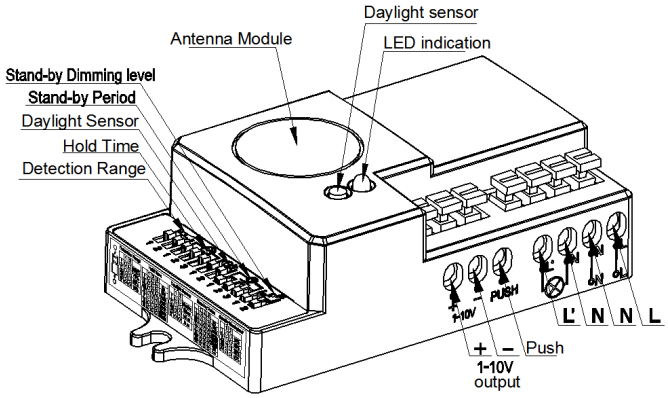
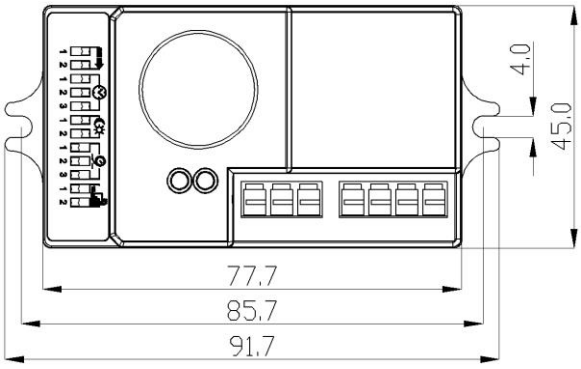
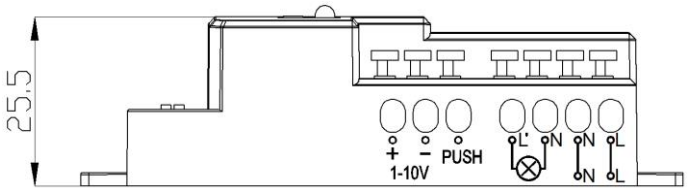
Microwave Sensor

Model: ST760



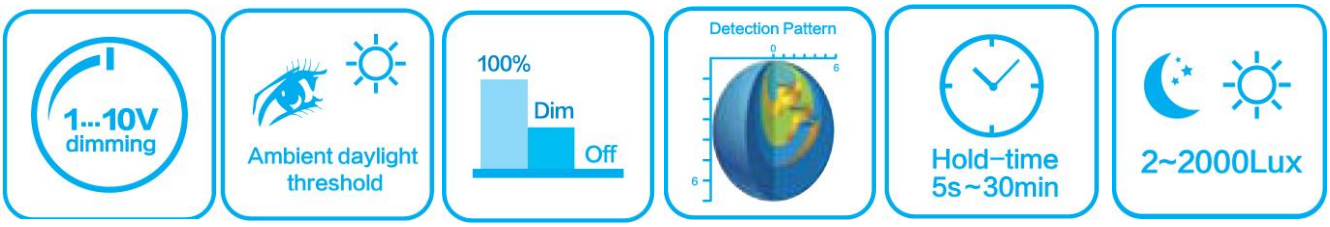




Welcome to use ST760 Microwave dimming Sensor!

The product is a new saving-energy switch; it adopts microwave sensor mould with high-frequency electro-magnetic wave (5.8GHz) and integrated circuit. It gathers automatism, convenience, safety, saving-energy and practicality functions. The wide detection field depends on detectors. It works by receiving human motion. When one enters the detection field, it can start the load at once and identify

automatically day and night. Its installation is very convenient and its using is very wide. Detection is possible to go through doors, panes of glass or thin walls.



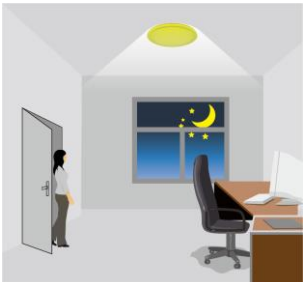
SPECIFICATION:

Power Source: 220 -240V/AC
Power Frequency: 50/60Hz
Detection angle:180° /360°
Detection Range:10%, 50%, 75%, 100%(choice)
Daylight sensor: 2lux, 10lux, 50lux, 2000lux (choice)
Detection Distance: wall: 5-15m (adjustable)
ceiling: 1-8m (radius), adjustable
Transmission Power: <0.2mW
HF System: 5.8GHz CW radar, ISM band
Hold Time: 5s, 30s, 1min, 5min, 10 min, 20min, 30min (choice)
Installing Height: wall: 1.5-3.5m
ceiling: 2-8m
Power Consumption: approx 0.9W
Detection Motion Speed: 0.6-1.5m/s
Stand-by Period: 10s, 1min, 5min, 10min, 30min, 1H, +∞,0s (choice)
Stand-by Dimming Level: 10%, 20%, 30%, 50% (choice)
Rated Load: Max.600W

FUNCTION:

- Can identify day and night: It can work in the daytime and at night when two knobs are on above position (Daylight Sensor). It can work in the ambient light less than 2LUX when two knobs are on below position (Daylight Sensor). As for the adjustment pattern, please refer to the testing pattern.
- Hold time is optional. It can be set according to the consumer's desire. The minimum time is 5sec.The maximum is 30min.
- It offers 3 levels of light: 100 %--> dimmed light (10%, 20%, 30%, 50% optional) -->off; and 2 periods of selectable waiting time, motion hold time and stand-by period; selectable LUX value and choice of detection area.

With ambient light more than daylight threshold, the lamp does not switch on when someone enters the room

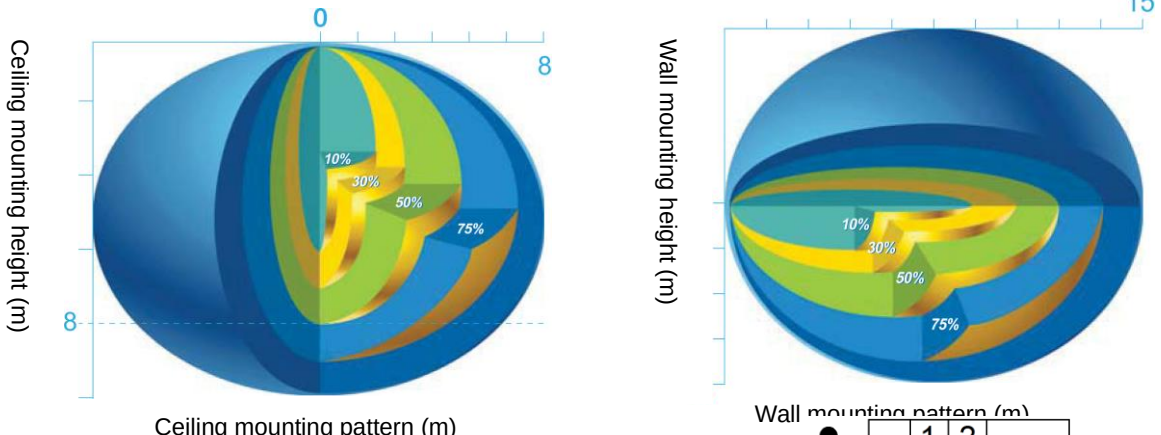


With ambient light less than daylight threshold, the lamp will be on 100% when someone enters the room

People left, light dims to 10%/20/30%/50% (optional) stand-by level after hold time

Light switches off automatically after the stand-by period elapsed

DETECTION PATTERN:



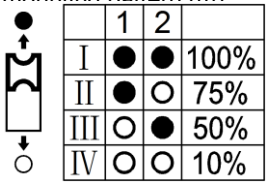
Ceiling mounting pattern (m)

Wall mounting pattern (m)

SETTING:

Detection Range

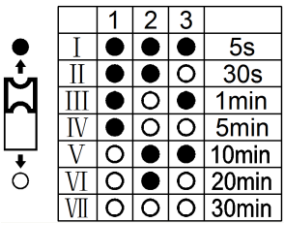
Detection distance can be set with different combinations of DIP switches to precisely fit for each specific application



	1	2	
I	●	●	100%
II	●	○	75%
III	○	●	50%
IV	○	○	10%

Hold Time

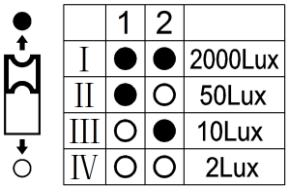
Hold Time means the time period you would like to keep the lamp on 100% after the person has left the detection distance



	1	2	3	
I	●	●	●	5s
II	●	●	○	30s
III	●	○	●	1min
IV	●	○	○	5min
V	○	●	●	10min
VI	○	●	○	20min
VII	○	○	○	30min

Daylight Sensor

The LUX value can be set on DIP switches in order to fit different ambient light.



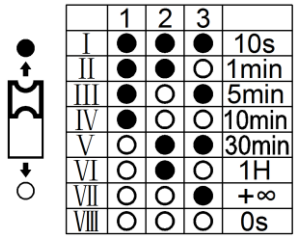
	1	2	
I	●	●	2000Lux
II	●	○	50Lux
III	○	●	10Lux
IV	○	○	2Lux

Stand-by Period

This time period you would like to keep at the low light output level before it is completely switched off in the long absence person

Note:"+∞ "means fixture keeps on stand-by dimming level and never switches off.

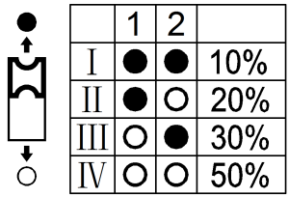
"0s" means no dimming function



	1	2	3	
I	●	●	●	10s
II	●	●	○	1min
III	●	○	●	5min
IV	●	○	○	10min
V	○	●	●	30min
VI	○	●	○	1H
VII	○	○	●	+∞
VIII	○	○	○	0s

Stand-by Dimming level

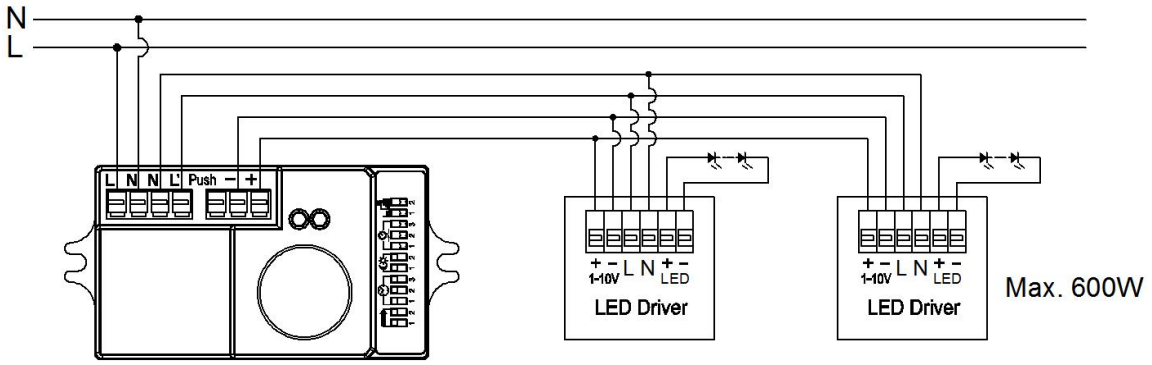
This is dimmed low light control light output level you would like to have after the hold time in the absence person



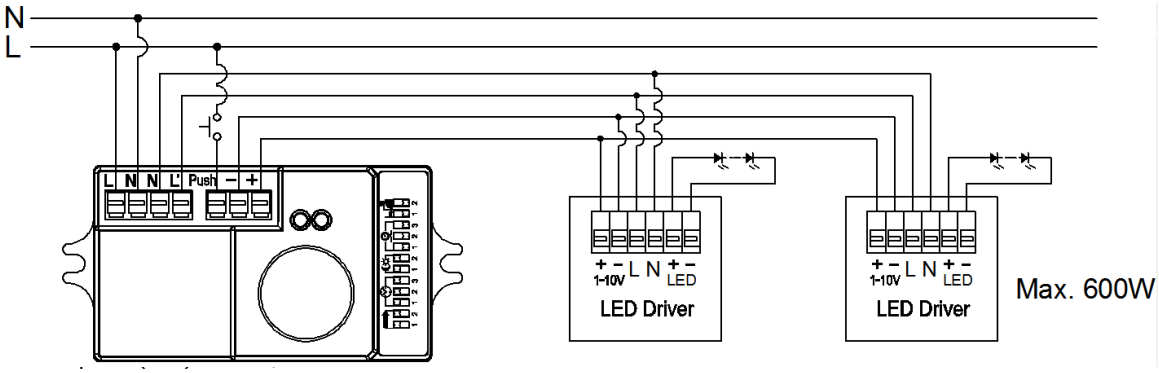
	1	2	
I	●	●	10%
II	●	○	20%
III	○	●	30%
IV	○	○	50%

CONNECTION-WIRE DIAGRAM: (have two connection-wire mode)

1、first connection-wire diagram(without push-switch)



2、second connection-wire diagram(with push-switch)



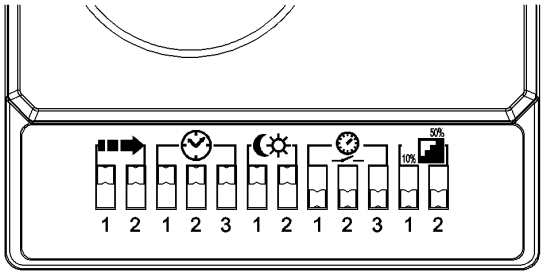
ON → OFF: The light turns off immediately and can not be on for 1min,even movement is detected. After this period, the sensor goes to auto sensor mode.

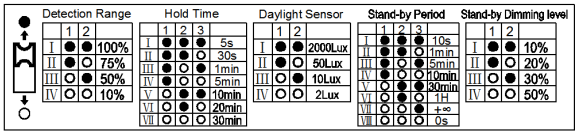
OFF → ON: The light turns on 100% and goes to sensor mode.

* Long push (>1s): Dim up/down the stand-by dimming level between 10% and 50%. Both the settings on DIP switch and manual override can overwrite each other, the latest action stays in validity.

TEST:

- Slide the all knobs on"above" position. When you switch on the power, the light will be on at once, and 5 sec later without induction signal the light will turn off quickly. Then if the sensor receives induction signal, it can work normally
- Adjust the stand-by period to "10s", when the sensor receives induction signal, the light will be 100% on; 5sec later, the light dims quickly to 10% on for 10sec and then turn off. If the sensor receives second induction signal within the stand-by period, the light will be 100% on.





NOTES：

- Electrician or experienced human can install it.
- Can not be installed on the uneven and shaky surface
- In front of the sensor there shouldn't be obstructive object affecting detection.
- Avoid installing it near the metal and glass which may affect the sensor.
- For your safety, please don't open the case if you find hitch after installation.
- In order to avoid the unexpected damage of product, please add a safe device of current 6A when

installing microwave sensor, for example, fuse, safe tube etc.

- Motion sensor overrides daylight sensor, meaning the daylight sensor starts to check the ambient natural light only when the lamp is switched off (motion hold-time elapsed).
- This 1-10V output is no insulated; please make sure the fixture is constructed according to relevant safety standard.

SOME PROBLEM AND SOLVED WAY:

- The load don't work:
  a. Check the power and the load.
  b. Whether the indicator light is turned on after sensing? If yes, please check load.
- The sensitivity is poor:
  a. Please check if in front of the sensor there shouldn't be obstructive object that affect to receive the signals.
  b. Please check if the signal source is in the detection fields.
  c. Please check the installation height.