

E2

Lighting for demanding environments





High-protection factor luminaires

E2



In damp and/or highly soiled spaces you will require enclosed luminaires. With the E2, ETAP provides an LED lighting solution for the chemical, pharmaceutical and food industries, among others.

ROBUST

Extremely high protection factor

The E2 satisfies the most stringent lighting requirements in demanding environments. The robust, aluminium housing is resistant against numerous aggressive chemicals. Additionally the LEDs, which are sensitive to corrosion, are safely enclosed in a sealed compartment (compliant with corrosion test EN60038-2-60). The result? A series of impact-resistant (IK07/IK08), dust-proof and watertight (IP66) luminaires that furthermore operate trouble-free in a wide temperature range.

EFFICIENT

Advanced photometry

E2 uses a linear lens which combines comfort and efficiency with great flexibility in terms of light distribution, which allows for each space to be optimally illuminated. The LEDs were selected based on their high efficiency and low power consumption.

SUSTAINABLE

For the long haul

LEDs offer quite a few benefits in production environments, where lamp replacement is often not easy. But ETAP goes one step further. High-quality LEDs, excellent thermal management and intelligent design result in particularly high lumen maintenance and low Total Cost of Ownership.

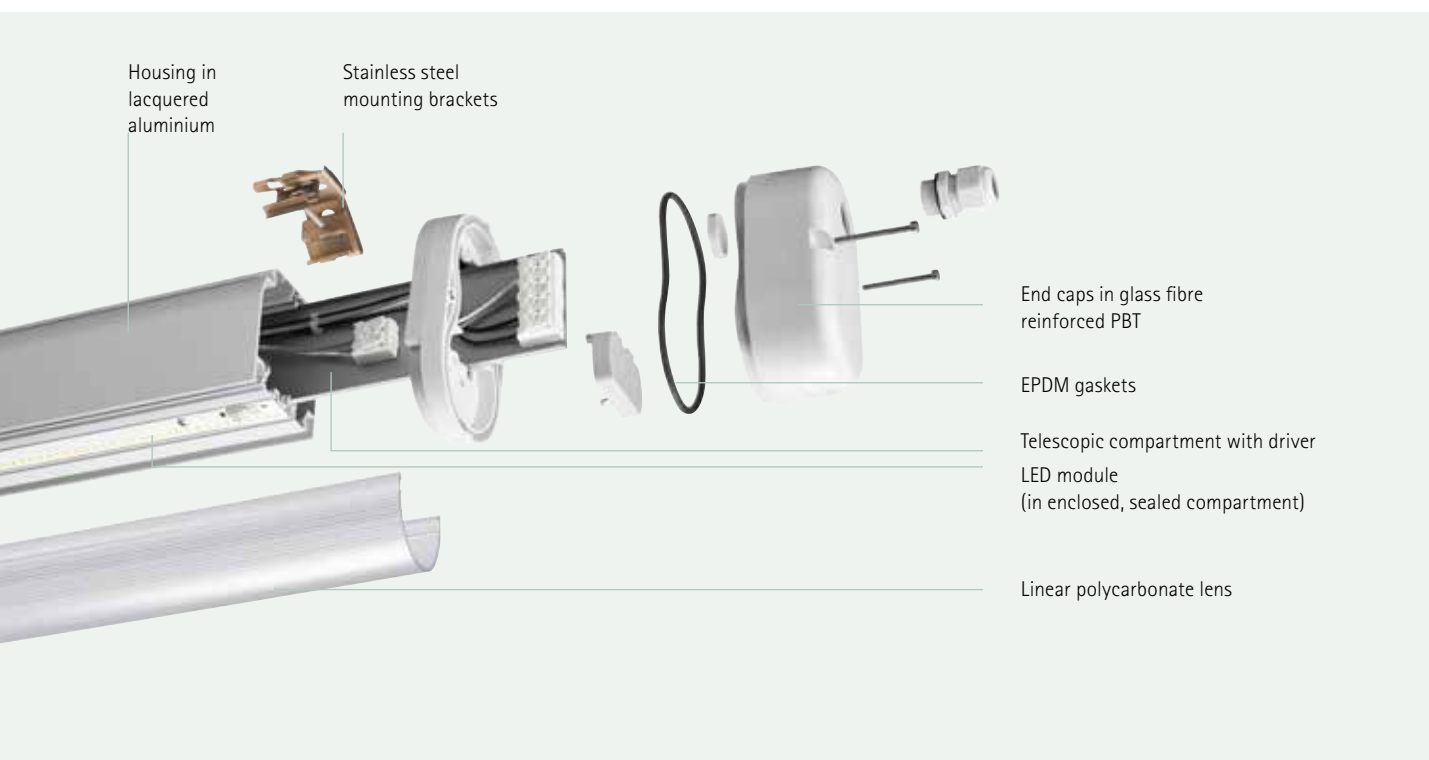
Full ATEX range available

In gas and dusty environments, high temperatures and sparks can give rise to explosion risks. That is why it is important to use adapted lighting in critical environments. The E2 series is therefore available in an ATEX-certified version for safe use in such environments, including service stations, flourmills, sawmills, petrochemistry and powdering and lacquering facilities.



Top performance in a robust housing

The E2 has been specifically developed with the most demanding environments in mind. Nothing has been left to chance, from chemically resistant materials to impact-proof, dust-proof and jet-proof housing.



⇒ Dustproof

The E2 series satisfies the IP66 classification. In practical terms therefore the luminaires fall into the highest class in terms of dustproofing ('protection against foreign objects') and are jetproof on all sides.

⇒ Pressure wash resistant

E2 luminaires with a standard end panel (without integrated sensor or emergency lighting module) also satisfy the IP69K class. In order to test this, the fixture is sprayed from several angles with water at 80°C and under pressure of up to 100 bar. This test will guarantee that the series also exhibits resistance against extreme cleaning, which is relevant, for environments where hygiene and cleanliness are of the utmost importance, such as food processing plants.

⇒ Impact-resistant

The E2 luminaires satisfy the IK08 test for impact resistance, in line with guidelines in the most demanding industries. They resist mechanical impact with 5-joule shock energy.



⇒ Chemical-resistant

All materials and components have been specifically selected for their resistance against numerous aggressive chemicals, gases and liquids. The LEDs, which are particularly sensitive to corrosion, are safely housed in a sealed compartment. The glued housing and EPDM gaskets between end caps and housing prevent corrosion by gases (compliant with corrosion test EN60068-2-60).

Do you need E2 luminaires for highly specific conditions? Please contact your ETAP advisor and we will examine the options together.

⇒ Temperature-resistant

E2 luminaires operate trouble-free in temperatures from -25°C to +35°C (optional from -40°C to +45°C) and can withstand major temperature fluctuations.

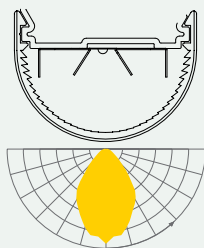


Advanced lighting technology

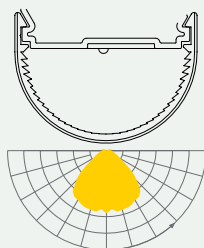
The E2 combines high protection factor with advanced and efficient lighting technologies, which results in exceptional performance in terms of efficiency, lifetime and comfort. Thanks to three different light distributions each space is optimally illuminated.

For every application

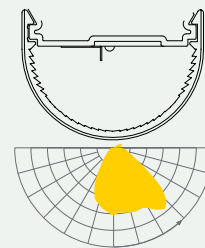
The E2 lens has a double function. The structure on the inside determines the specific light distribution for a wide array of applications: medium angle, wide angle, but also asymmetric for the directional lighting of vertical surfaces such as workstations and racks. The diffuse outside of the lens reduces the luminance of the LEDs (UGR < 25).



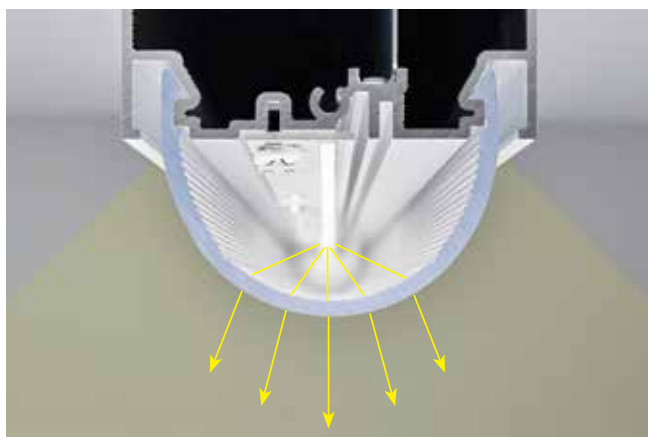
Medium wide-angle:
directional illumination of large spaces



Wide-angle:
uniform lighting of the entire space



Asymmetric:
directional lighting of vertical surfaces such as workstations or racks



The surface structure on the inside ensures directional light distribution. The diffuse outside of the lens results in low glare and optimum comfort.

High efficiency, long service life

Medium-power LEDs combine high efficiency, low consumption and long service life. Ceramic-based LEDs also remain particularly stable at high temperatures: after 50,000 burning hours they retain up to 96 % of their luminous intensity (LLMF – Lamp Lumen Maintenance Factor).

Safe use in gas and dusty environments

E2 luminaires are available in an ATEX-certified version, which makes them suitable for safe use in gas and dusty environments such as service stations, flourmills, sawmills, in petrochemistry and powdering and lacquering facilities.


The ATEX luminaires in the E2 series are suitable for gas environments (zone 2) and dusty environments (zones 21 and 22). In their development attention was paid to the following aspects:

- Temperature management, on both the surface of the appliance and within
- Appliance seal, with, among others, a glued gasket against gas and dust penetration
- Impact-resistance
- Markings for the correct usage of the product
- Maintenance of luminous flux and sustainable product properties for its entire lifespan

Tested and certified

All components and materials for the ATEX luminaires have been extensively tested by independent agencies. Our production chain for ATEX luminaires has also been certified. The luminaires are delivered with all documentation required for inspection bodies.

Our ATEX luminaires carry the following labels:

 II 2D Ex tb IIIC T80 Db

 II 3G Ex ec IIC T4 Gc

Easy maintenance

Thanks to their long service life, LEDs offer an additional advantage in ATEX environments, where replacement and maintenance lead to major cost and production downtime in accordance with standard procedures.

ATEX emergency lighting

The E2 series also provides an ATEX-certified solution for your emergency lighting. You can choose between individual KE2 emergency luminaires for anti-panic and escape route lighting, or an emergency lighting module can be integrated into the E2 luminaires.

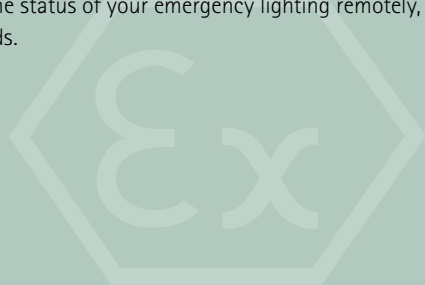
The ATEX emergency luminaires can also be connected to our ETAP Safety Manager system, which enables you to monitor the status of your emergency lighting remotely, thus eliminating the need to make rounds.



ATEX version for zone 2 (gas) and zones 21-22 (dust).



KE2 individual emergency luminaires.





Installation and maintenance

E2

The E2 has been designed with minimum installation and maintenance costs in mind.

Easy installation



1 Secure brackets

Fix the brackets to the ceiling. Only two suspension points are required for each luminaire.



2 Snap the luminaire in place.

Click the luminaires into the brackets and secure with screws.



3 Connect

Thanks to the removable end caps, the luminaires can be quickly connected. The LEDs are furthermore safely shielded to prevent being touched during installation. Tighten the screws on the end caps and you are good to go!

Easy maintenance

The luminaires are easy to clean. Any potential maintenance on the drivers is easy, thanks to the removable end caps. Remove the end cap, disconnect the LED module and the driver can be easily taken out of the housing.



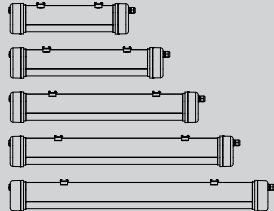
Range

E2 luminaires are available in several lengths and with various lumen packages and light distributions. This enables us to develop a bespoke solution for every space and application.

You can increase the functionality and comfort of your E2 luminaires by fitting them with a daylight sensor or emergency module, or by managing them with the Excellum2 light control system.

Lumen packages and lengths

E2 luminaires are available in five different lengths* and lumen packages, which enables us to provide the correct luminous intensity for every space, surface and application with a minimum number of luminaires.



- 620 mm – 3,000 lumen
- 870 mm – 4,500 lumen
- 1120 mm – 6,000 lumen
- 1370 mm – 7,500 lumen
- 1620 mm – 9,000 lumen



Options

Extra savings with daylight

E2 luminaires can be fitted with ETAP's ELS daylight sensors. The sensors are built into an adapted version of the end caps.

Integrated LED modules for emergency lighting

E2 luminaires can be fitted with an integrated LED module for emergency lighting. The module is built into a longer end cap, just like the daylight sensors.

Easy management through Excellum2

By managing the E2 luminaires using ETAP's Excellum2 light control system your lighting installation's energy efficiency can be considerably increased. The luminaires can also be integrated into your existing building management system.

Driver for heavy industrial environments

The standard E2 driver can withstand voltage peaks up to 1|2 kV (L/N|LN/PE in accordance with EN61547 § 5.7). An optional driver is available that can withstand peaks up to 2|4 kV with a wider temperature range (-40°C to +45°C).



E2 with ELS



E2 with LED module for emergency lighting

* With integrated daylight sensor or emergency lighting: + 100 mm.



All types of luminous flux and lengths are also available in the ATEX version. In addition, we also offer ATEX emergency lighting (escape route and anti-panic lighting). Lastly, an integrated solution is also available.



E2 ATEX lighting



KE2 ATEX emergency lighting



KE2 ATEX emergency lighting



E2

- LED lighting for demanding environments
- Dustproof and watertight (IP66) as well as impact-resistant (IK08)
- Pressure wash resistant (IP69K)
- Withstand chemicals and gas corrosion (see EN60068-2-60)
- Temperature-resistant from -25°C to +35°C (optional from -40°C to +45°C)
- High comfort thanks to advanced lens technology
- Energy-efficient: high output, low consumption
- Flexible: light distribution and quantity geared to your needs
- Durable: long service life, high lumen maintenance
- Easy installation and maintenance
- Available in ATEX version



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01/21.012 E/2
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