

Entry / ECO

Standard / STD

Professional / PRO

ODM & OEM

Intelligent / INT



LED Ceiling Light

AL12B-E/S/M/SC3 Series





Introduction

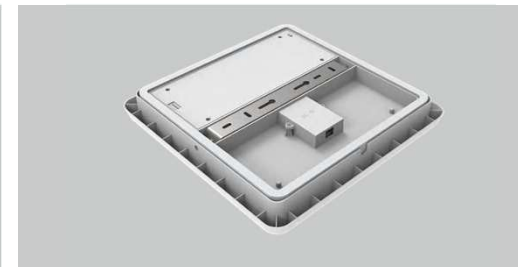
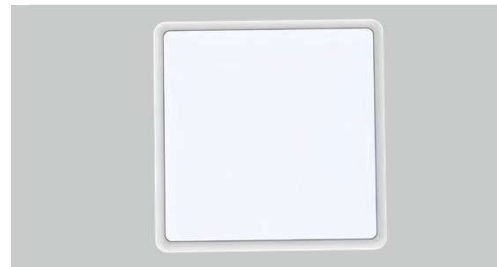
This ceiling light is a super slim design—48mm. High lumen SMD LED and lighter weight fire-rated material to ensure better heat resistance and corrosion resistance. The color is interchangeable within 3000k, 4000k and 5700k by slide switch, also dimmable with triac dimmers. Multi-functional design shares great popularity.

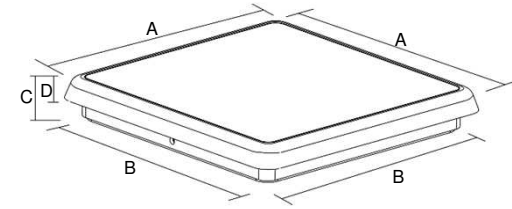
Features

- High lumen efficiency
- Interchangeable CCT(3000/4000/5700k) with slide switch
- IP54 in front
- Triac dimming
- Internal driver
- Multiple functions as below:
 - E: Emergency
 - S: Microwave sensor / Daylight Sensor+Microwave sensor
 - M: Emergency+Sensor
 - SC3: Microwave sensor with interchangeable CCT

Application Areas

It is designed for general lighting applications in office, supermarket, shop, school, hotel, etc. It is also widely used for public areas, such as stairway, lobby, reception, corridors etc





Technical Data Sheet

Code No.	AL12B-10-12W	AL12B-12-18W	AL12B-12-25W	AL12B-14-25W		
Dimension(mm)	250*250*50mm	300*300*50mm	300*300*50mm	350*350*52mm		
Cutout (mm)	-					
Watt(W)	12W	18W	25W	25W		
Rated Input Voltage(V)	AC100-240V AC230V					
Input Voltage(V)	AC85-265V AC200-240V					
LED Module Input	-					
Light Source	SMD					
SDCM	<6 (@3000K 4000K 5000K)					
CCT(K)	1-CCT: 3000K/4000K/5000K/5700K 3-CCT: 3000K + 4000K + 5700K					
CCT Selection DIP Switch	YES					
Luminous Flux (lm) ±5%	Non-DIM	1-CCT	1150~1350	1700~2050	2400~2700	2580~3000
	DIM		1140~1300	1650~2050	2250~2690	2450~2990
	Non-DIM	3-CCT	1160~1350	1700~2100	2400~2720	2580~3100
	DIM		1150~1330	1660~2050	2450~2600	2480~3000
CRI	80					
Beam Angle (°)	120°					
UGR	-					
LED Driver	Built-in					
Dimming Option	Triac					
Sensor	Yes					
Emergency Kits	Yes					
Electrical Class	Class II					
Ingress Protection (IP Rating)	IP54					
Impact Resistance (IK Rating)	IK10					
Product Finishing(Base)	White RAL9016					
Materials of Optics	PC					
Materials of Housing	PC					
Lifetime (hr)	40,000h @ L70B50					
Glow wire test (°C)	750°C (Cover) 850°C (Lamp Base)					
Operating Temp. (°C)	-20°C ~45°C					
Storage Temp. (°C)	-20°C ~65°C					
Installation	Surface mounted					

Measurement

	Dimension(mm)				Product Weight (Kg)	Package weight (Kg)		Carton Size(cm)	Qty/CTN	20GP (pcs)	40HQ (pcs)		
	A	B	C	D		N.W/PC	G.W/PC					N.W/CTN	G.W/CTN
AL12B-10-12W	250	220	50	28.9	250*250*50	0.85	0.95	17	20.2	60*53.5*28.5	20	6080	14400
AL12B-12-18W	300	270	50	30	300*300*50	1.25	1.38	12.5	15	61*32.5*33.5	10	3780	9310
AL12B-12-25W	300	270	50	30	300*300*50	1.25	1.38	12.5	15	61*32.5*33.5	10	3780	9310
AL12B-14-25W	350	320	52	31.4	350*350*52	1.42	1.62	14.2	19.22	63*38*38	10	3240	7130

Driver Datasheet (Non-dimmable)

Total load wattage		12W	18W	25W
Output	Output Voltage range	DC60-80V	DC60-80V	DC60-75V
	Rated output current	150mA	230mA	325mA
	Line Regulation	±5%		
	Setup, Rise Time	<1S		
	Flickering Index	-		
Input	Input Voltage	AC85-265V		
	Rated Input Voltage(V)	AC100-240V		
	Frequency	50/60Hz		
	Input Current	≤0.16A	≤0.24A	≤0.33A
	Rated Input Current	≤0.14A	≤0.2A	≤0.28A
	Power Factor	0.9		
	THD	-	<20% @230V	
	Efficiency	≥88%		
	No load wattage	<1W		
Protection	Short circuit protection	Pass		
	Over voltage protection	Pass		
	Over temperature protection	Pass		
Safety & EMC	Withstand voltage	-		
	Isolation Resistance	-		
	Surge	IEC61000-4-5(L-N:0.5KV)		IEC61000-4-5(L-N:1KV)
	EMC Emission	EN55015, EN61000-3-2		
EMC Immunity	EN61000-4-2,3,4,5,6,8,11; EN61547			

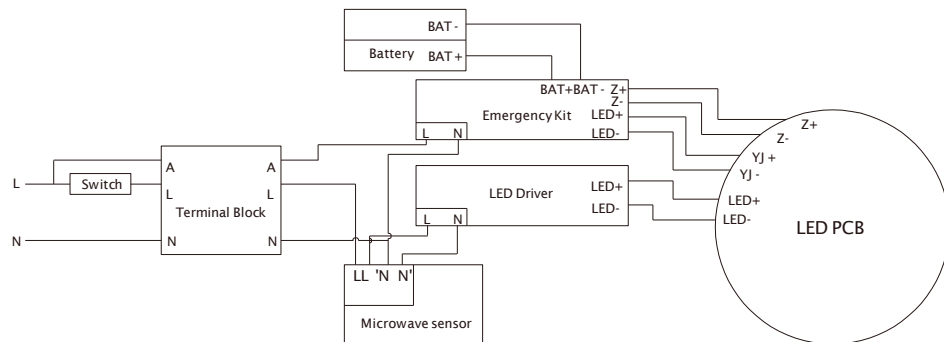
Driver Datasheet (Sensor S)

Sensor datasheet	
Operating Voltage	DC7-12V
Power consumption	0.5W±0.2W
Microwave frequency	5.8GHz±75MHz, ISM wave band
Transmission power	<0.5mW
Detection angle	140°
Detection Area	5-7M
Hold time	30S
Daylight sensor	10Lux
Stand-by DIM Level	-
Stand-by Period	-
Dimming Range	-
Microwave ON/OFF function	-
Installation Height	Recommended Installation Height: Wall mounted height 1.8m, Ceiling mounted height 3m.
Operating temperature(°C)	-20°C ~60°C

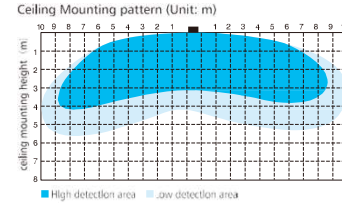
Driver Datasheet (Emergency)

Power	3W
Rated Input Voltage(V)	AC230V
Frequency	50/60Hz
Input Voltage	AC200-240V
Total load wattage	3W±0.5W
Rated Input Current	≤0.03A
Battery	6.4V 1500mAh (LiFePO4)
Lifetime	Over 2000 cycles
Battery duration	≥3hrs
Charge Period	≤24hrs
Emergency switching time	≅ 1S

Wiring Diagram:



Sensor Detection Pattern



Daylight & Microwave Sensor

Detection area:

- ◆ 140 degree wide detective beam angle with 5-7 meters distance.

Working pattern:

- ◆ With sufficient natural light, when illuminance is more than 10lux, the light does not switch on when presence detected.
- ◆ With insufficient natural light:
 - When illuminance is less than 10lux, the light switches on automatically when presence detected.
 - With presence detected, light will never switch off, even the nature light is sufficient.
 - After presence left, any movement detected within time-delay (30 seconds), the light will continuously work for another hold time(30 seconds), then switch off automatically until next movement detected.
 - Hold time: 30S

Microwave Sensor

Detection area:

- ◆ 140 degree wide detective beam angle with 5-7 meters distance.

Working pattern:

- ◆ In any given lighting condition, the light switches on automatically when presence detected.
- ◆ After presence left, light will continuously work within time-delay (30 seconds), then switch off automatically.
- ◆ After presence left, any movement detected within time-delay (30 seconds), the light will continuously work for another hold time (30 seconds), then switch off until next movement detected.
- ◆ Hold time: 30S

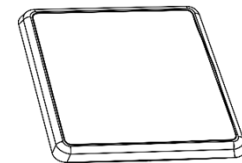
Installation Procedure

WARNING

- 1.Switch off before installation.
- 2.Switch on only after complete installation and examination of the circuit.
- 3.Professional electrician for installation and maintenance only.

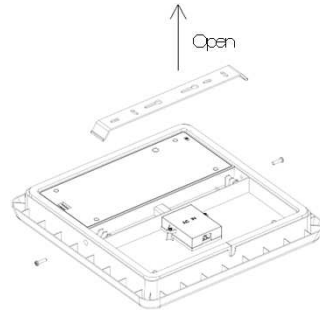


Step1



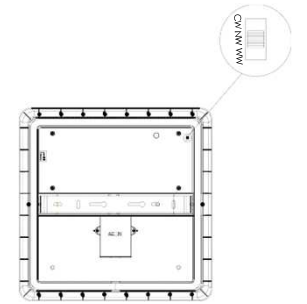
Take out ceiling light and accessory pack from box.

Step2



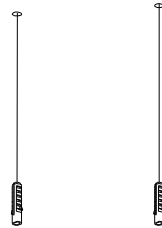
Remove screw, take out bracket

Step5



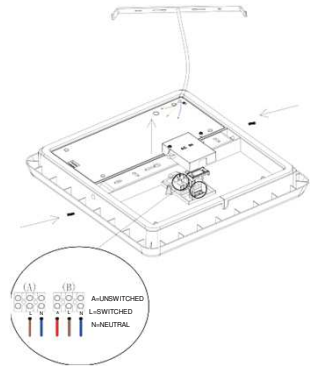
If you get functional product, please follow below operation:
CCT switchable function: Choose CCT by slide switch before mounting to ceiling/wall.

Step3



Knock-in the plastic anchor into ceiling

Step6



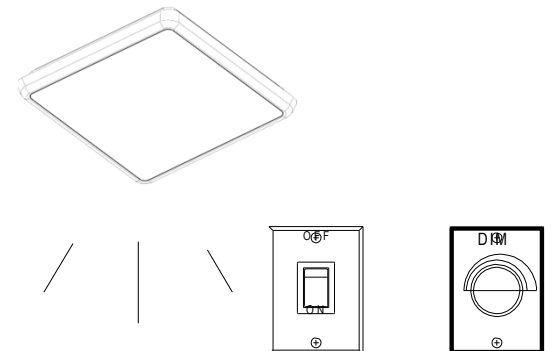
Put the main AC wire through line pressing clip, feed the L, N to the fast connection terminal block respectively then compress the line pressing clip.

Step4



Fix bracket with screw into the ceiling

Step7



Switch on



RL Europe
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www.rleurope.ch

info@rleurope.ch

TEL: +41 (0)91 6832255

Add: via E. Bossi 12/B, CH-6830 Chiasso (TI)