fade function: LED lights gradually turn off from the moment of light off, turn off the light slowly extinguished (100% brightness switch light effect is obvious).

5.6 记忆功能：LED 灯调整至开、关、随意亮度的任意状态，直接关闭控制盒电源，当再次开启电源的时候，LED 灯恢复至关闭电源时的状态。

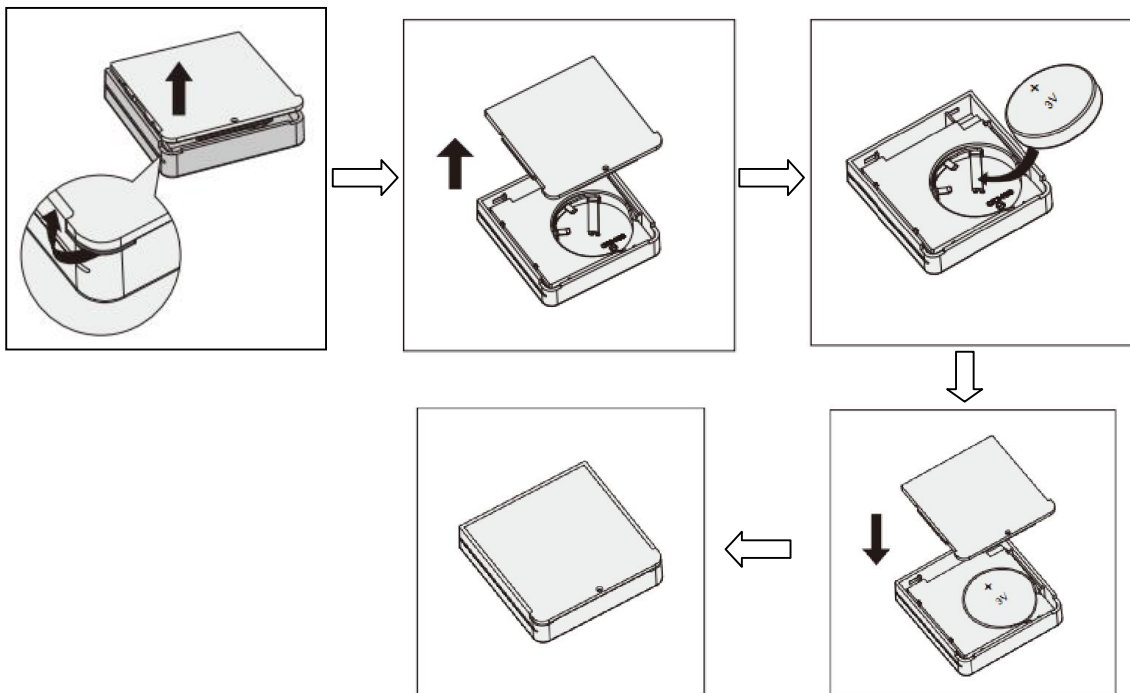Memory function: LED lights to adjust any state of open/off, and any arbitrary

brightness, directly close the control box power supply, when the power is turned on again, the LED lights to return to the state of power off.
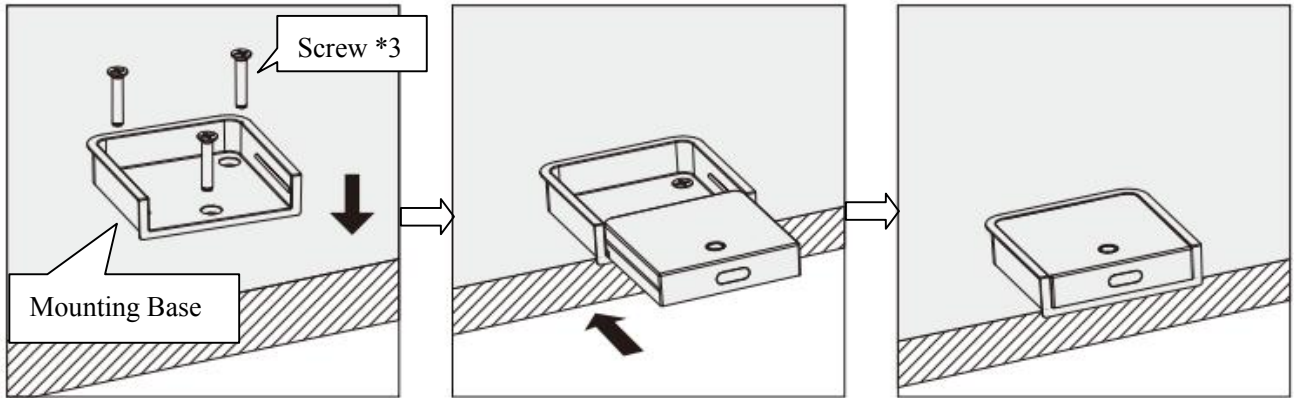
6. 群组模式示意图 Group Model

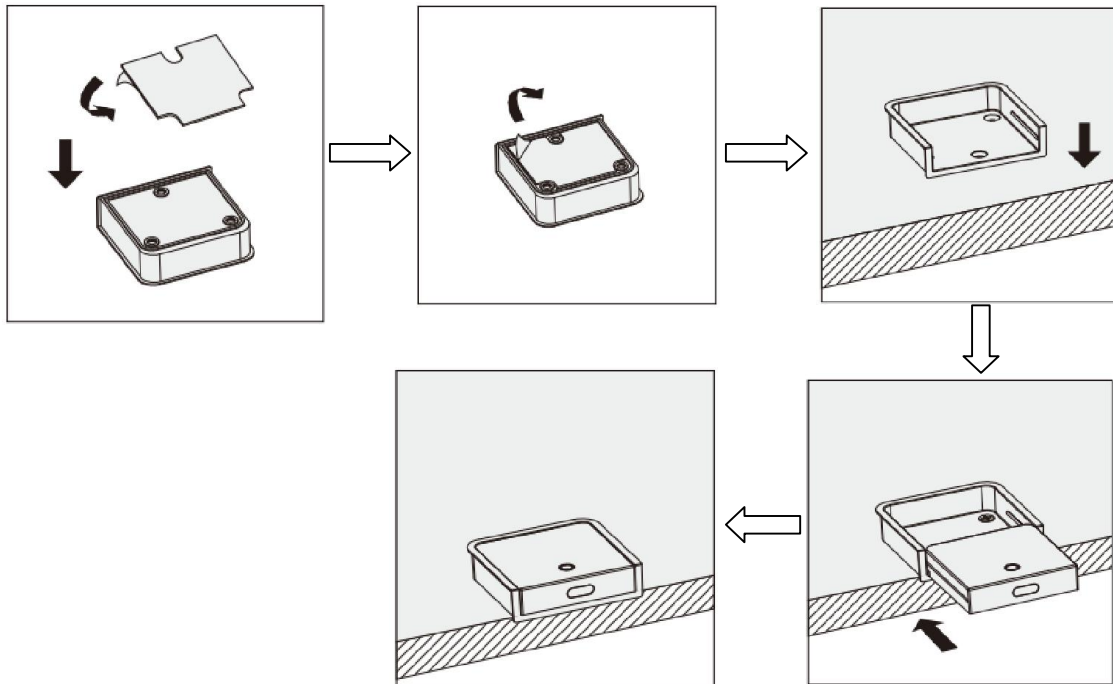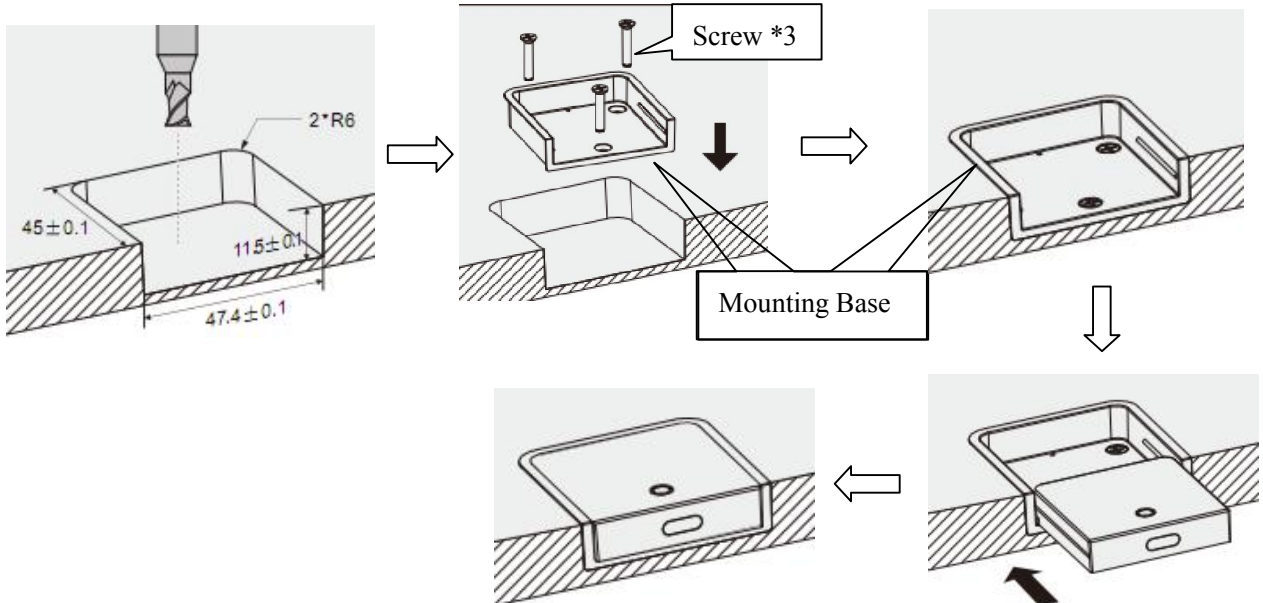# 五．开关（感应器）安装图　**Switch（Sensors）installation instruction**

Surface mounting

Screw *3

Mounting Base

OR

Access mounting

2*R6

45±0.1

115±0.1

47.4±0.1

Screw *3

Mounting Base

OR
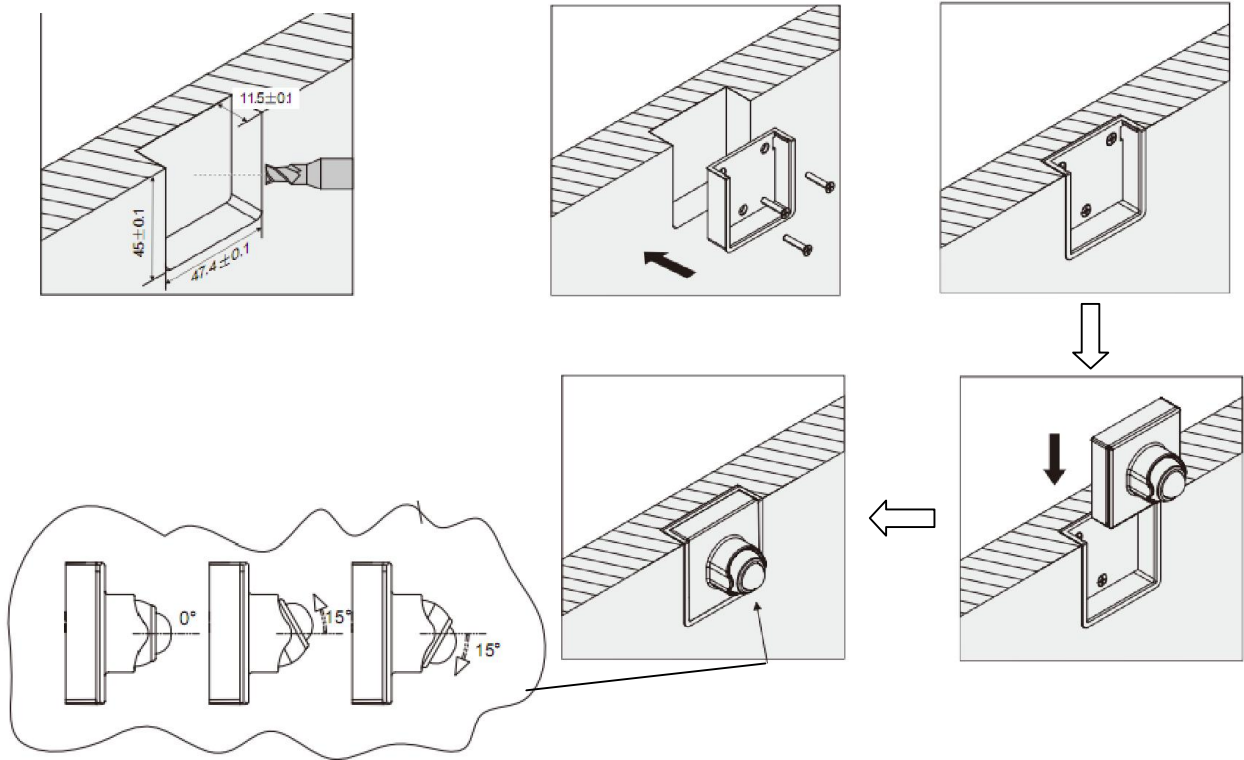
六．图标（**Symbol**）

	Touch ON_OFF Switch
	Touch Dimming Switch
	IR ON_OFF Switch
	IR Dimming Switch
	IR Door Switch

七．包装方式（**Packaging**）

x 100

x 50