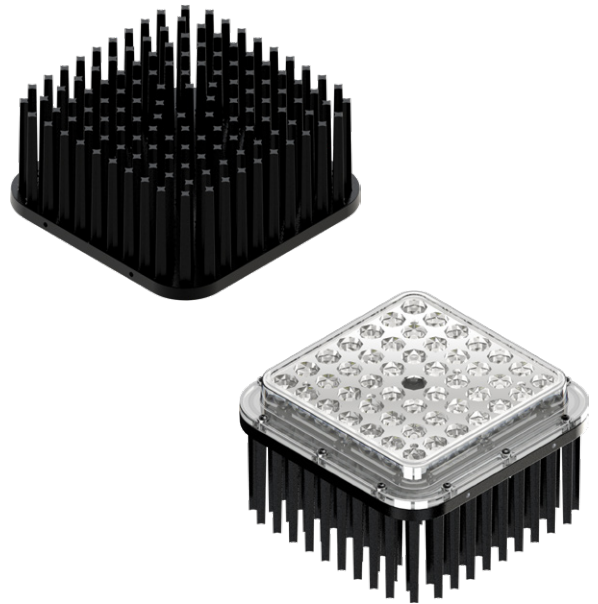# CoolBlock® ARENA-48 Square Pin Fin LED Cooler

Features & Benefits

- The CoolBlock® ARENA-48 square Pin Fin LED cooler is specifically designed for luminaires using the 48 emitters LED board platform. Mechanical compatibility with direct mounting of the LED engines to the LED cooler and thermal performance matching the lumen packages.

- For multi-emitter high mast and stadium light designs from 10,000 to 20,000 lumen

- Thermal resistance Rth 0.47°C/W

- Accommodating 135x135mm LED boards with 48 high power LEDs like the Cezos Osram K319, K321, K322, K323 and K324 LED PCB's, direct mounting with just a few screws.

- Direct fit with Khatod ARENA reflective optical system for IP65 waterproof designs in various beam patterns

- Star-shaped pins for enhanced rigidity and cooling surface

- W180mm - L180mm - H80mm

- With CoolConnect® Gland becomes IP65 waterproof cable feed-through

Order Information

CEZOS

OSRAM
Opto Semiconductors

LED Light for you
powered by OSRAM
CERTIFIED PARTNER

KHATOD®
Optical Solutions for LED Lighting
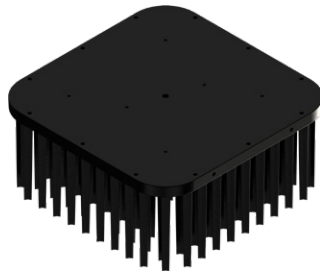
Example : CoolBlock® ARENA-48-B

CoolBlock® ARENA-48- **1**

1 Electro-coating Color

B - Black
Z - custom (specify)

Simple mounting with M3, M4 screws

Screws are avaliable from MechaTronix

MTx MechaTronix

CoolBlock® ARENA-48 Square Pin Fin LED Cooler

Product Details

Model n°	CoolBlock® ARENA-48
Dimension (mm)[1]	W180mm - L180mm - H80mm
Volume (mm³)	625700
Cooling Surface (mm²)	310334
Weight (gr)	1640
Thermal Resistance (°C/W)[2]	0.47
Power Pd (W)[3]	106
Heat Sink Material	ADC12
Surface finishing	Black electro-coating

[1] 3D files are avaliable in ParaSolid, STP and IGS on request

[2] The thermal resistance Rth is determined with a dummy heater of 65mm x 65mm central placed on the heat sink, Tamb 35° 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
ηL = Light effciency 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.