

Description: RX-G30090 High-efficiency plant light module with efficiency up to 3.2umol/J, Samsung LM301H lamp bead and German brand gardening LED, new design patented product, unique protective reflector cup - efficient concentrating, uniform spectral radiation, directional illumination, light utilization Higher, especially suitable for medicinal planting with high PPFD illumination.



1. High efficiency, 90 Type yureflector protection, efficiency up to 3.2umol/J, F23 spectrum
2. Samsung LM301H horticulture and German brand gardening LED
3. Preferred plant light recipe, F23 more deep red spectrum, higher light absorption rate; F24 contains far red and UVA which is conducive to the formation of flower and medicinal ingredients.
4. Input voltage: DC28~33V, safe and reliable
5. Optional kit, including power supply and heat sink
6. 50,000 hours of service life
7. CE RoHS FCC

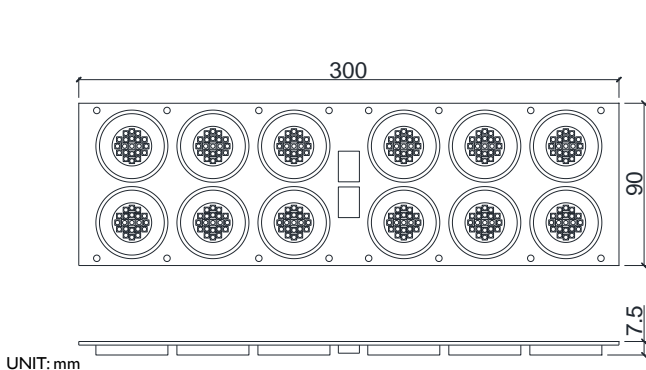
Model	Dimension LxWxH	Spectral Wavelength	Photon PPFD $\mu\text{mol}/\text{m}^2/\text{s}$	Luminous flux PAR Output	Power Input	Comment
RX-G30090-90	300x90x7.5mm	<p>F23</p>	425 μmol @0.3m 24597Lx	139 $\mu\text{mol}/\text{s}$ 7997Lm	1.4A @29.8V 43W	3.2umol/J Tcp temperature rise 18K
			697 μmol @0.3m 39258Lx	227 $\mu\text{mol}/\text{s}$ 12966Lm	2.4A @30.6V 73W	3.1umol/J Please add heat sinks!
			1049 μmol @0.3m 59298Lx	332 $\mu\text{mol}/\text{s}$ 18792Lm	3.6A @31.3V 113W	2.9umol/J Please add heat sinks!
RX-G30090-90	300x90x7.5mm	<p>F24</p>	375 μmol @0.3m 23933Lx	124 $\mu\text{mol}/\text{s}$ 8152Lm	1.4A @30.8V 44W	Add UV395nm and far red730nm
			629 μmol @0.3m 39991Lx	201 $\mu\text{mol}/\text{s}$ 13195Lm	2.4A @31.7V 76W	Promote the formation of flower and medicinal ingredients
			936 μmol @0.3m 59348Lx	292 $\mu\text{mol}/\text{s}$ 19093Lm	3.6A @32.7V 118W	

Working temperature: - 30°C ~ 40°C ,Lifespan: 50,000 hours (Note: Max Tcp 70 °C),Power \geq 2.4A Heat sinks need to be added!

Tolerance range for optical and electrical data: \pm 10 %. Beam angle 90°, Recommended irradiation distance: 0.2~0.5m

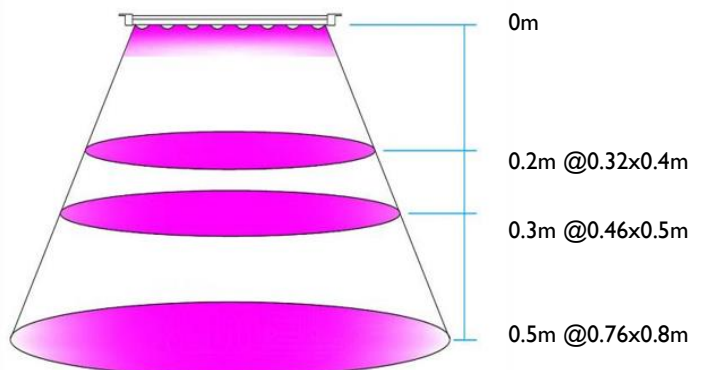
The above data is for reference only!

Dimension:



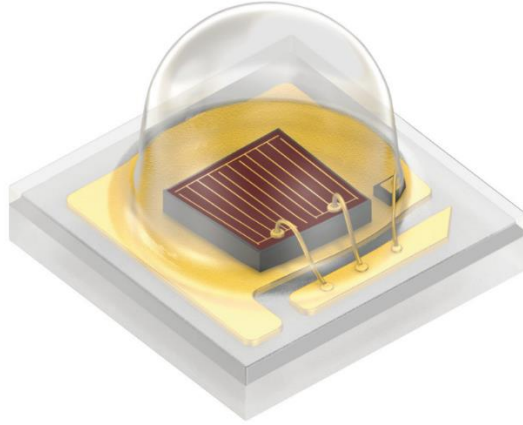
RX-G30090-90

Depth distance & Coverage:



Max PPFD intensity 50%

- High efficiency and energy saving, Samsung LM301b led chip, add German brand 660nm or 730nm



RX-G30090-F24

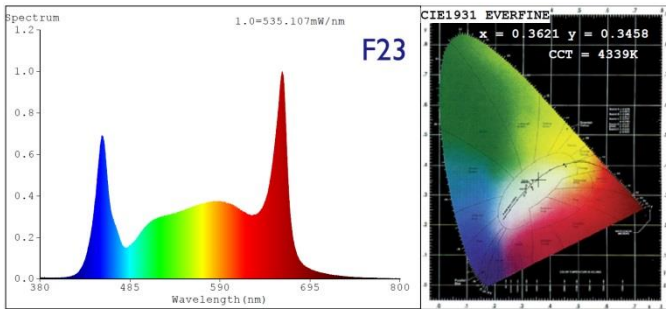
Add UV395nm and far red730nm Promote the formation of flower and medicinal ingredients



RX-G30090-F23

Add far red660nm (3 lamp beads) More deep red spectrum for higher light absorption rate

● PPF PAR testing report



Color Parameters:

Chromaticity Coordinate: $x=0.3621$ $y=0.3458$ / $u'=0.2254$ $v'=0.4844$
 CCT=4339K (Duv=-0.0094) Dominant WL:Ld =588.3nm Purity=12.4%
 Ratio:R=19.3% G=76.0% B=4.6% Peak WL:Lp=662.8nm FWHM=19.8nm
 Render Index:Ra=95.5 AvgR=93.0
 R1 =98 R2 =97 R3 =93 R4 =96 R5 =98 R6 =92 R7 =97
 R8 =93 R9 =80 R10=94 R11=95 R12=73 R13=98 R14=96 R15=94

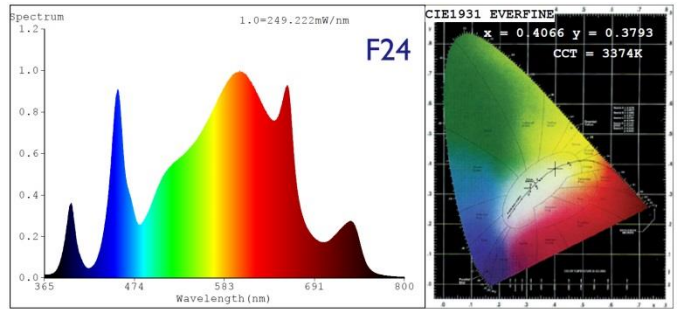
Photo Parameters: **227µmol/J 73w**

Flux = 12966 lm Eff. : 176.93 lm/W Fe = 48.46 W
 Scotopic:24910 S/P:1.9213
 Photosynthetic:PPF:227.31µmol/s PAR WATT:47820mW(400-700nm)

Electrical parameters:

V = 30.550 V I = 2.399 A P = 73.28 W PF = 1.000
 LEVEL:OUT WHITE:OUT

RX-G30090-F23 2.4A PPF Output



Color Parameters:

Chromaticity Coordinate: $x=0.4066$ $y=0.3793$ / $u'=0.2414$ $v'=0.5066$
 CCT=3374K (Duv=-0.0054) Dominant WL:Ld =583.9nm Purity=35.9%
 Ratio:R=21.7% G=74.9% B=3.4% Peak WL:Lp=601.3nm FWHM=158.9nm
 Render Index:Ra=88.5 AvgR=85.0
 R1 =88 R2 =95 R3 =96 R4 =87 R5 =89 R6 =92 R7 =87
 R8 =74 R9 =41 R10=88 R11=87 R12=77 R13=90 R14=99 R15=85

Photo Parameters: **201µmol/J 76w**

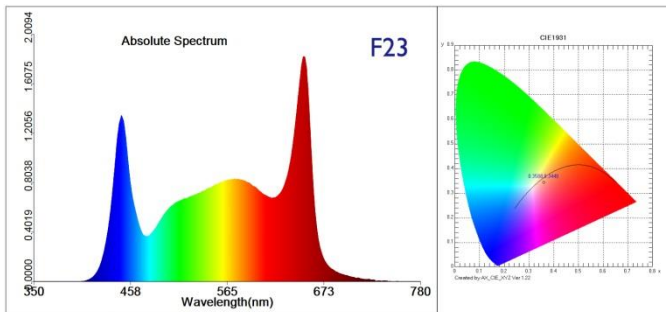
Flux = 13195 lm Eff. : 173.45 lm/W Fe = 46.26 W
 Scotopic:20594 S/P:1.5608
 Photosynthetic:PPF:201.12µmol/s PAR WATT:42236mW(400-700nm)

Electrical parameters:

V = 31.710 V I = 2.399 A P = 76.07 W PF = 1.000
 LEVEL:OUT WHITE:ANSI_3500K

RX-G30090-F24 2.4A PPF Output

● PPFD testing report



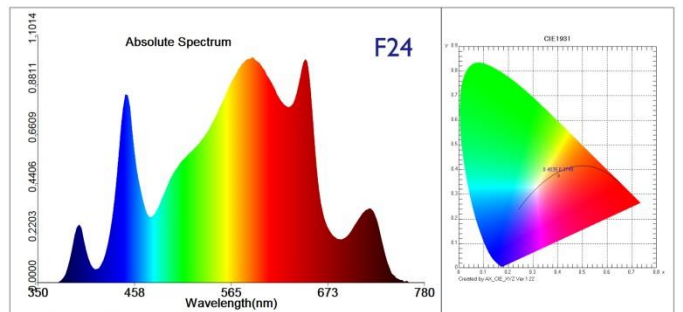
Test parameter:

E= 59298.2 lx E(fc)=5510.98 fc
 CIE x= 0.3588 CIE y= 0.3440 CIE u'=0.2239 CIE v'=0.4830
 Tc=4444 K Lp=664.0 nm HW=27.3 nm Ld=588.7 nm
 Pur=10.9 % Ratio_R=18.9 % Ratio_G=76.3 % Ratio_B=4.8 %
 Duv=-0.00919
 Ra=95.6 R1= 98 R2= 97 R3= 93
 R4= 96 R5= 97 R6= 92 R7= 97
 R8= 95 R9= 85 R10= 93 R11= 95
 R12= 74 R13= 98 R14= 96 R15= 95

1049µmol/m²/s

SDCM=13.6(F4000) White Class:OUT
 E1=220.78 W/m2 E2=222.83 W/m2 PPF=1049.4 µmol/(m·s)
 Ech-A=49.221 W/m2 Ech-B=46.411 W/m2 Ef=2.0381 W/m2
 Eb=51.719 W/m2 Ey=80.785 W/m2 Er=88.426 W/m2
 Ep=191.27 Wphyto/m2 Erb_Ratio=1.7097
 PPFDF=1.2303E+001 µmol/(m2·s)

RX-G30090-90-F23 0.3m | 13W PPFD Output



Test parameter:

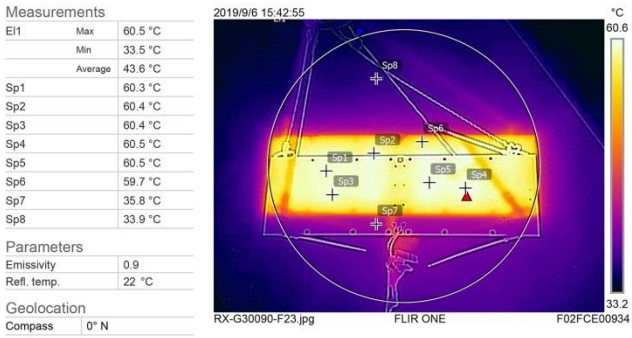
E= 59347.5 lx E(fc)=5515.56 fc
 CIE x= 0.4035 CIE y= 0.3749 CIE u'=0.2412 CIE v'=0.5042
 Tc=3405 K Lp=600.0 nm HW=164.1 nm Ld=584.6 nm
 Pur=33.6 % Ratio_R=21.5 % Ratio_G=74.9 % Ratio_B=3.6 %
 Duv=-0.00670
 Ra=89.0 R1= 89 R2= 95 R3= 96
 R4= 87 R5= 89 R6= 92 R7= 88
 R8= 76 R9= 47 R10= 89 R11= 86
 R12= 79 R13= 91 R14= 99 R15= 86

936µmol/m²/s

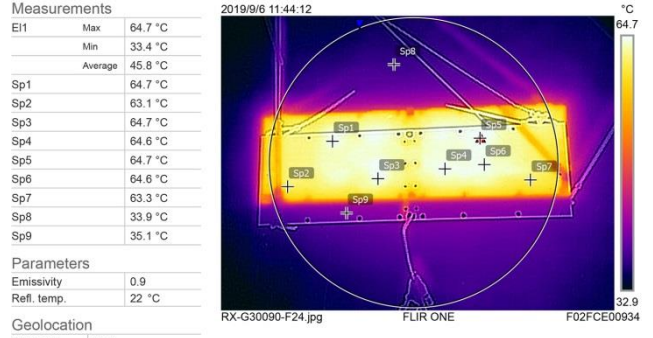
SDCM= 7.0(3500K/White) White Class:OUT
 E1=196.09 W/m2 E2=215.33 W/m2 PPF=936.1 µmol/(m·s)
 Ech-A=35.681 W/m2 Ech-B=36.696 W/m2 Ef=15.604 W/m2
 Eb=38.329 W/m2 Ey=79.116 W/m2 Er=78.799 W/m2
 Ep=176.37 Wphyto/m2 Erb_Ratio=2.0559
 PPFDF=9.5682E+001 µmol/(m2·s)

RX-G30090-90-F24 0.3m | 18W PPFD Output

● Surface temperature test



RX-G30090-90-F23 1.4A@29.8V Surface temperature test



RX-G30090-90-F24 1.4A@30.8V Surface temperature test