

# FLAT MOON LED 470 (RECESSED)

## Description

Round shaped LED luminaire for ceiling recessed application. The rounded housing is made of an aluminium extruded profile that has been bent into the circular shape. The luminaire has a rim of 12mm to cover the ceiling opening.

The LED luminaire is fitted with 1 dedicated round LED PCB which is placed on a white powder painted led holder plate. The PCB contains 104 medium power LED's which are equally distributed on the surface.

The back of the housing contains a steel plate with the electronic LED driver and terminal block for easy connection to the mains.

A PMMA diffuser covers the front of the luminaire which results in a high efficient luminaire with no dottiness.

All of the electric and electronic components at the backside of the luminaire are covered by a metal ceiling housing.

No visible screws or wires after installation.

## Materials

- Aluminium housing finished with a scratch resistant fine textured powder coating in white or matt black
- LED holder plate in steel finished with a scratch resistant fine white textured powder coating
- Backcover in aluminium finished with a scratch resistant fine textured powder coating in matt black
- Driver plate in galvanized steel
- PMMA white diffuser

## Technical characteristics

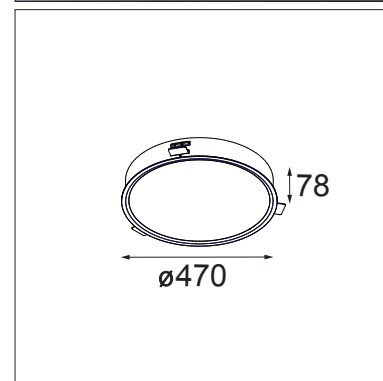
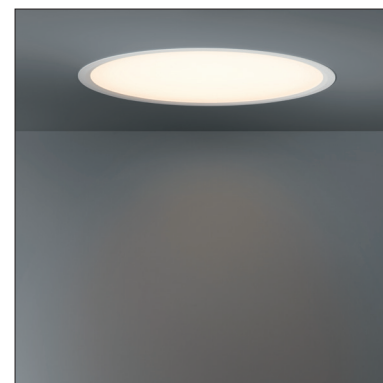
- Dimensions:  $\varnothing 470$ mm, H 78mm
- Circular PCB with medium power LED's
- Colour temperature: 2700 K, 3000K or 4000K
- CRI 90+
- 3SDCM
- Luminaire output: 2545lm (for 3000K, and standard diffuser)
- Luminaire efficiency: 79%
- Luminaire power consumption: 29.4W (driver included), 86.5lm/W
- UGR 22
- Built-in LED driver, 1-10V/Pushdim or DALI
- Warranty period: 5 years on LED, 2 years on drivers
- Power: 220-230 V, 50-60 Hz
- Class 1
- Only for indoor use

## Installation

- RECESSED: Make a hole of  $\varnothing 450$ mm in the ceiling. Electrical connection to mains with 5 pole terminal block (0.75 to 2.5mm<sup>2</sup>) suitable for through wiring. Fix the luminaire in the ceiling with 3 galvanized steelplate brackets (included).

## Accessories

- Prismatic front diffuser, PMMA. This results in a high efficient and low UGR rated luminaire that complies with the EN12464-1 office standard.
  - Luminaire output: 2508lm (for 3000K)
  - Luminaire efficiency: 78%
  - Luminaire power consumption: 29.4W (driver included), 85.3lm/W
  - UGR 19
- Ice Prismatic front diffuser, PMMA. This results in a high efficient and low UGR rated luminaire that complies with the EN12464-1 office standard.
  - Luminaire output: 2431lm (for 3000K)
  - Luminaire efficiency: 75.5%
  - Luminaire power consumption: 29.4W (driver included), 82.7lm/W
  - UGR 19



Standards and directives:

- 2006/95/EC - Low Voltage Directive
- 2004/108/EC - EMC Directive
- 2011/65/EU - RoHS Directive
- 2009/125/EC - ECODESIGN Directive
- 245/2009/EC + 347/2010/EU - ECODESIGN Directive
- 1194/2012/EU - ECODESIGN Regulation
- EN 60598-1:2008 +A11:2009 - Luminaires. General requirements and tests
- EN 62471:2008 - Photobiological safety of LED lamps and lamp systems
- EN 62493: 2010 - Assessment of lighting equipment related to human exposure to electromagnetic fields
- EN 60598-2-2:2012 - Recessed luminaires
- EN 55015:2006 +A1:2007 +A2:2009 - Limits and methods of measurement of radio disturbance characteristics of electrical lighting and similar equipment
- EN 61000-3-2:2006 +A1,A2:2009 - Limits for harmonic current emissions (equipment input current  $\leq 16$  A per phase)
- EN 61000-3-3:2013 - Limitation of voltage changes, voltage fluctuations and flicker in public low-voltage supply systems, for equipment with rated current  $\leq 16$  A per phase and not subject to conditional connection
- EN 61547:2009 - EMC Immunity Requirements
- EN 50581:2012 - Technical documentation for the assessment of electrical and electronic products with respect to the restriction of hazardous substances