

View Opti Beam Lens round

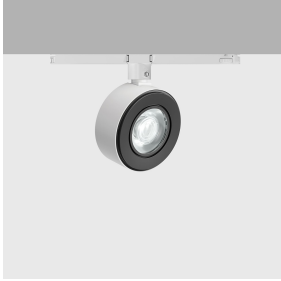
Design iGuzzini /
Arup

iGuzzini

Last information update: March 2025

Product configuration: 446B

446B: round small body spotlight - medium



Product code

446B: round small body spotlight - medium

Technical description

Indoor adjustable spotlight with adapter for installation on a three-phase/DALI track. Device made of die-cast aluminium and a front part made of a thermoplastic material. Spotlight double adjustability allows a 360° rotation about the vertical axis and 90° tilting relative to the horizontal plane. Optical assembly consisting of Warm White tone 3000K CRI97 LEDs with OPTIBEAM LENS technology and a medium light beam. Dimmable DALI driver built-in to box with a semi-hidden system on track. Option of installing a range of flat accessories including an OPTIBEAM REFRACTOR for varying light distribution, an elliptical distribution refractor, a louvre, a soft lens and an outdoor accessory like an asymmetric visor for eliminating stray light dispersion on the ceiling.

Installation

On a three-phase/DALI electrified track

Colour

Black (04) | Black / White (47)

Weight (Kg)

1.06

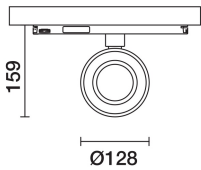
Mounting

dali track|three circuit track

Wiring

Product complete with DALI dimmable components, housed in a semi-hidden box on the track.

Complies with EN60598-1 and pertinent regulations



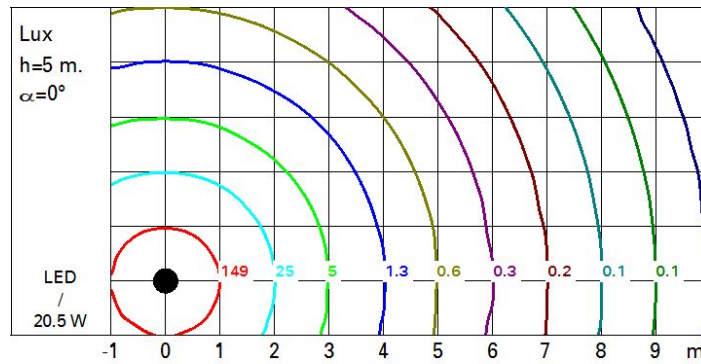
Technical data

| | | | |
|--|------|--|--|
| lm system: | 1592 | MacAdam Step: | 2 |
| W system: | 20.5 | Life Time LED 1: | > 50,000h - L90 - B10 (Ta 25°C) |
| lm source: | 1900 | Lamp code: | LED |
| W source: | 18 | Number of lamps for optical assembly: | 1 |
| Luminous efficiency (lm/W, real value): | 77.6 | ZVEI Code: | LED |
| lm in emergency mode: | - | Number of optical assemblies: | 1 |
| Total light flux at or above an angle of 90° [Lm]: | 0 | Power factor: | See installation instructions |
| Light Output Ratio (L.O.R.) [%]: | 84 | Inrush current: | 5 A / 50 µs |
| Beam angle [°]: | 26° | Maximum number of luminaires of this type per miniature circuit breaker: | B10A: 31 luminaires B16A: 50 luminaires C10A: 52 luminaires C16A: 85 luminaires |
| CRI (minimum): | 97 | Overvoltage protection: | 4kV Common mode & 2kV Differential mode |
| Colour temperature [K]: | 3000 | Control: | DALI-2 |

Polar

| Imax=6278 cd | Lux | | | |
|--------------|-----|-----|------|------------------|
| | h | d | Em | E _{max} |
| | 2 | 1 | 1263 | 1570 |
| | 4 | 1.9 | 316 | 392 |
| | 6 | 2.9 | 140 | 174 |
| | 8 | 3.8 | 79 | 98 |

Isolux



UGR diagram

| Corrected UGR values (at 1900 lm bare lamp luminous flux) | | | | | | | | | | | |
|---|------|------------|------|------|------|------|------------|------|------|------|------|
| Riflect.: | | 0.70 | 0.70 | 0.50 | 0.50 | 0.30 | 0.70 | 0.70 | 0.50 | 0.50 | 0.30 |
| ceiling/cav | | | | | | | | | | | |
| walls | | | | | | | | | | | |
| work pl. | | | | | | | | | | | |
| Room dim | | viewed | | | | | viewed | | | | |
| x | y | crosswise | | | | | endwise | | | | |
| 2H | 2H | 13.7 | 15.7 | 14.1 | 10.0 | 10.3 | 13.7 | 15.7 | 14.1 | 10.0 | 10.3 |
| | 3H | 14.4 | 16.0 | 14.8 | 10.3 | 10.6 | 13.9 | 15.5 | 14.3 | 15.8 | 10.1 |
| | 4H | 14.7 | 16.0 | 15.1 | 10.3 | 10.7 | 14.0 | 15.3 | 14.4 | 15.0 | 10.0 |
| | 6H | 14.9 | 15.9 | 15.3 | 10.3 | 10.6 | 14.0 | 15.1 | 14.4 | 15.4 | 15.8 |
| | 8H | 14.9 | 15.9 | 15.3 | 10.3 | 10.6 | 14.0 | 15.0 | 14.4 | 15.4 | 15.7 |
| | 12H | 14.9 | 15.9 | 15.3 | 10.3 | 10.6 | 14.0 | 15.0 | 14.4 | 15.3 | 15.7 |
| 4H | 2H | 14.0 | 15.3 | 14.4 | 15.0 | 10.0 | 14.7 | 10.0 | 15.1 | 10.3 | 10.7 |
| | 3H | 15.0 | 15.9 | 15.4 | 10.3 | 10.7 | 15.1 | 10.1 | 15.5 | 10.5 | 10.9 |
| | 4H | 15.3 | 16.2 | 15.7 | 10.0 | 17.0 | 15.3 | 10.2 | 15.7 | 10.0 | 17.0 |
| | 6H | 15.3 | 16.8 | 15.7 | 17.3 | 17.7 | 15.1 | 10.7 | 15.0 | 17.1 | 17.0 |
| | 8H | 15.2 | 17.0 | 15.7 | 17.5 | 17.9 | 15.0 | 10.8 | 15.5 | 17.3 | 17.8 |
| | 12H | 15.1 | 17.0 | 15.0 | 17.5 | 18.0 | 14.9 | 10.8 | 15.4 | 17.3 | 17.8 |
| 8H | 4H | 15.0 | 16.8 | 15.5 | 17.3 | 17.8 | 15.2 | 17.0 | 15.7 | 17.5 | 17.9 |
| | 6H | 15.3 | 17.0 | 15.8 | 17.5 | 18.0 | 15.3 | 17.0 | 15.8 | 17.5 | 18.1 |
| | 8H | 15.4 | 16.9 | 15.9 | 17.4 | 18.0 | 15.4 | 16.9 | 15.9 | 17.4 | 18.0 |
| | 12H | 15.0 | 16.6 | 16.1 | 17.1 | 17.7 | 15.0 | 16.6 | 16.1 | 17.1 | 17.7 |
| 12H | 4H | 14.9 | 16.8 | 15.4 | 17.3 | 17.8 | 15.1 | 17.0 | 15.0 | 17.5 | 18.0 |
| | 6H | 15.3 | 16.8 | 15.8 | 17.3 | 17.9 | 15.4 | 16.9 | 15.9 | 17.4 | 17.9 |
| | 8H | 15.0 | 16.6 | 16.1 | 17.1 | 17.7 | 15.0 | 16.6 | 16.1 | 17.1 | 17.7 |
| Variations with the observer position at spacing: | | | | | | | | | | | |
| S = | 1.0H | 1.1 / -0.7 | | | | | 1.1 / -0.7 | | | | |
| | 1.5H | 2.4 / -1.2 | | | | | 2.4 / -1.2 | | | | |
| | 2.0H | 3.7 / -1.0 | | | | | 3.7 / -1.0 | | | | |