

LED Bay Light Fixture Product Manual

Up to 15000 lumen for 18m high-mount applications



Complus Trading

Vabaõhumuseumi tee 2A-14, 13522 Tallinn, Estonia

1. Product Description

LED bay light fixture series are designed and developed to replace traditional high bay or low bay fixtures for industrial and other rugged applications. Light weighted and easy for installation, the LED High Bay/Low Bay fixtures are all designed to offer maximum energy saving, substantially reduced maintenance costs and superior quality.

Bay Light series: 30W, 50W, 60W, 80W, 100W, lumen output up to 7200lm



Bay Light series: 120W, 150W, 200W, lumen output up to 15000lm



1.1 Major Applications

Factory production floors, Workshop, Warehouses, Road toll gates, Petrol stations, Supermarkets, Sports stadiums, Convention centre halls, Airport passenger halls, etc., where high ceiling lighting required.

1.2 Features

- 1) Low power consumption. More than 60% energy saving compared to conventional HID/HPS.
- 2) Environmental friendly. Lead and mercury free.
- 3) Long operation life time, above 50,000hours. Low maintenance costs.
- 4) Voltage input 110-240VAC or 110-277VAC, 50/60Hz at choice.
- 5) Instant ON/OFF operation.
- 6) Superior colour rendition compared to conventional industrial luminaire.
- 7) Selectable colour temperature.
- 8) Patented single piece 30W-100W high power LED light source with unique multi-chip integration design ensure high light purity, high heat conduction and slow brightness derating.
- 9) Unique heat sink design ensures superior heat management.
- 10) Resistant to shock and vibration.



Car park



Gas station



Hall & corridor

2. Technical Parameters

Input Voltage	AC 100~240V/100~277V
Driver Power Frequency	47~63Hz
Driver Power Efficiency	≥85%
Total Power Consumption	30W 50W 60W 80W 100W 120W 150W 200W
Power Factor(PF)	≥0.98
Total Harmonic Distortion	≤10%
Luminaire Efficiency	≥90%
Flux (Lumens)	2400 4000 4800 6000 7200 9500 11500 15000
Colour Rendering Index	≥80
Colour Temperature	2700~7000K Optional
Beam Angle	90/120 Degree Optional
Light Efficiency	70~80lm/W
Working Ambient Temperature	-25°C~+45°C
Working Ambient Humidity	15%~90%RH
IP Rating	IP30/IP54 Optional
Service Life	≥50000 Hours
Light Fixture Material	Aluminium Alloy
NW (Kg)	3.2 3.6 3.9 4.5 4.9 6.2 7.7 9.5

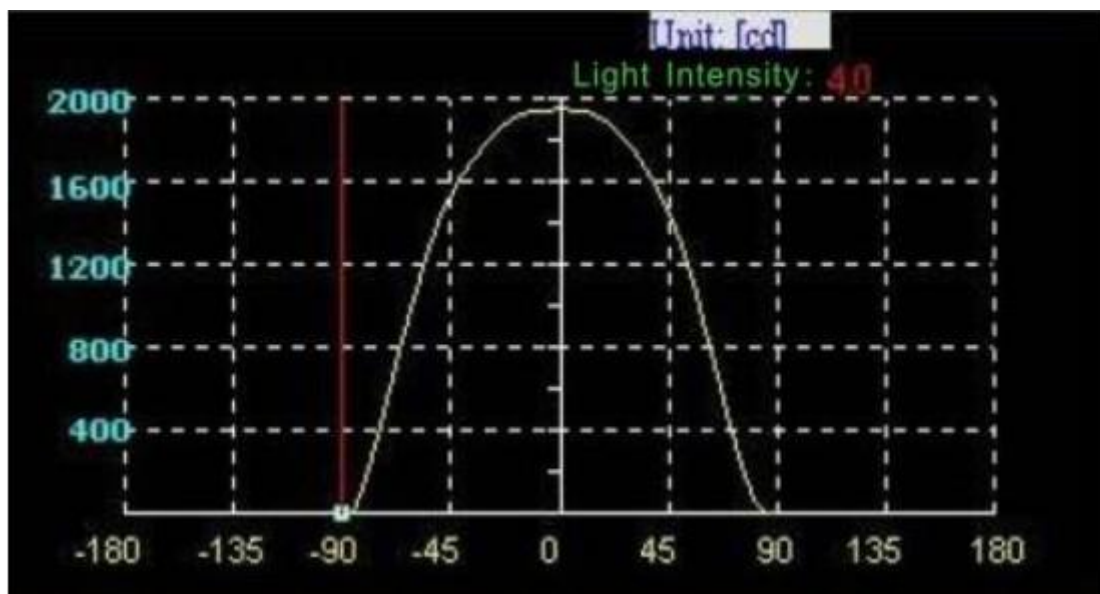
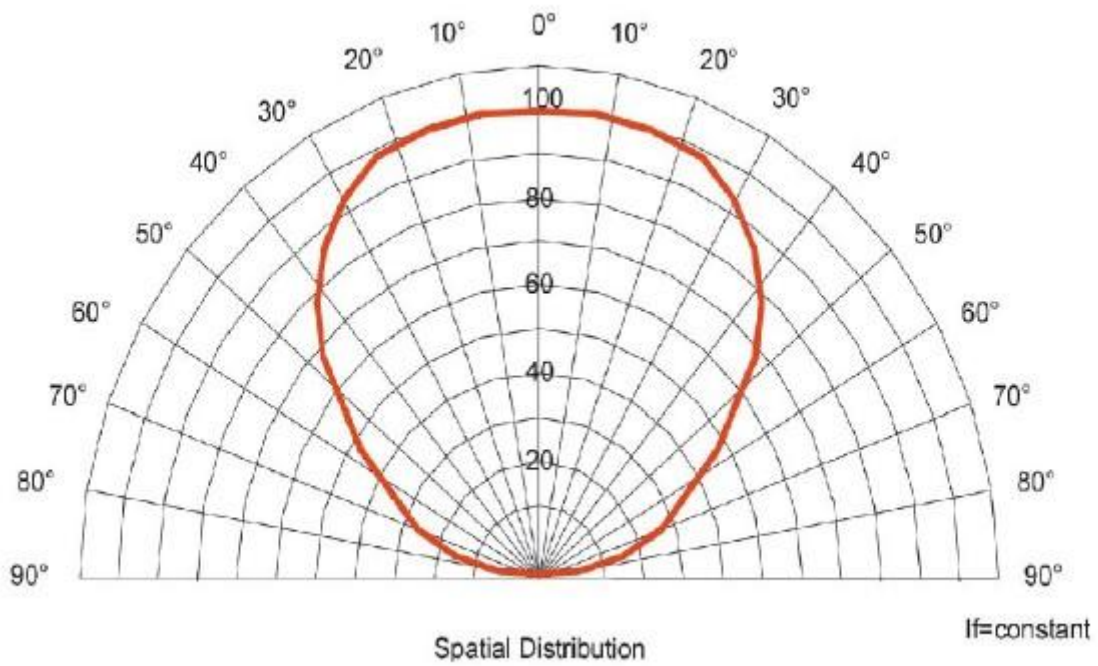


Workshop



Exhibition Hall

3. Light Distribution



4. Illuminance Chart

	Model	Power	Height	Light Spot Diameter	Illuminance (lux)	
					Centre Illuminance	Average Illuminance
LED High Bay/Low Bay Luminaire	BAY30EO	30 W	4m	8m	180	90
			5m	10m	110	55
			6m	12m	70	35
	BAY50EO	50 W	4m	8m	270	140
			5m	10m	175	90
			6m	12m	120	60
			7m	14m	90	45
			8m	16m	70	35
	BAY60EO	60 W	4m	8m	320	160
			5m	10m	210	105
			6m	12m	150	75
			7m	14m	110	55
			7.5m	15m	90	45
			8m	16m	70	35
	BAY80EO	80 W	4m	8m	405	205
			5m	10m	255	130
			6m	12m	170	90
			7m	14m	130	70
			8m	16m	95	50
			9m	18m	75	40
			10m	20m	65	35
	BAY100EO	100 W	4m	8m	420	255
			5m	10m	270	165
			6m	12m	190	115
			7m	14m	140	85
			8m	16m	110	65
			9m	18m	90	50
			10m	20m	70	40
11m			22m	60	35	

	Model	Power	Height	Light Spot Diameter	Illuminance (lux)		
					Centre Illuminance	Average Illuminance	
LED High Bay/Low Bay Luminaire	BAY120EO	120 W	8m	16m	140	85	
			9m	18m	118	65	
			10m	20m	90	50	
			11m	22m	78	42	
			12m	24m	65	36	
			13m	26m	55	32	
			14m	28m	45	25	
			15m	30m	35	20	
	BAY150EO	150 W	8m	16m	170	105	
			9m	18m	145	78	
			10m	20m	110	60	
			11m	22m	95	50	
			12m	24m	80	42	
			13m	26m	65	35	
			14m	28m	55	29	
			15m	30m	50	25	
	BAY200EO	200 W	10m	20m	145	78	
			11m	22m	125	65	
			12m	24m	104	55	
			13m	26m	85	46	
			14m	28m	77	37	
			15m	30m	66	32	
			16m	32m	55	28	
			17m	34m	50	24	
				18m	36m	42	19
				19m	38m	36	16

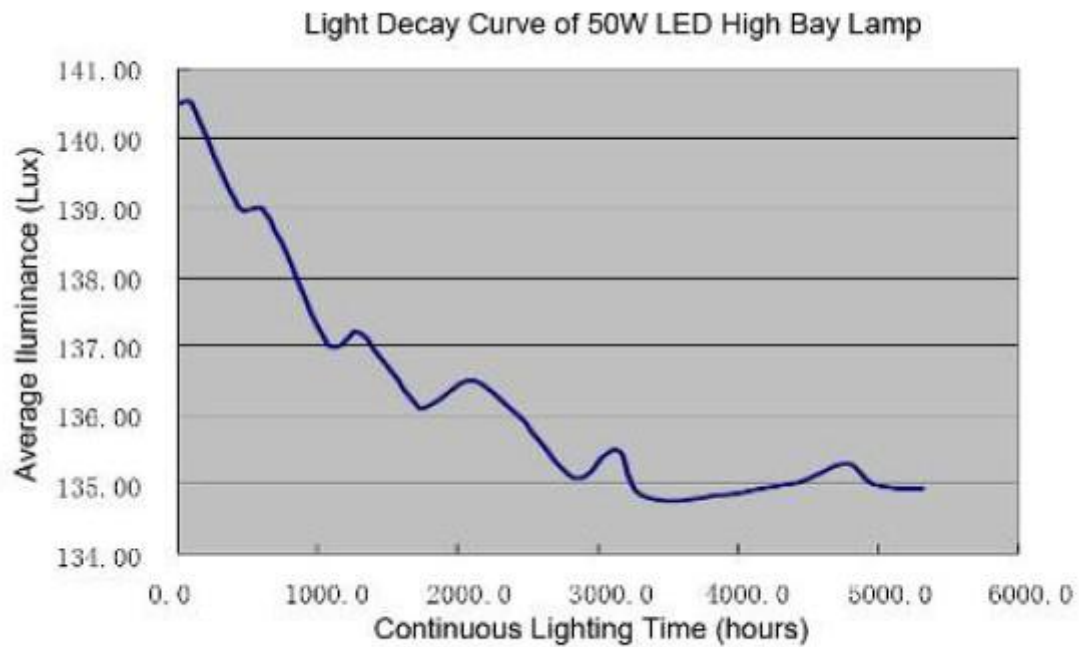


MAX Lighting and Power Ltd

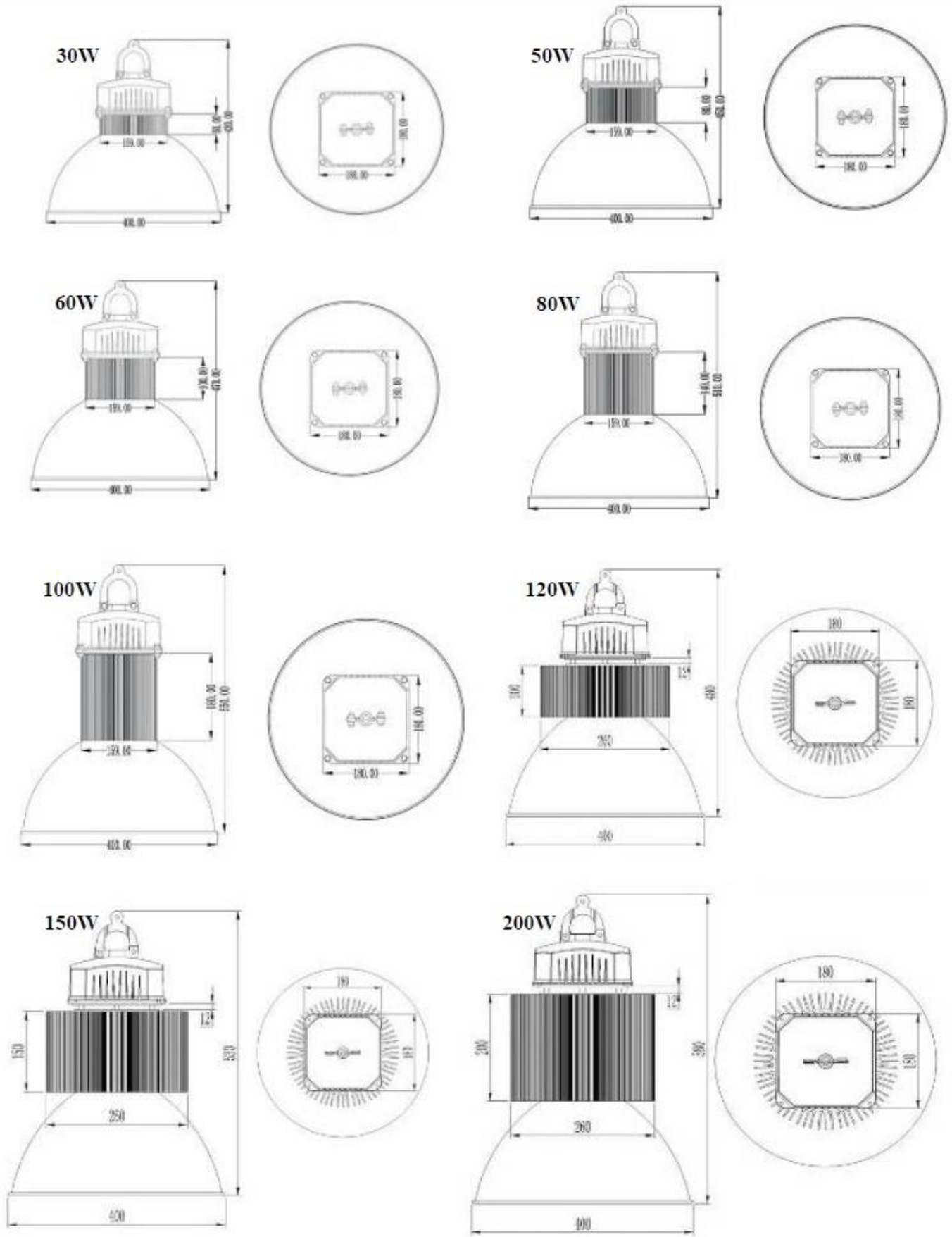
20/F, Unit 1-5, Midas Plaza, Tai Yau Street, San Po Kong, Kowloon, Hong Kong

5. Lumen Test Report

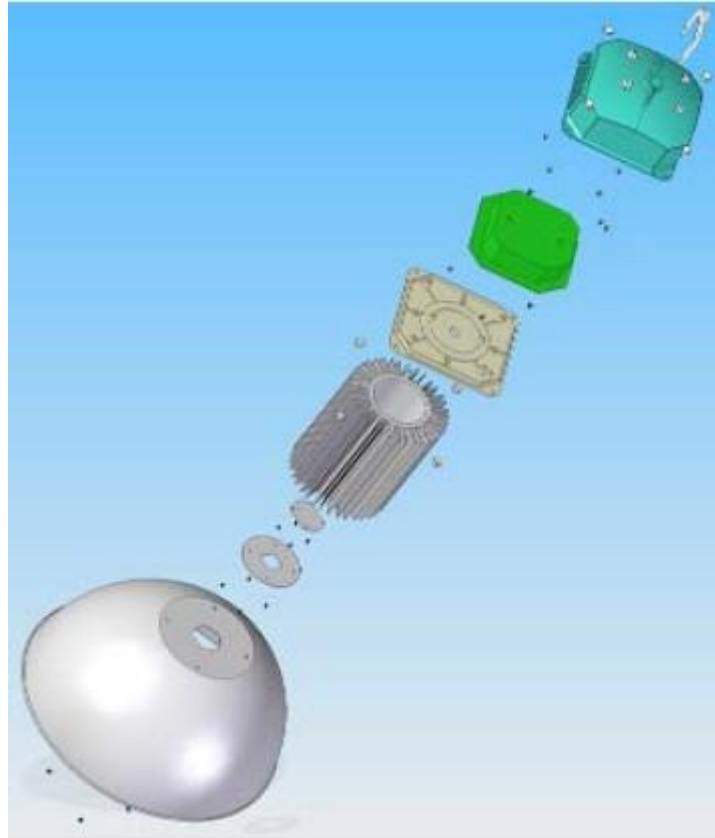
All LED bay light lumen tests indicate a typical 18% light depreciation after 5328 hours' non-stop performance.



6. Product Profile - 6.1 Fixture Dimensions



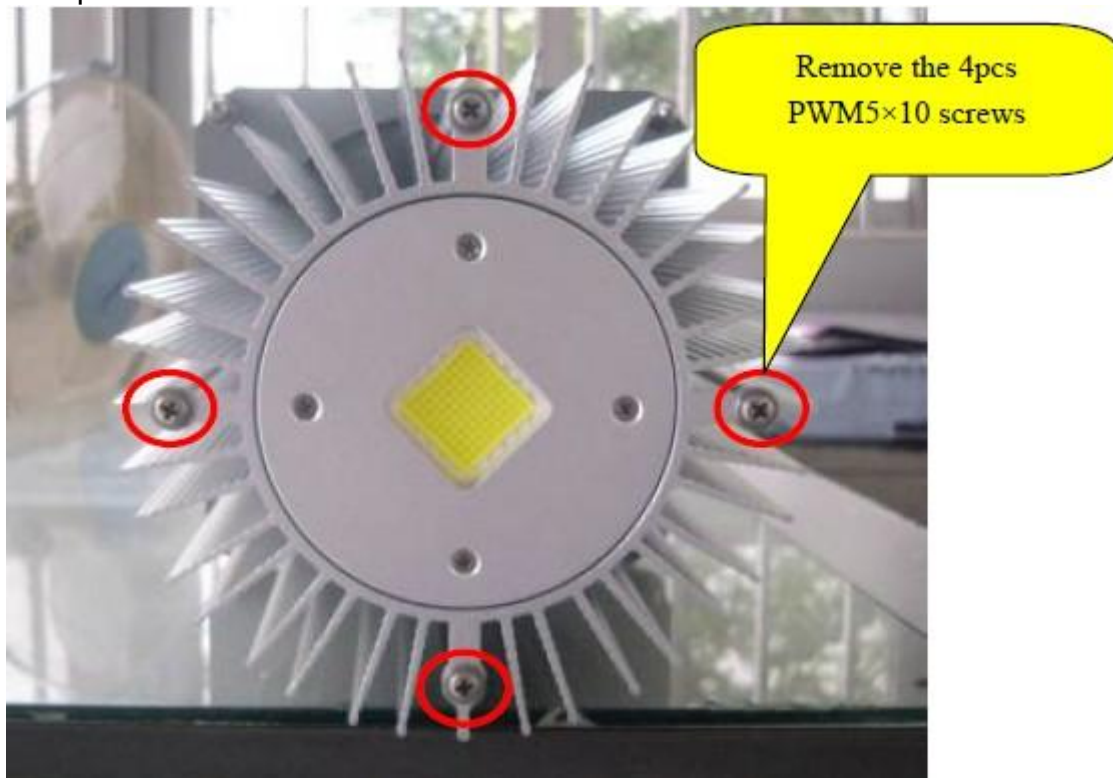
6.2 Components Break-Down



7. Installation Guide

(For Bay Light Fixture at 30W, 50W, 60W, 80W and 100W)

Step 1: Remove the four pieces PWM5×10 screws from the bay light fixture body, which are prefixed for shipment:



Step 2: Assemble the reflector to the lamp body with the four pieces PWM5x10 screws:



Step 3: Check and ensure the hanging ring bolts are properly tightened:



Step 4: Test light the lamp before hanging.

Step 5: Hang up the fixture to the hook from the ceiling securely:

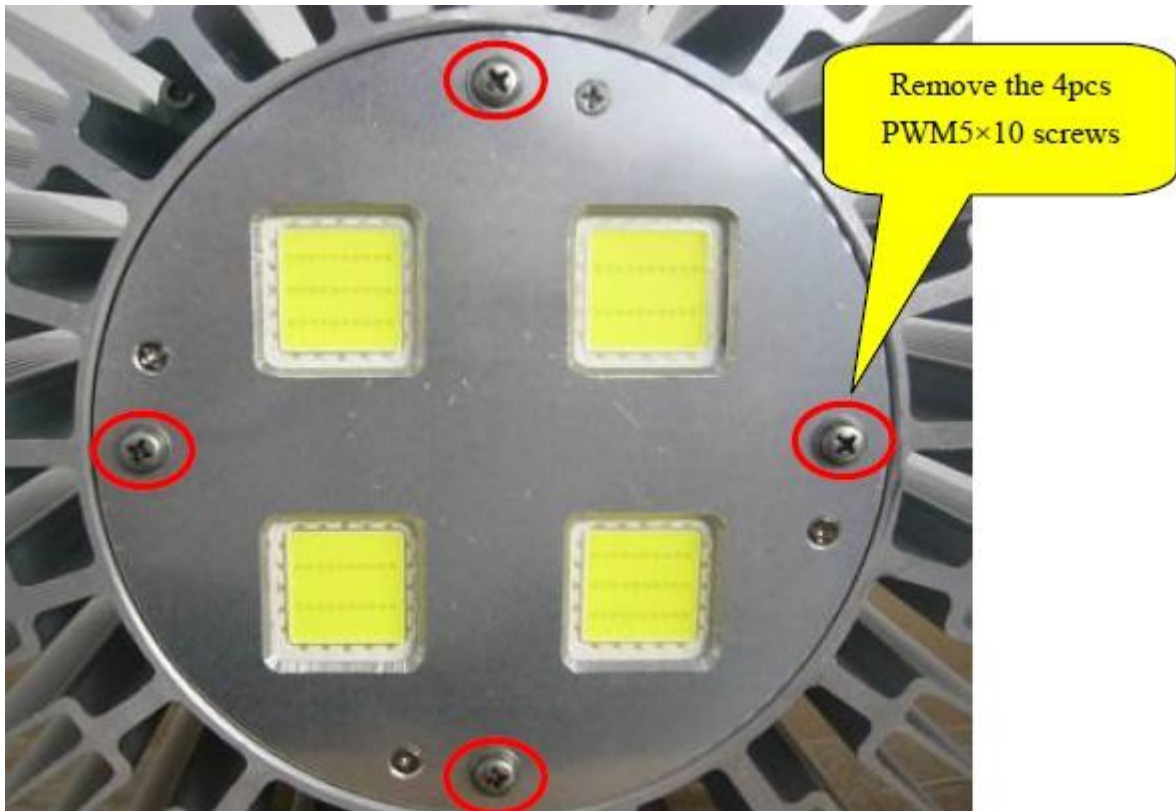


Step 6: Connect the power core and turn on the power:

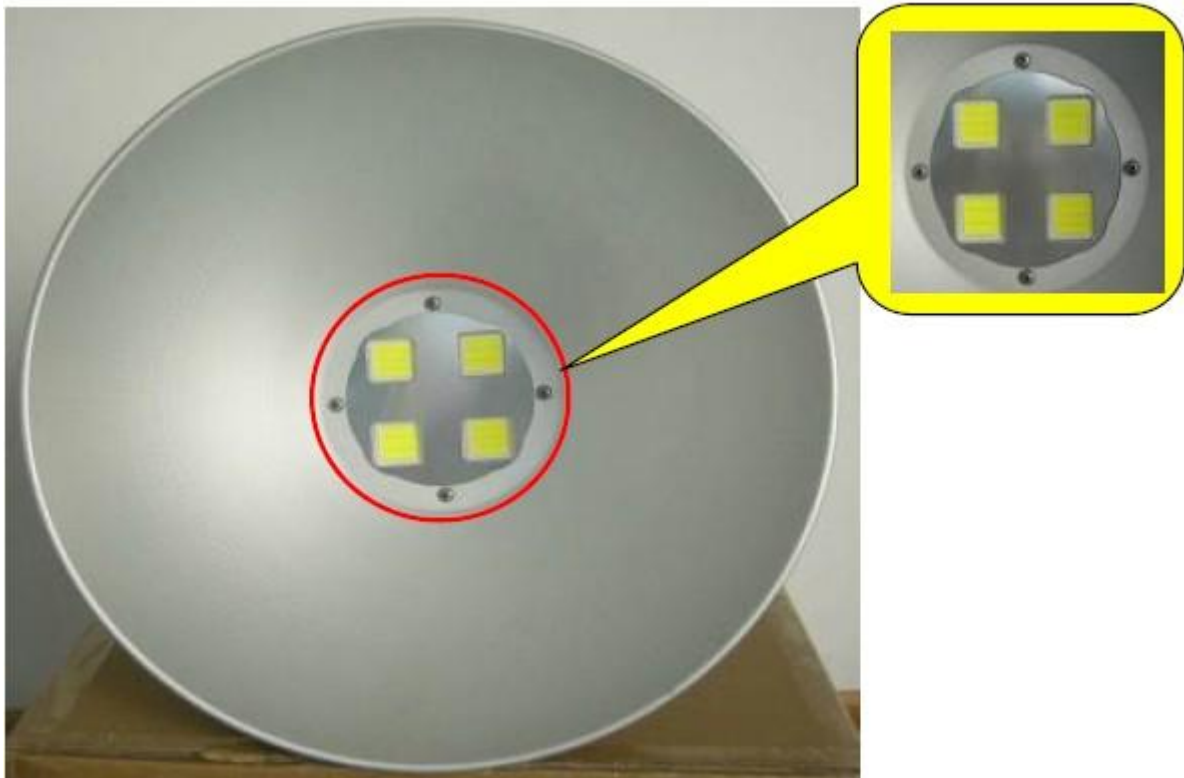


For Bay Light Fixture 120W, 150W and 200W

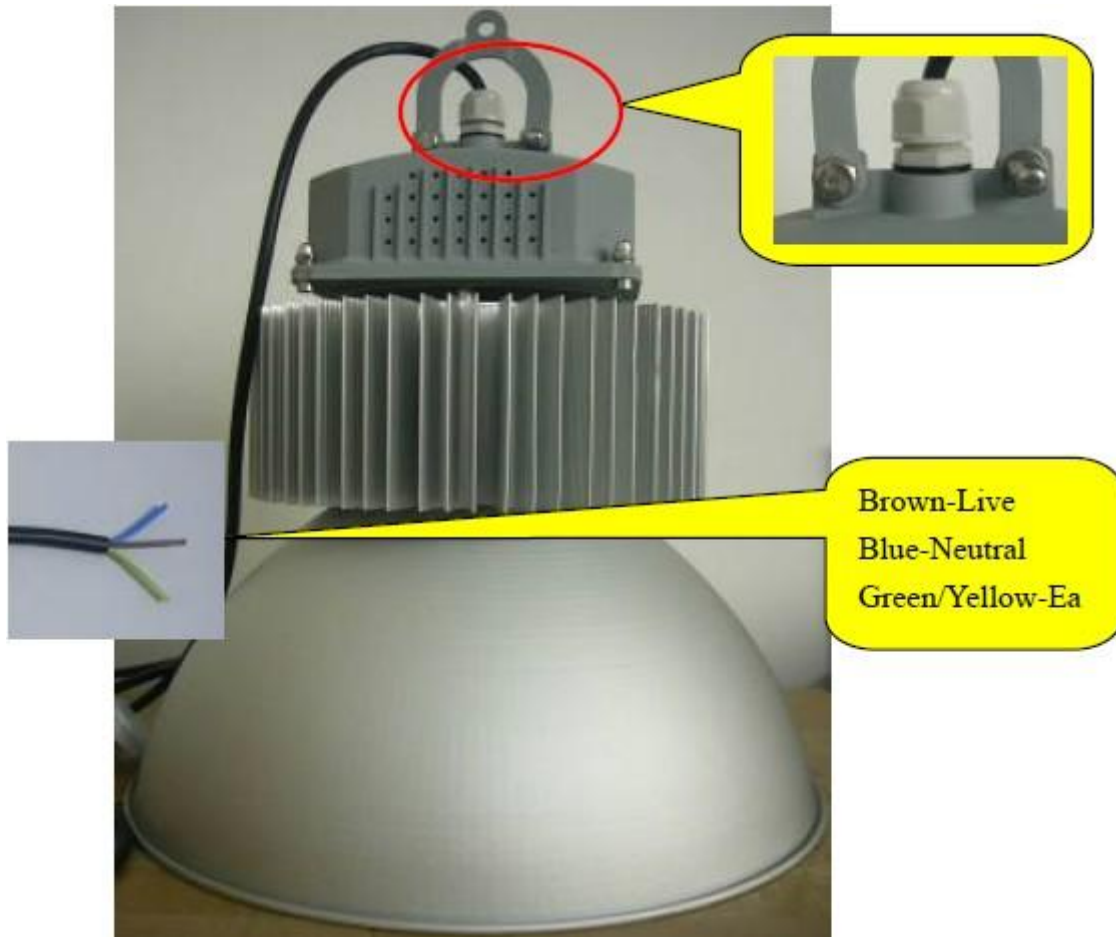
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Step 4: Test light the lamp before hanging.

Step 5: Hang up the fixture to the hook from the ceiling securely. Connect the power core and turn on the power



Caution:

- Turn off power before cable connection
- Anti-static hand ring is required when replacing any electronics components
- Ensure all the AC power connections are properly done before turning power on.
- Do not touch the power driver when power is on
- Turn off power in case of any maintenance.

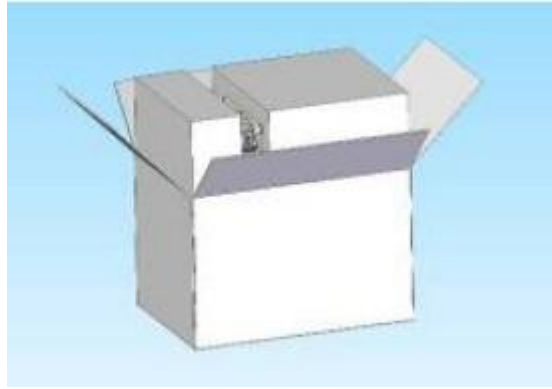
8. Troubleshooting

Description	Analysis	Solution
LED lamp doesn't light	1. Check whether the power line connection is right;	1. Reconnect the power line in the right way;
	2. Check whether the power plug is loose;	2. Re-plugged the loose power plug;
	3. Driver failure;	3. Replace with new driver
	4. LED integrated light source has been damaged.	4. Replace with a new LED integrated light source.
LED lamp light output is dim	1. Driver output is abnormal;	1. Replace with new driver;
	2. LED integrated light source supply failure.	2. Replace with new LED integrated light source.
LED lamp is flashing	3. Driver output is abnormal;	3. Replace with new driver;
	4. LED integrated chips failure.	4. Replace with new LED integrated chips.

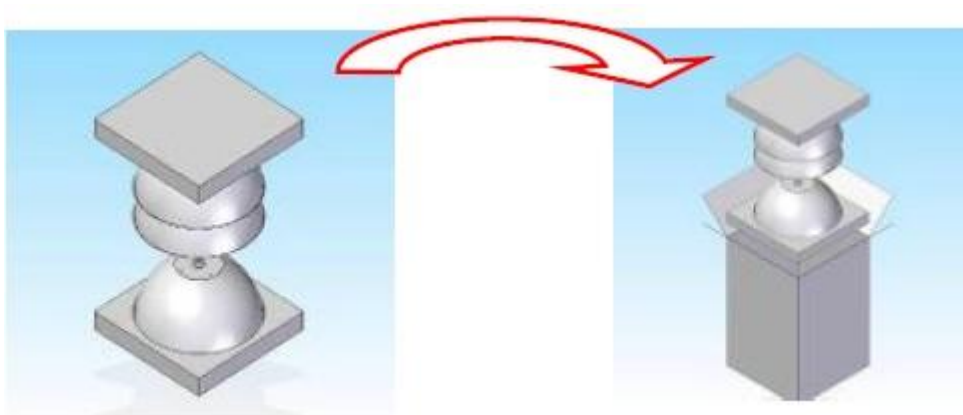


9. Package Information

LED bay light's lamp body and lamp shade are packed separately:



Lamp Body packing



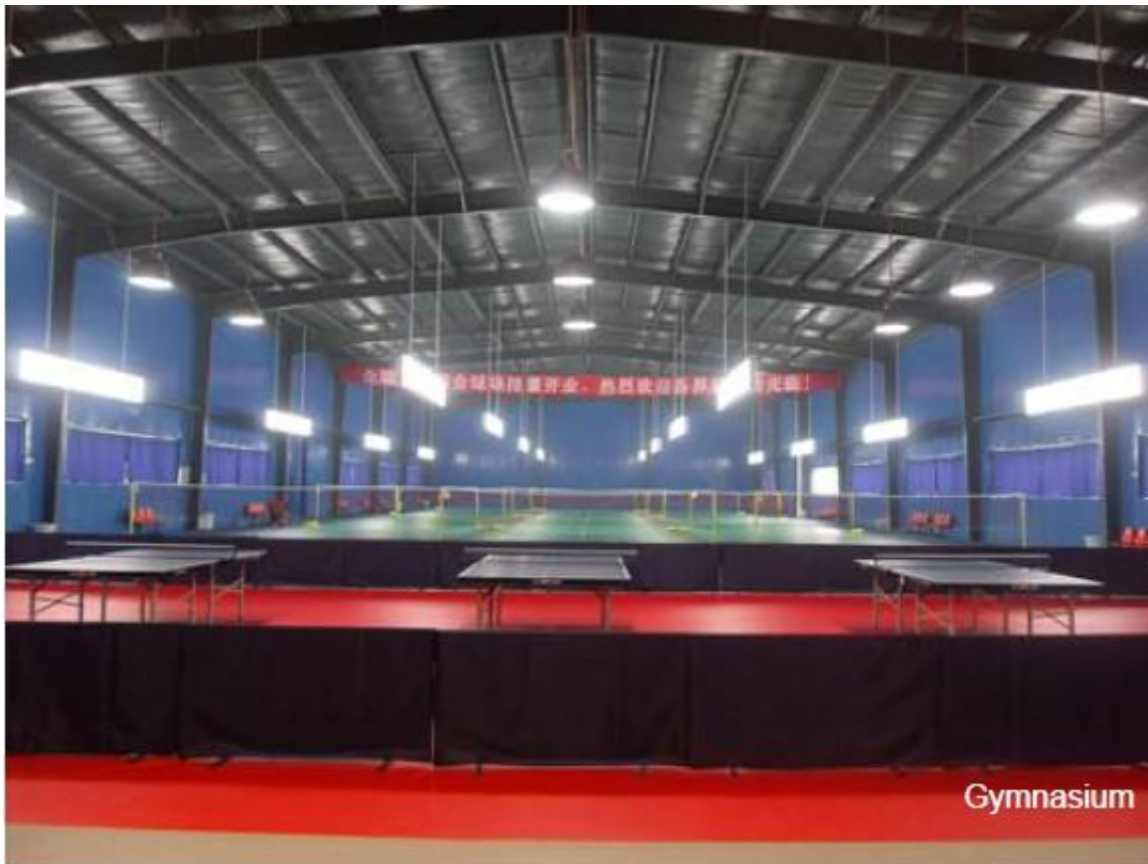
Lamp Shades Packing



Removed from package.

10. Lamp Comparison - LED vs Conventional

Flux (lm)	Power	Equivalent power of HID/Vapor lamp
2400	30W	100W
4000	50W	150W
4800	60W	200W
6000	80W	250W
7200	100W	300W
9500	120W	350W
11500	150W	400W
15000	200W	700W



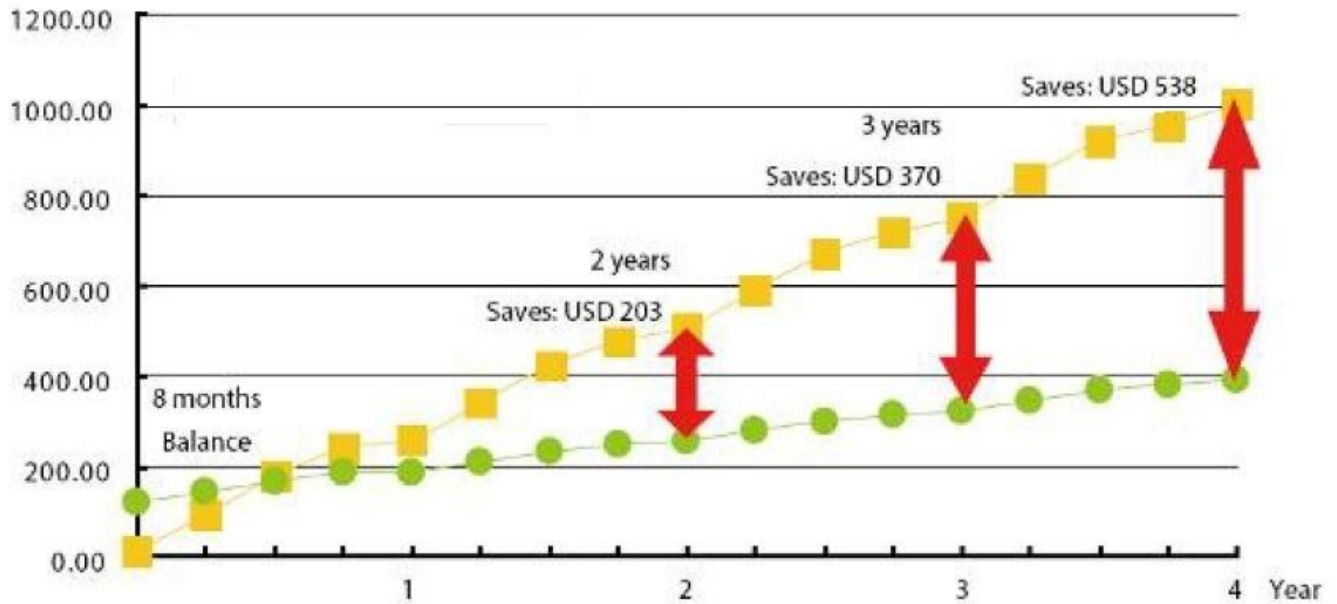
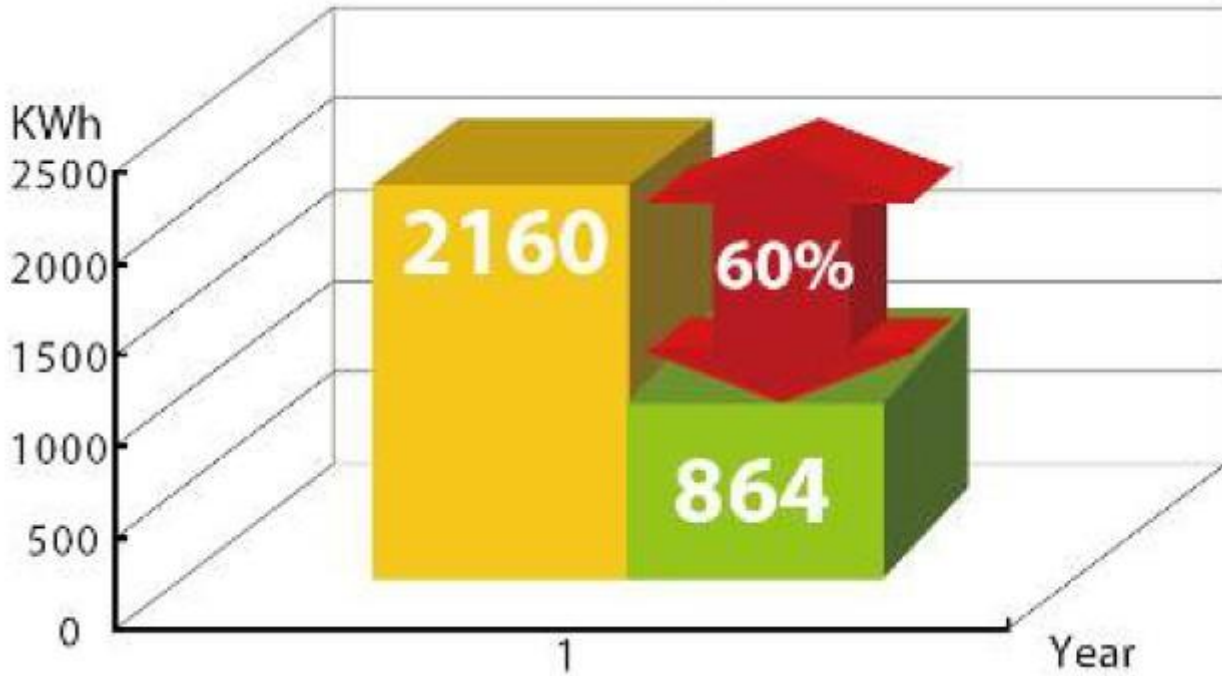
100W LED High Bay Vs 250W Mercury Vapor Lamp

Power saving by 60%

Reduction of greenhouse gas emission
by 505kg

Save 36 trees per year

Mercury Vapour Lamp 250W
High Bay (100W)



Note : Calculation based on 24 hours of daily operation (c9.41/KWh).

NOTE:

The Product design and specifications are subject to change without prior notice for the purposes of performance improvement.

Other Product Highlight



LED Floodlight

Up to 30,000 lumen for 36m high-mount applications

IP65 protection

60% power saving, 90% reduction in greenhouse gas emission. Long lifetimes and highly reliable service, greatly reducing maintenance costs.

Original Cree chips used

50,000 hours service life.



Garage Light

60% power saving, 90% reduction in greenhouse gas emission. Long lifetimes and highly reliable service, greatly reducing maintenance costs.

LED's own cutoff light property provides high vertical illuminance with minimum glare.

IP30/IP54 protection

50,000 hours service life