UFOHJ High Bay Datasheet

sensing

Key Features

⇒ **Efficacy:** Up to 160 lm/w

⇒ **LED Chip:** SMD2835

⇒ **SDCM:** <5

⇒ **Adjustable CCT and Adjustable Power**

⇒ **Beam Angle:** 60°|90°|120° PC lens

⇒ **IP Rating:** IP65

⇒ **Controls:** Microwave | Daylight | Infrared sensor

⇒ **Installation:** Eye Bolt; Bracket

⇒ **Certifications:** CE, RoHS
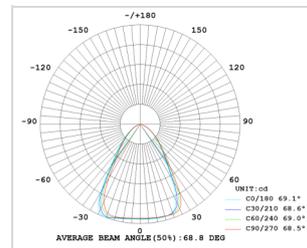
⇒ **Warranty:** 5 years

Application

Warehouses, libraries, workshops, shopping malls, supermarkets, shops, restaurants, sports centers, cinemas, hospitals, clothing stores, bars and other indoor lighting places.
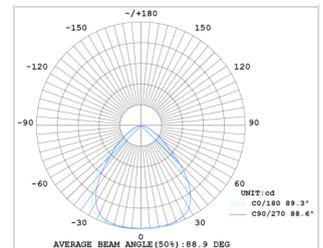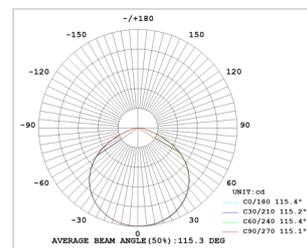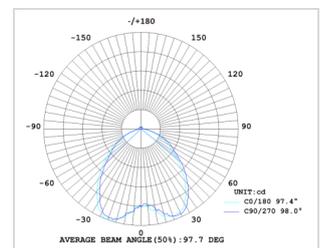
Photometry

60° PC lens

UNIT:cd
C0/180 69.1°
C30/210 68.6°
C60/240 69.0°
C90/270 68.5°
AVERAGE BEAM ANGLE(50%):68.8 DEG

90° PC lens

UNIT:cd
C0/180 89.3°
C90/270 88.6°
AVERAGE BEAM ANGLE(50%):88.9 DEG

120° PC lens

UNIT:cd
C0/180 115.4°
C30/210 115.2°
C60/240 115.4°
C90/270 115.1°
AVERAGE BEAM ANGLE(50%):115.3 DEG

90° PC Reflector

UNIT:cd
C0/180 97.4°
C90/270 98.0°
AVERAGE BEAM ANGLE(50%):97.7 DEG

90° AL Reflector

UNIT:cd
C0/180 88.2°
C90/270 88.2°
AVERAGE BEAM ANGLE(60%):88.2 DEG

A 200W
B 150W
C 100W

CW NW WW

KML

www.kmlled.com
Add: Room 901, Building A, FuBiLun Industrial Park, ChaoYang Road, YanChuan Community, YanLuo Street, Bao'an, ShenZhen City, China.

UFOHJ High Bay Datasheet

Product Data

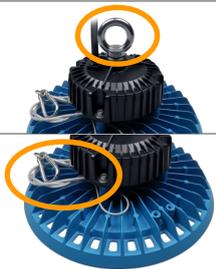| Model No.	KML-UFOH100J	KML-UFOH150J	KML-UFOH200J	KML-UFOH240J	KML-UFOH300J
Power	100W	150W	200W	240W	300W
Adjustable Power	60W|80W|100W	80W|100W|150W	100W|150W|200W	150W|200W|240W	/
Lumen Output	16,000lm	24,000lm	32,000lm	38,400lm	48,000lm
Luminous Efficacy	160 lm/w (adjustable CCT: 130 lm/w to 150 lm/w)				
CCT	3000K|4000K|5000K|5700K|6500K；Adjustable CCT: 3000K|4350K|5700K				
CRI	Ra≥70 (Ra≥80 optional)				
Input Voltage	100-277 VAC				
Housing Color	Black				
Housing Material	Aluminum(ADC12), PC				
Operating Temperature	-20°C to +50°C				
Operating Humidity	10% to 90% RH				
Lifespan	100,000 hours				
Warranty	5 years				

ErP Technical Specification

Item	Specification/Data
Efficiency In	>93%
Power Factor	PF>0.90
Energy Efficiency Class	D
Standard Deviation of Color Matching	<5
Starting Time	<0.2S
Warm-up Time to 60%	<0.5S
Lumen Maintenance at e.o.l.	>70%
Lifetime	L70/B10@100,000hours

Mounting & Accessories

	Eye Bolt
	Model No.: M10 Steel; Silver
	Safety Rope
	Model No.: UFO-SR Stainless Steel; Silver

Mounting (optional)

	Bracket
	Model No.: UFOHJ-ZJ Steel; Black
	Remote Control
	Model No.: RC100 Plastic; black
	Microwave & Daylight Sensor
	Model No.: ANT-5-4 PC; Milky white
	Connecting Base
	Model No.: ANT-5-4B PC; Milky white
	Infrared Sensor
	Model No.: ANT-6-2 PC; Milky white
	AL Reflector
	Model No.: UFOHA1-DZ; Beam Angle: 90°; Applicable Power: 100W|150W|200W|240W|300W Aluminum; Silver
	PC Reflector
	Model No.: 310A(100W); 410C(150W); 500A(200W|240W|300W) PC; Transparent & Stripe
	PC Reflector Cover
	Model No.: 310CBL(310A)|410CBL(410C)|500CBL(500A) PC; Transparent & Stripe

UFOHJ High Bay Datasheet

Packaging

Model No.	PCS/CTN	N.W	G.W	Volumetric Weight	Carton Size and Volume	20GP(28m³)	40HC/HQ(68m³)
KML-UFOH100J	1	1.9 kg	2.5 kg	2.6 kg	L285xW285xH160 mm ≈ 0.013 m³	2,153 CTNS	5,230 CTNS
KML-UFOH150J	1	2.3 kg	3.0 kg	4.0 kg	L338xW338xH170 mm ≈ 0.019 m³	1,473 CTNS	3,578 CTNS
KML-UFOH200J	1	3.1 kg	3.9 kg	5.2 kg	L390xW390xH170 mm ≈ 0.026 m³	1,076 CTNS	2,615 CTNS
KML-UFOH240J	1	3.6kg	4.7 kg	8.0 kg	L445xW445xH190 mm ≈ 0.038 m³	736 CTNS	1,789 CTNS
KML-UFOH300J	1	3.9 kg	5.0 kg	8.0 kg	L445xW445xH190 mm ≈ 0.038 m³	736 CTNS	1,789 CTNS

Remarks: The weight of the above products is for reference only, and the weight of different configuration products will be different.
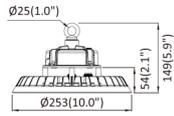
Packaging (PC reflector and cover)

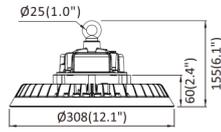| Model No.	PCS/CTN	N.W	G.W	Volumetric Weight	Carton Size and Volume	20GP(28m³)	40HC/HQ(68m³)
310A	24	0.48 kg/pcs	13.0 kg	20.0 kg	L620xW330xH490 ≈ 0.100 m³	280 CTNS	680 CTNS
410C	13	0.88 kg/pcs	13.0 kg	22.2 kg	L430xW430xH600 ≈ 0.111 m³	252 CTNS	612 CTNS
500A	13	1.54 kg/pcs	22.0 kg	32.5 kg	L500xW500xH650 ≈ 0.163 m³	171 CTNS	417 CTNS
310CBL	100	0.16 kg/pcs	18.0 kg	11.0 kg	L500xW330xH330 ≈ 0.054 m³	518 CTNS	1,259 CTNS
410CBL	25	0.34 kg/pcs	10.0 kg	5.6 kg	L430xW430xH150 ≈ 0.028 m³	1,000 CTNS	2,428 CTNS
500CBL	25	0.54 kg/pcs	15.0 kg	7.5 kg	L500xW500xH150 ≈ 0.038 m³	736 CTNS	1,789 CTNS

Remarks: The weight of the above products is for reference only, and the weight of different configuration products will be different.

Dimension (unit: mm/inch)
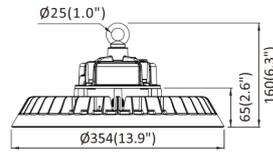
Ø25(1.0")
149(5.9")
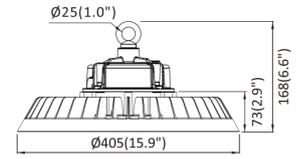54(2.1")
Ø253(10.0")

KML-UFOH100J

Ø25(1.0")
155(6.1")
60(2.4")
Ø308(12.1")

KML-UFOH150J

Ø25(1.0")
160(6.3")
65(2.6")
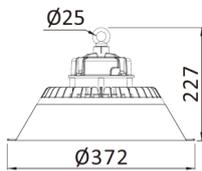Ø354(13.9")

KML-UFOH200J

Ø25(1.0")
168(6.6")
73(2.9")
Ø405(15.9")

KML-UFOH240J | KML-UFOH300J

And AL Reflector Dimension (unit: mm)

Ø25
227
Ø372

UFOH100A1-DZ

Ø25
228
Ø422

UFOH150A1-DZ

Ø25
242
Ø478

UFOH200A1-DZ

Ø25
247
Ø526
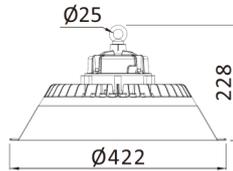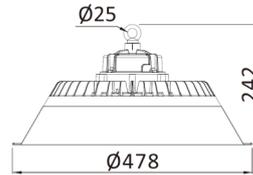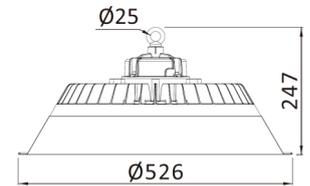
UFOH240A1-DZ/UFOH300A1-DZ

PC Reflector Dimension (unit: mm)

152(6.0")
Ø309(12.2")

310A

235(9.3")
Ø413(16.3")

410C

257(10.1")
Ø480(18.9")

500A

Ø309(12.2")
25(1.0")

310CBL

Ø413(16.3")
40(1.6")

410CBL

Ø480(18.9")
Ø40(1.6")
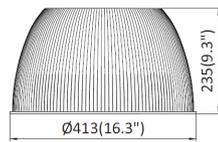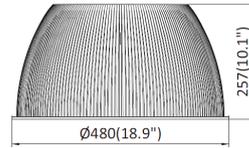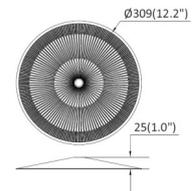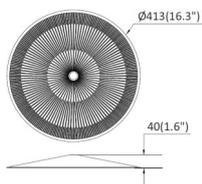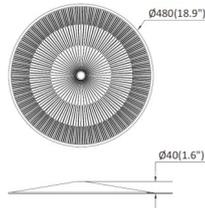
500CBL

DIP Switch Details

Features

⇒ **When the DIP switch is in the BHD state, the power and color temperature can be adjusted.**

⇒ **When the DIP switch is in the BHB state, the power can be adjusted.**
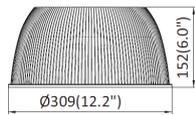
BHD: DIP power adjustment and DIP color temperature
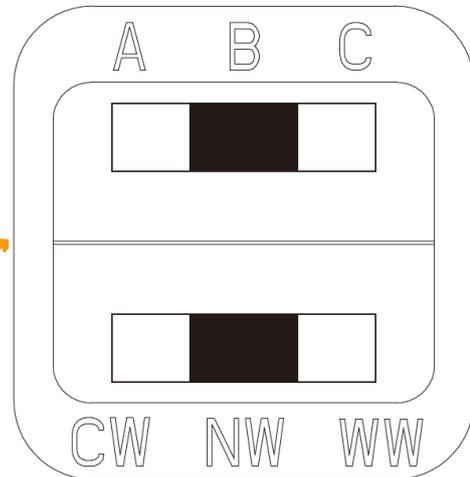
A: 200W, B:150W, C:100W
CW: 5700K, NW: 4350K, WW: 3000K

BHB: DIP power adjustment
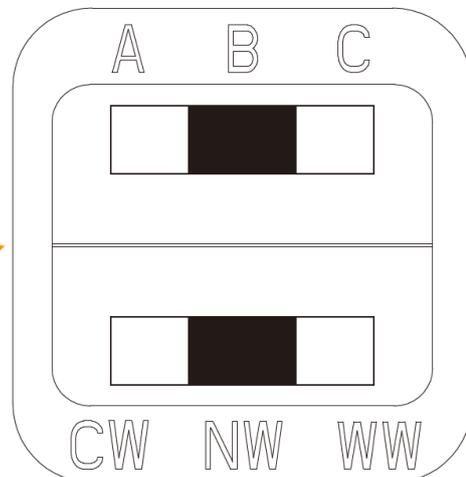
A: 200W, B:150W, C:100W
CW: none, NW: none, WW: none

Microwave Sensor Details
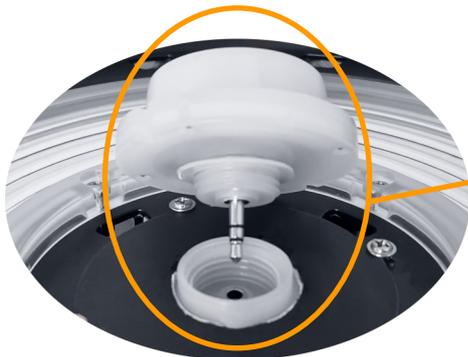
Features

⇒ **Patent plug-in design structure, sensor part can be easily mount after sale.**

⇒ **IP65 water-proof, long detection range when install 15m height.**

⇒ **Easy to wire inside sensor by screw terminals.**

Plug & Play Motion Sensor.

Regular Model.

Microwave Sensor Details

Microwave/Infrared

Installation height: <15 meters (microwave)

<12 meters (infrared)

Coverage Side View
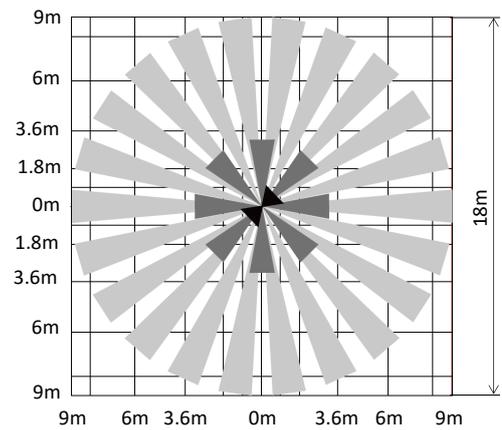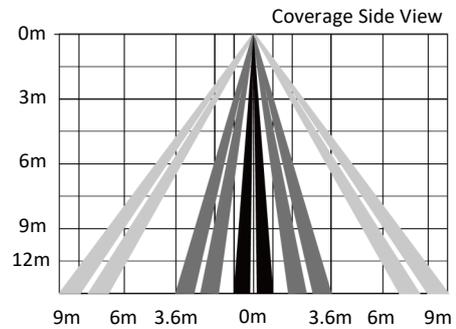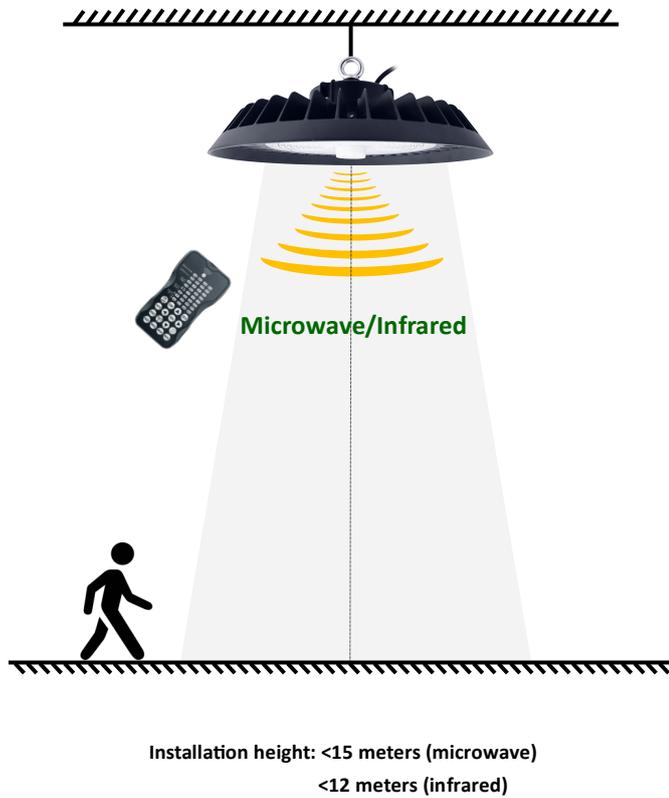
Technical Specification

Items	Specifications
HF System	5.8GHz±75MHz
Detection radius(1m to 8m)	20%/50%/75%/100%
Mounting height	<15 meters
Time setting	2S/1min/5min/10min/15min/20min/30min/60min
Light-control	24hours/10lux/30lux/50lux

KML

www.kmlled.com
Add: Room 901, Building A, FuBiLun Industrial Park, ChaoYang Road, YanChuan Community, YanLuo Street, Bao'an, ShenZhen City, China.

Microwave Sensor Details

Corridor Function

This function inside the motion sensor to achieve tri-level control, for some areas which require a light change notice before Switch-off. The sensor offers 3 levels of light: 100% → dimmed light (natural light is insufficient) → off; and 2 periods of selectable waiting time: motion hold-time and stand-by period; selectable daylight threshold and freedom of detection area.

With sufficient natural light, the light does not switch on when presence is detected.

With insufficient natural light, the sensor switches on the light automatically when presence is detected.

After hold-time, the light dims to stand-by level if the surrounding natural light is below the daylight threshold.

Light switches off automatically after the stand-by period elapses.

Daylight Sensor Function

Open the daylight sensor by push ⎍ when remote control is in setting condition.

❶ 21:00

❷ 21:10

❸ 21:40

Settings on this demonstration:
Hold-time: 30min
Setpoint on: 50lux
Setpoint off: 300lux
Stand-by Dim: 10%
Stand-by period: +∞
(When the smart photocell sensor open, the stand-by time is only +∞)

The light switches on at 100% when there is movement detected.

The light dims to stand-by level after the hold-time.

The light remains in dimming level at night.

❶ ⇄ ❸ goes in cycle at night ···
100% on when movement detected, and dims to 10% in long absence.

❹ 08:10

❺ 17:40

Power On

Off

Check

Every 30min

Dim

No motion

motion

100% On

Hold-time ends

When the natural light level exceeds setpoint off to light will turn off even if when the space is occupied.

The light automatically turns on at 10% when natural light is insufficient (no motion).

UFOHJ High Bay Datasheet

Infrared Sensor Details

⚠ **Warning**

⇒ **Warm up time is 15 seconds. After the sensor connects input power first time, the light will keep on 15 seconds, then go to dimming to work normally.**

⇒ **Factory Default Setting: 100% sensitivity, hold on time 5minutes, daylight sensor is sunshine, dimming level 30%, dimming time 60 minutes.**

⇒ **Any setting changed by remote control, the led light that sensor connect will on/off as confirm.**

Technical Specification

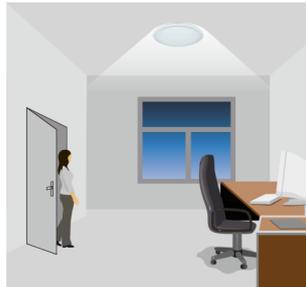| Items	Specifications
Remote range	<15 meters, indoor, no backlight
Detection radius(1m to 8m)	20%/50%/75%/100%
Mounting height	<12 meters
Time setting	10S/1min/5min/10min/15min/20min/30min/60min
Light-control	24hours/10lux/30lux/50lux

KML

www.kmlled.com
Add: Room 901, Building A, FuBiLun Industrial Park, ChaoYang Road, YanChuan Community, YanLuo Street, Bao'an, ShenZhen City, China.

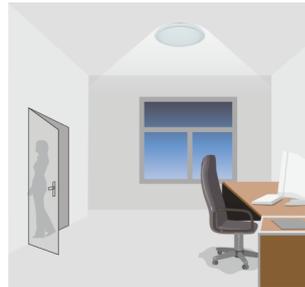## Infrared Sensor Details

Corridor Function

This function inside the motion sensor to achieve tri-level control, for some areas which require a light change notice before Switch-off. The sensor offers 3 levels of light: 100% → dimmed light (natural light is insufficient) → off; and 2 periods of selectable waiting time: motion hold-time and stand-by period; selectable daylight threshold and freedom of detection area.

With sufficient natural light, the light does not switch on when presence is detected.

With insufficient natural light, the sensor switches on the light automatically when presence is detected.

After hold-time, the light dims to stand-by level if the surrounding natural light is below the daylight threshold.
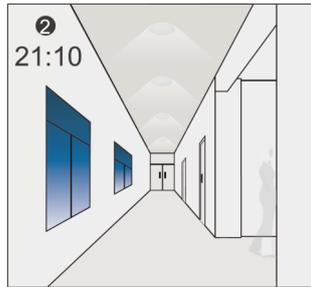
Light switches off automatically after the stand-by period elapses.
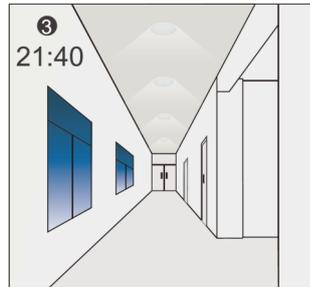
Daylight Sensor Function

Open the daylight sensor by push ⟨⊓⟩ when remote control is in setting condition.

❶ 21:00

❷ 21:10

❸ 21:40

Settings on this demonstration:
Hold-time: 30min
Setpoint on: 50lux
Setpoint off: 300lux
Stand-by Dim: 10%
Stand-by period: +∞
(When the smart photocell sensor open, the stand-by time is only +∞)

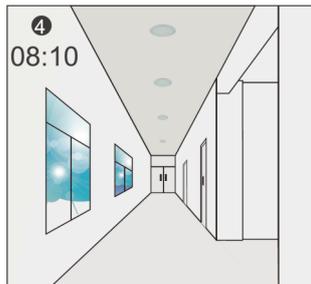The light switches on at 100% when there is movement detected.
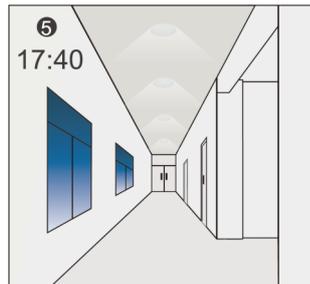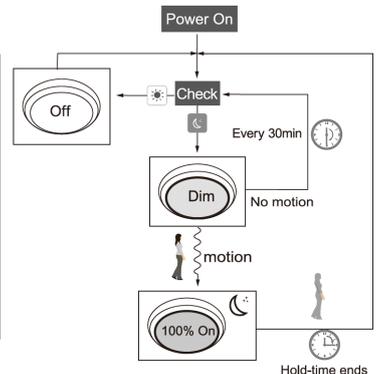
The light dims to stand-by level after the hold-time.

The light remains in dimming level at night.

❶ ⇄ ❸ goes in cycle at night ···

100% on when movement detected, and dims to 10% in long absence.

❹ 08:10

❺ 17:40

When the natural light level exceeds setpoint off to light will turn off even if when the space is occupied.

The light automatically turns on at 10% when natural light is insufficient (no motion).

Power On

Check

Off

Every 30min

Dim

No motion

motion

100% On

Hold-time ends

Remote Control Description

BRIGHTNESS 70% 80% 90% 100%
SENSITIVITY 20% 50% 75% 100%
HOLD TIME 10s 1m 5m 10m 15m 20m 30m 60m
DAYLIGHT SENSOR 10 30 50 100 300 500
STAND-BY TIME DIM 0% 10% 30% 50% +∞ 1m 30m 60m

ON/OFF · DISP · ▲ · SEND
AUTO · ◄ · OK · ►
RESET · TEST 2s · ▼ · ⬛
MODE1 · MODE2 · MODE3 · MODE4

Product Data

Power supply: 2xAAA 1.5V battery, Alkaline preferred

Carrying case: UFOHJ-RC100 in carrying case

Communication: 940 nm Infrared Tx & Rx

Upload range: up to 15m (50 ft.)

Op. temperature: 0°C to +50°C (32°F to 122°F)

Dimensions: 123x70x20.3mm(4.84"x2.76"x0.8")

⚠ Warning

Remove the batteries from compartment if the remote will not be used in 30 days.

SCENE MODES DEFAULT

Application	Scene Options	Brightness	Detection Area	Hold Time	Stand-by Time	Stand-by Dim Level	Daylight Sensor
Indoor	Mode 1	100%	75%	5min	30min	30%	☼
Indoor	Mode 2	100%	75%	1min	+∞	30%	☼
Indoor	Mode 3	100%	75%	5min	30min	30%	30LUX
Outdoor	Mode 4	100%	75%	1min	+∞	30%	☼ (30LUX/300LUX)

Quick Setting

Press (MODE1) / (MODE2) / (MODE3) / (MODE4), and aim at the sensor, Press (SEND), The LED light will be on/off as confirm.

Note: if you press (ON/OFF) to sensor before, you must aim to the sensor, and Press (AUTO) ,to make the sensor work automatically. After then, repeat above quick setting.

Remote Control
Model:RC-100
Power: 2 x AAA

♻ Please recycle batteries

Overview

The "RC100" Wireless IR Configuration Tool is a handheld tool for remote configuration of IR-enabled fixture integrated sensors. The tool enables device to modify via pushbutton without ladders or tools, and stores up to four sensor parameter modes to speed configuration of multiple sensors.

The "RC100" uses bidirectional IR communication to send and receive sensor settings at mounting height up to 50 feet. The device can display previously established sensor parameters, copy parameters and send new parameters or store parameter profiles. For projects where identical settings may be desired across a large number of areas or spaces, this capability provides a streamlined method of configuration. Settings can be copied throughout a site, or in different sites.

Remote Control Description

KEY	FUNCTION	KEY	FUNCTION
(ON/OFF)	Press the on/off button, the light goes to permanent on or permanent off mode,the sensor is locked ,MUST Press"AUTO " to quit from this mode.	(AUTO)	Press "Auto"button,the sensors starts to work automatically and all parameters remains the same as the latest status in auto mode.
(DISP)	Display current parameters	(TEST) 2s	The button "Test" is for testing purpose sensitivity only. the sensor goes to test mode (hold time is only 2s) automatically after commissioning, meanwhile the stand-by period and daylight sensor are disabled. Press "AUTO " to quit from this mode.
(SEND)	upload the selected parameters to sensors		
(▲) (▼)	Enter in the setting condition and navigate to UP and Down	(⊓)	When the light level exceeds this setting, the lights will turn off even when the space is occupied. Once the light level exceeds this setting, the sensor will wait and monitor for 1 mins in order to confirm the light level increase is not temporary before forcing the lights to go off. When light level goes below the settings, the light will turn on even without motion detection after 1min. This feature is disabled by default. if want to open this setting, just press ⊓ ,choose daylight sensor setpoint on/off .
(◄) (►)	Navigate to Right and Left		
(OK)	Confirm selected parameters and saving		
(RESET)	Default settings: 100% 100% 5m ☼ 30% 60m	(MODE1) (MODE2) (MODE3) (MODE4)	Four modes with existing parameters which are avaiable to be updated and saved in Modes
BRIGHTNESS	Adjust the light brightness during hold time.	DAYLIGHT SENSOR	Select ◉/10LUX/30LUX/50LUX/ ☼ threshold for sensor to turn light fixture ON. Select ◉, current surrounding lux value as daylight lux threhold,select ☼ , the built-in daylight sensor stops working, and all motions detected could turn the light fixture on,no matter how bright the natural light is.
SENSITIVITY	Adjust sensor sensitivity		
HOLD TIME	The time of light fixture remains at programmed 70%/80%100% level after motion is not detected		
STAND-BY TIME	Select stand-by period at 1min/30min / 60min/+∞ ; Note:"+∞″means bi-level dimming control, fixture never switches off.	STAND-BY DIM	Select the stand-by dimming level at 0%/ 10%/30%/ 50%; Note: "0%" means on/off control;

NOTE:

The "RC100" is a universal remote programmer with ALL available settings and parameters for remote sensors. Some settings and parameters may not be available on specific type of sensor under certain control mode. Please refer to the installation instruction of the sensor for the available settings and control options.

COMMAND BUTTONS

THE COMMDND BUTTONS provides a quick selection of the following operations by pressing respective buttons.

- To turn on/off light manually,press "ON/OFF" button,the sensor is locked ,MUST Press"AUTO " to quit from this mode.
- To test sensitivity only. Press "TEST" button,the sensor goes to test mode (hold time is only 2s) automatically after commissioning, meanwhile the stand-by period and daylight sensor are disabled. Press "AUTO " to quit from this mode.

Remote Control Description

- To send the current parameters to sensor ,aim to the sensor ,and press SEND button.

  NOTE: any commond button is pressed to sensor, the light will on one time and off as confrim.

SETTING

The SETTING Content contains all available settings and parameters for "RC-100" remote sensors. It allows you to change the available control, parameters, and operation of the sensor from factory default or current parameters.

NOTE:the setting works only in Auto mode.

Change multiple settings of sensor(s)

1. Press DISP button(if you push ON/OFF button before you push DISP button, the sensor is locked, so please push "AUTO" button to unlock the sensor ,and then push DISP button), the controler leds will show the latest parameters.
2. press ▲ or ▼ enter in the setting condition, navigate to the desired setting by pressing ▲▼◄► to select the new parameters.
3. press ok to confirm all setting and saving.
4. aim at the target sensor and press SEND to upload the new parameter. light will be one time and off , as confirm.

NOTE: 1. If you press DISP button, the remote control leds will show the latest parameters which were sent.
      2. If you want to learn current surrounding lux value as daylight lux threhold, please choose ◉ when you select daylight sensor lux threshould.

Change multiple settings of sensor(s)(with daylight sensor on/off setpoint)

1. Press "DISP" , the remote control leds will show the latest parameters.
2. Press ▲▼◄► to Select the new parameter.
3. press ⫿ ,daylight sensor off setpoint led in remote control will flash ,select daylight sensor setpoint for turn light off,and select daylight sensor setpoint for turn the light on .
4. press ok to confirm all setting and saving.
5. aim at the target sensor and press "SEND" to upload the new parameter.light will be one time and off as confirm.

NOTE: ⫿ is disabled by default.

1. Open or close daylight sensor on/off setpoint, it only works when remote control in the setting condition, you just push ⫿ , daylight sensor setpoint on/off setpoint will be close or open.
2-1. when daylight sensor works, the setpoint on lux must be 10lux,30lux,50lux,not ◉ , the light turn on when natural light lower than 10lux,30lux,50lux even without motion detection after 1min.
2-2: when daylight sensor works, the setpoint off lux must be 100lux,300lux,500lux,not ◎ , the light turn off when natural light exceeds than 100lux,300lux,500lux even with motion detection after 1min.
2-3: when daylight sensor works,the stand-by time is only ⦿∞ .
3. ⫿ is normal for outdoor using,not for indoor .

Remote Control Description

About RESET and MODE(1,2,3,4)

The "RC-100" comes with four MODES which are not default.You may make desired parameters and save as a new MODE(1,2,3,4)to configure the installed sensors.

RESET:

MODE	BRIGHTNESS	SENSITIVITY	HOLD TIME	DAYLIGHT SENSOR	STAND-BY DIM	STAND-BY TIME
MODE1	100%	100%	5m	☼	30%	+∞
MODE 2	70%	20%	10s	☼	0%	+∞
MODE 3	70%	20%	10s	☼	0%	+∞
MODE 4	70%	20%	10s	☼	0%	+∞

Make a new Mode:
1.press (MODE1) / (MODE2) / (MODE3) / (MODE4) button,the remote control leds show existing parameters.
2.press ▲ ▼ ◄ ► to select the new parameters.
3.if want to open/close daylight sensor lux setpoint on/off , press (∏) ,select right lux setpoint.
4.Press "OK" to confirm all parameters and saving in the mode.

NOTE: if do not know existing parameters in (MODE1) / (MODE2) / (MODE3) / (MODE4) , repeat Step 1.

UPLOAD

The upload function allows you to configure the sensor with all parameters in one operation. You may select CURRENT SETTING parameters or the MODE for uploading. Current setting parameters or the MODE are displayed in "RC-100" Remote control .

Upload the current parameters to sensor(s),and duplicate the sensor parameters form one to anther

1.Press Display button OR press (MODE1)/ (MODE2)/ (MODE3)/ (MODE4), all parameters are displayed in "RC100" Remote control.
Note: check if all parameters are correct , if not, change them.
2.Aim at the sensor and press "SEND" button , the light will be one time on and off , as confirm.
Note: if other sensors need same parameters, just aim at the sensor and press "SEND" button.