

ModuLED | Nichia Modular Passive Star LED Cooler ø99mm

Features & Benefits

- The ModuLED modular passive LED coolers are specifically designed for luminaires using Nichia LED COB. Mechanical compatibility with direct mounting of the LED modules to the LED cooler and thermal performance matching the lumen packages.
- For spot and downlight designs from 3,600 to 9,400 lumen
- Thermal resistance range Rth 1.02 - 1.34°C/W
- Modular design with mounting holes foreseen for Nichia NFCWL036B/048B/060B/072B, NFCWD084B/096B, NFCWJ108B/120B, NFDWJ130B, NVEWL016Z LED COB by use of LED holder.
- Diameter 99mm - Standard height 50mm & 80 mm
Other heights on request
- Extruded from highly conductive aluminum



Order Information



Example : ModuLED 9950-B

ModuLED 99 **1** - **2**

- 1** Height (mm)
- 2** Anodising Color
B - Black
C - Clear

Simple mounting with self tapping screws
Recommended screw force 6lb/in
Screws are available from MechaTronix

ModuLED Modular Passive Star LED Cooler ø99mm

Product Details

Model n°	ModuLED 9950	ModuLED 9980
Dimension (mm) ^{*1}	ø99 x h50	ø99 x h80
Volume (mm ³)	137181	219491
Cooling Surface (mm ²)	104563	164008
Weight (gr)	356	573
Thermal Resistance (°C/W) ^{*2}	1.34	1.02
Power Pd (W) ^{*3}	37.3	48.9
Heat Sink Material	AL6063-T5	AL6063-T5

^{*1} 3D files are available in ParaSolid, STP and IGS on request

^{*2} The thermal resistance Rth is determined with a calibrated heat source of 30mm x 30mm central placed on the heat sink, Tamb 40° and an open environment. Reference data @ heat sink to ambient temperature rise Ths-amb 50°C
The thermal resistance of a LED cooler is not a fix value and will vary with the applied dissipated power Pd

^{*3} Dissipated power Pd. Reference data @ heat sink to ambient temperature rise Ths-amb 50°C
The maximal dissipated power needs to be verified in function of required case temperature Tc or junction temperature Tj and related to the estimated ambient temperature where the light fixture will be placed
Please be aware the dissipated power Pd is not the same as the electrical power Pe of a LED module

To calculate the dissipated power please use the following formula: $Pd = Pe \times (1 - \eta_L)$

Pd - Dissipated power

Pe - Electrical power

η_L = Light efficiency of the LED module

Notes:

- MechaTronix reserves the right to change products or specifications without prior notice.
- Mentioned models are an extraction of full product range.
- For specific mechanical adaptations please contact MechaTronix.