

Try the easy lighting

New family member: OSRAM SOLERIQ® S 13 - Chip-on-Board LED with Zhaga-compliant LE





Easily setting new standards

SOLERIQ® S 13 is the latest addition to OSRAM Opto Semiconductors' state-of-the-art easy to use SOLERIQ® LED family. These new innovative LEDs offer Chip-on-Board design, high luminous efficacy and are specifically designed for spotlight applications.

Advantages

Lower costs and higher quality

As a single component with the highest luminous flux, and no SMT assembly required, SOLERIQ® S 13 is much easier for lighting manufacturers to use. With a light emitting surface (LES) of \varnothing 13.5 mm, it also enables Zhaga standard designs – thus even further enhancing ease of use and supporting LED interchangeability.

SOLERIQ® S 13 is available in a broad range of color temperatures enabling unlimited luminaire designs for applications around the globe. This new LED package delivers excellent color consistency within a 3-step MacAdam ellipse.

These properties make the SOLERIQ® S 13 a highly efficient, high-quality and price-performance-optimized solution, especially in the world of indoor general lighting.



Preparing aesthetic LED lighting solutions for restaurants and bars

Promoting new successful shop lighting and LED luminaire solutions





Features

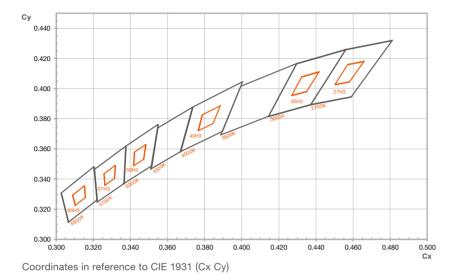
- High luminous flux out of one single LED package
- Higher Im/\$ compared to ceramic based packages
- Uniform illumination without multi shadows due to uniform light emitting surface
- Package size of 18.0 mm x 18.0 mm x 1.55 mm
- Light emitting surface (LES): Ø 13.5 mm
- Color consistency within 3-step MacAdam
- Easy-to-use metal core board
- Easy mounting without SMD soldering: gluing, screws or brackets
- Easy to install with off-the-shelf solderless connectors and lenses
- Stable brightness over lifetime
- Excellent color reproduction with CRI min. 80 (typ. 85)
- Full range of color temperatures: 2700 K 6500 K (white)
- Low forward voltage for easy certification of luminaires
- Luminous flux: typ. 1625 lm @ 4000 K
- Luminous efficacy: typ. 98 lm/W @ 4000 K
- Viewing angle at 50 % lv: 120°
- High energy efficiency

Applications

SOLERIQ® S are specifically designed for applications requiring large flux packages out of a compact area. The SOLERIQ® S 13 is perfectly suitable for indoor general lighting and especially spotlight solutions – in commercial application fields, but also for residential use.

- Hospitality
- Restaurants
- Shops
- Homes
- Spot lights
- Ambient lighting
- Indoor general lighting

Elegant professional indoor lighting solutions even for high demands



SOLERIQ® S 13 white binning

Binning for the SOLERIQ® S 13 simplifies the design of luminaires. The maximum color deviation defined by this binning corresponds to what is most commonly required by customers and most widely used in today's lighting applications: a 3-step MacAdam ellipse.

Mechanical Interface

Includes shape, dimensions, socket

Thermal Interface

Define how cooling elements mate to the module's thermal surface

Electrical Interface

AC or DC, insulation, grounding, controls

LED light engine

Photometric Interface

Size of the light emitting surface, distribution pattern, uniformity of light on the task plane, light color, lumen output

Making LED light sources interchangeable: Zhaga

Interchangeable LED light sources are essential for the entire lighting industry. Zhaga specifications benefit manufacturers, distributors, specifiers and end-users of lighting products.

- Zhaga aims to make LED light sources from multiple manufacturers interchangeable
- Zhaga uses the term "LED light engine" to describe the combination of an LED module and its associated electronic control gear
- Zhaga establishes specifications for four key interfaces of an LED light engine: mechanical, thermal, electrical and photometric

SOLERIQ® S 13

| Туре | Color | ССТ | Typ. CRI | Typ. Luminous Flux @ 500 mA & Ts = 25°C | Typ. Luminous Flux @ 500 mA & Ts = 85°C |
|--------------|---------------|--------|----------|--|--|
| GW KAGHB1.EM | warm white | 2700 K | 82 | 1525 | 1375 |
| GW KAGHB1.EM | warm white | 3000 K | 84 | 1575 | 1420 |
| GW KAGHB1.EM | neutral white | 4000 K | 85 | 1625 | 1460 |
| GW KAGHB1.EM | neutral white | 5000 K | 85 | 1650 | 1485 |
| GW KAGHB1.EM | cool white | 5700 K | 84 | 1650 | 1485 |
| GW KAGHB1.EM | cool white | 6500 K | 84 | 1650 | 1485 |





SOLERIQ® S 13 on the Internet:

www.osram-os.com/soleriq-s

For further information on the available products please visit our product catalog at http://catalog.osram-os.com

More information about LED in General Lighting:

LED Light Site ledlight.osram-os.com

LED Light for you Network www.ledlightforyou.com



www.osram.com/led

Asia

OSRAM Opto Semiconductors Asia Ltd. 30/F China Resources Building 26 Harbour Road, Wan Chai Hong Kong SAR Phone: +852 3652 5522

Fax: +852 2802 0880

E-mail: prasia@osram-os.com

Europe

OSRAM Opto Semiconductors GmbH Leibnizstraße 4 D-93055 Regensburg, Germany Phone: +49 941 850 1700 Fax: +49 941 850 3302

E-mail: support@osram-os.com

USA

OSRAM Opto Semiconductors Inc. 1150 Kifer Road, Suite 100 Sunnyvale, CA 94086, USA Main Phone number: (408) 962-3700 Main Fax: (408) 738-9120 Inbound Toll Free: (866) 993-5211 E-mail: info@osram-os.com