

LUMATEK
PROFESSIONAL LIGHTING

100W FULL-SPECTRUM

INDIVIDUAL SUPPLEMENTAL **LIGHT LED BAR**



The Lumatek 100W Full-Spectrum Individual Supplemental Light LED Bar with a 100W remote driver is a flexible and dynamic LED solution to improve your grow results. Use it as a add-on for your grow space that lacks light intensity, placing it at the top, side or bottom; or just use it as propagator for your cuttings and seedlings.

Up to 2.9 $\mu\text{mol/J}$

295 $\mu\text{mol/s}$ total output

Full-Spectrum



100W FULL-SPECTRUM INDIVIDUAL SUPPLEMENTAL LIGHT LED BAR

PRODUCT CODE: LUMLED012

EFFICACY: Up to 2.9 $\mu\text{mol/J}$

PPF: 295 $\mu\text{mol/s}$

INPUT VOLTAGE: 220-240V, 50-60HZ

DRIVER: 100W 220-240V (Included with cabling to be used remote)

INPUT POWER: 102W ($\pm 2\%$)

APPLICATION: MULTI-LAYER, ROOM, TENT

WATERPROOF & DUSTPROOF: IP65

LIFETIME (LED BARS): 60 000 HRS

LIGHT DISTRIBUTION: 120°

LIGHT SOURCE: 4000K WHITE DIODES LUMILEDS 3030 HE PLUS;
660NM RED DIODES OSRAM SQ3.24

CCT: 3800K

QUANTITY OF DIODES TOTAL: WHITE 288; RED 24

DIODES POWER PROPORTION: : WHITE 82%; RED 18%

DIODES EFFICIENCY: White Lumileds 3030 HE Plus 2.9 $\mu\text{mol/J}$;
Red Osram SQ3.24 3.8 $\mu\text{mol/J}$

DIMMABLE: OFF-25%-50%-75%-100%
with 0-10V Light Dimmer (Sold Separately)

EXTERNAL CONTROL: With Lumatek Digital Panel Plus 2.0
or Universal Controller 0-10V

WEIGHT (LED BAR): 1.1 Kg

DIMENSIONS: 1148x20x53mm

SPECTRUM: FULL SPECTRUM +

THERMAL MANAGEMENT: PASSIVE COOLING

POWER FACTOR: 0.95

MAX. AMBIENT TEMPERATURE (@ 1000W POWER): 25°C

BTU (WITH DRIVER ATTACHED): 358 BTUs/h

BTU (WITHOUT DRIVER): 333 BTUs/h

WARRANTY: 5 YEARS

CERTIFICATIONS:

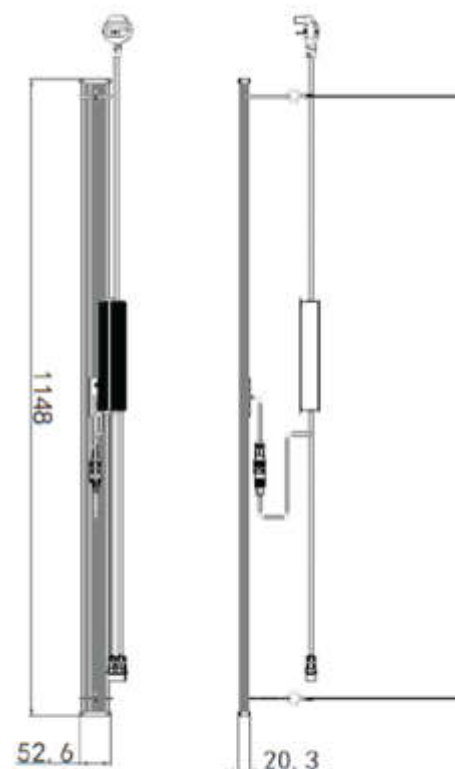
IP65, Rohs Directive 2011/65/EU And (EU)2015/863)

LED Fixture: CE Safety Standard: EN 60598-1:2015+A1:2018, EN 60598-2-1:1989, EN 62031:2020, EN 62493:2015, EN 62471:2008;

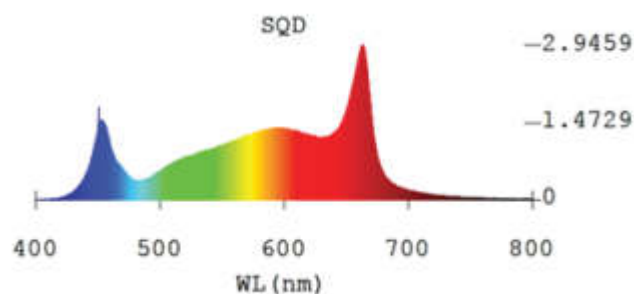
CE EMC Standard: EN 55015:2019, EN 61547:2009, EN 61000-3-2:2019, EN 61000-3-3:2013+A1:2019

LED Driver: : CE Safety Standard: EN 60598-1:2015+A1:2018, EN 60598-2-1:1989, EN 62031:2020, EN 62493:2015, EN 62471:2008;

CE EMC Standard: EN 61347-1:2015, EN 61347-2-13:2014+A1:2017, EN 62493:2015

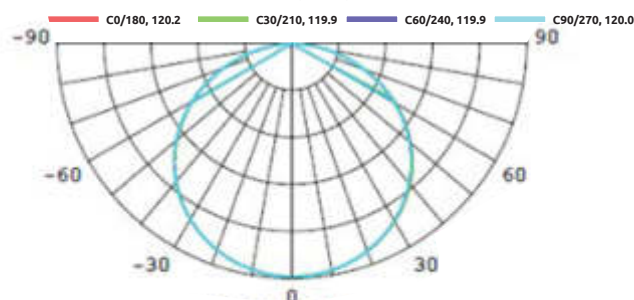


SQD SPECTRUM GRAPH



DISTRIBUTION CURVE FLUX

AVERAGE BEAM ANGLE (50%) : 120.2 DEG



INPUT CURRENT (A/W) PER DIMMING RANGE		
@ 277V		
DIMMING	INPUT POWER (W)	INPUT CURRENT (A)
100%	105	0,41
75%	84	0,33
50%	56	0,24
25%	29	0,16
@ 240V		
DIMMING	INPUT POWER (W)	INPUT CURRENT (A)
100%	105	0,46
75%	84	0,37
50%	56	0,26
25%	29	0,17
@ 230V		
DIMMING	INPUT POWER (W)	INPUT CURRENT (A)
100%	105	0,48
75%	84	0,38
50%	55	0,26
25%	29	0,17

ITEMS INCLUDED IN THE BOX:

- 1 x Lumatek 100W Full-Spectrum Individual Supplemental Light LED Bar
- 2 x Metal Hooks
- 1 x Lumatek 100W Driver with Connecting Cables (Power and Dimming)
- 1 x Manual

EXTERNAL CONTROL

This LED Bar can also be externally controlled with a Lumatek digital lighting controller (Digital Panel Plus 2.0) featuring light timing, automated dimming (1% increments), temperature safety control, Sunrise & Sunset Mode for up to 100 fixtures per controller.



PPFD: PHOTOSYNTHETIC PHOTON FLUX DENSITY ($\mu\text{mol}/\text{m}^2/\text{s}$)

The versatility of this LED Bar allows multiple options and ways of using it. Being so, there are several PPFD Maps scenarios depending on the number of bars used, if it is being used with any other fixture, individually and so on. For these reasons, here we provide only one example, and more specifically the use of our famous **Zeus 600W Pro 2.9** together with four 100W Full-Spectrum Individual Supplemental Light LED Bars placed on each Zeus side as below:



FACTORS THAT CAN INFLUENCE PPFD TESTS

- TEST EQUIPMENT.
- LAMP BEADS DEVIATION
- AMBIENT TEMPERATURE DEVIATION
- PC COVER TRANSMITTANCE DEVIATION
- POWER SOURCE EFFICIENCY DEVIATION
- REFLECTION CONSIDERED OR NOT

RECOMMENDED PPFD ($\mu\text{mol}/\text{m}^2/\text{s}$)

PLANT	SEED	CLONES	VEGETATIVE	FLOWERING
CANNABIS	100-300	75-150	300-550	650+
TOMATOES	150-350	75-150	350-550	650+
CUCUMBERS	100-300	--	300-550	650+
PEPPERS	150-350	--	300-550	650+

LUMATEK ZEUS 600W PRO 2.9 + 4 X 100W IND. SUPP. LIGHT LED BARS PPFD MAPS

TEST AREA 1.5M x 1.5M

TEST POINTS 100

TEST EQUIPMENT INTEGRATING 2 METER SPHERE & LI-COR 180

AMBIENT TEMPERATURE 25°

HEIGHT FROM CANOPY 30cm, 40cm, 50cm, 80cm, 100cm

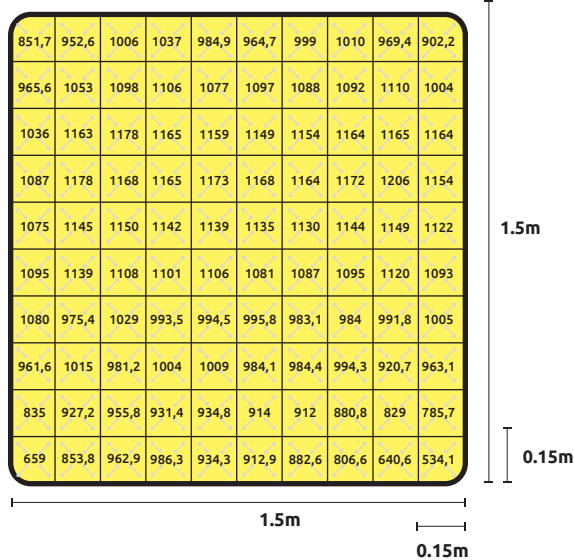
REFLECTION 0%

FIXTURE POWER 100%

HEIGHT TO TEST POINT **30cm**

CANOPY AVERAGE PPFD **1027.84 $\mu\text{mol/s/m}^2$**

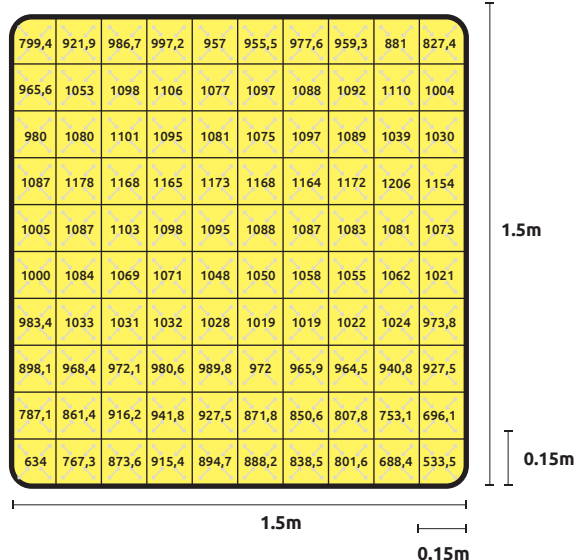
(Lumatek Zeus 600W Pro 2.9 + 4 x 100W Ind. Supp. Light LED Bars PPFD Map)



HEIGHT TO TEST POINT **40cm**

CANOPY AVERAGE PPFD **981.36 $\mu\text{mol/s/m}^2$**

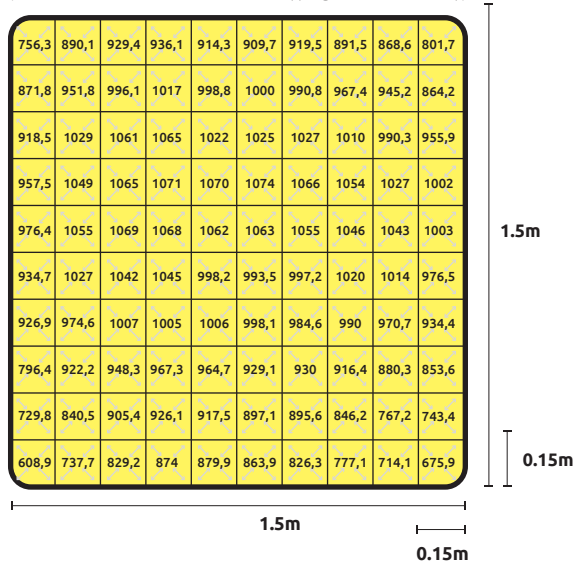
(Lumatek Zeus 600W Pro 2.9 + 4 x 100W Ind. Supp. Light LED Bars PPFD Map)



HEIGHT TO TEST POINT **50cm**

CANOPY AVERAGE PPFD **946.09 $\mu\text{mol/s/m}^2$**

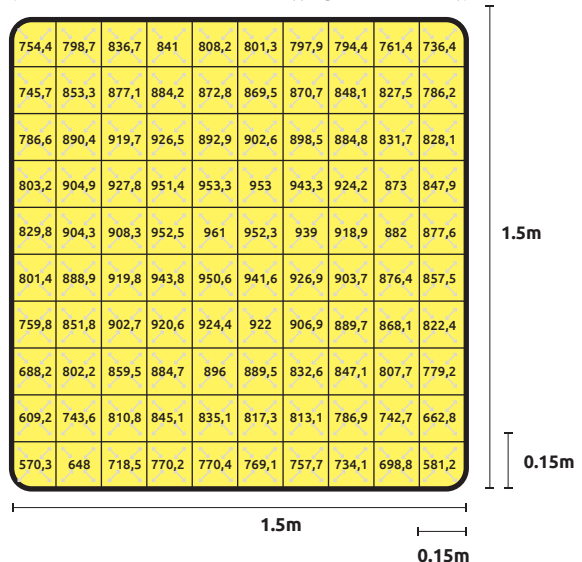
(Lumatek Zeus 600W Pro 2.9 + 4 x 100W Ind. Supp. Light LED Bars PPFD Map)



HEIGHT TO TEST POINT **80cm**

CANOPY AVERAGE PPFD **840.85 $\mu\text{mol/s/m}^2$**

(Lumatek Zeus 600W Pro 2.9 + 4 x 100W Ind. Supp. Light LED Bars PPFD Map)



HEIGHT TO TEST POINT **100cm**

CANOPY AVERAGE PPFD **789.87 $\mu\text{mol/s/m}^2$**

(Lumatek Zeus 600W Pro 2.9 + 4 x 100W Ind. Supp. Light LED Bars PPFD Map)

