

OMS spol. s r.o.
Dojč 419
906 02 Dojč
Slovakia
Tel.: +421 34 694 0811
Fax: +421 34 694 0888
www.omslighting.com
info@oms.sk

Zipar

UNO / DUO / TRIO / QUATRO-S RECESSED
SURFACED / SUSPENDED
TRIO SURFACED
UNO / DUO / TRIO / QUATRO-S SUSPENDED
TRACK
MOVABLE
ADJUSTABLE



Accent lighting has been the domain of highly inefficient halogen and damaging metalhalide for many years.

The past

Halogen and metal-halide are suited to accent lighting thanks to their small dimensions and good colour rendition, but come with disadvantages.

HMGS up to 10 lm/W with a lifetime of 3000 hours MRS up to 47 lm/W with a lifetime of 12,000 hours

Modern LED accent lighting not only offers impressive efficacies and lifetimes, but also protects displayed items thanks to low IR and UV output.



The future

LED, on the other hand, brings all the same benefits without the disadvantages.

LED

up to 138 lm/W with a lifetime of 50,000 hours

IPAR 6/7

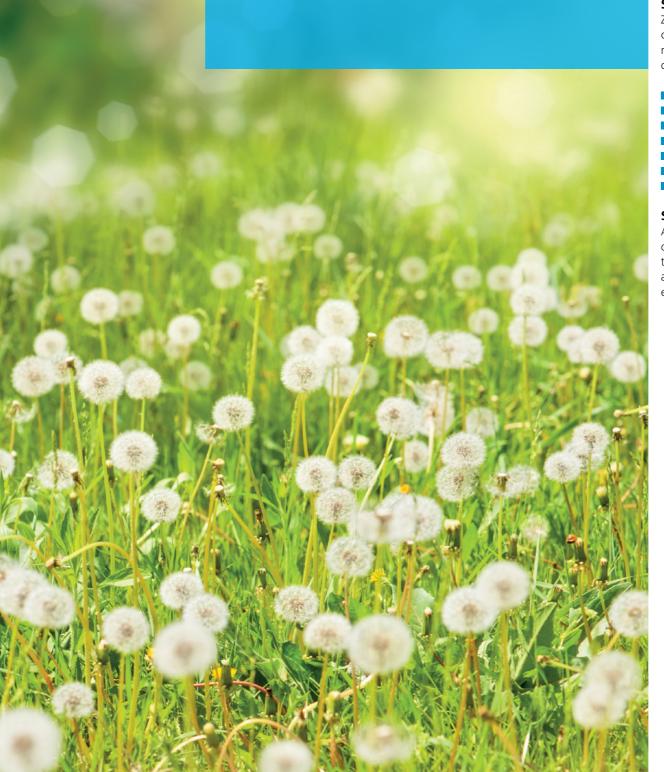


Why LED

Few areas of application can benefit from LED as much as retail, as well as architectural and hospitality lighting. So, why switch to LED?

- **LEDs are more effective.** They consume less energy to produce the same light, making them cost effective to run and eco-friendly. This is further enhanced by the fact that LEDs work for longer. These features makes a big difference in the long run, saving time and money on light source changes in addition to the amount and cost of energy used.
- **LEDs are cleaner.** All light sources contain some amount of hazardous material. However, the amount contained in LEDs is negligible. The same cannot be said for many other types of light source as they often contain significant quantities of mercury and other substances. These substances are not only dangerous when released into the environment, but also detrimental to our health.
- The light can be more easily controlled. The light emitted from LEDs can be precisely controlled by optical systems designed specifically for LED. This means that light can be more evenly distributed, directed as needed, with reduced glare. Not only does this improve lighting performance and visual comfort, it further adds to the effectiveness of the overall lighting system.
- **LEDs offer better quality light.** High-quality LEDs offer excellent colour rendition properties, a wide range of colour temperature options, are fully controllable using switching and dimming, and can even emit physiologically beneficial light that benefits our health and wellbeing.
- **LEDs are infinitely controllable.** LEDs can be dimmed as much as you want with little effect on their lifetime. This is not the case for any other type of light source. What's more, LEDs can be digitally controlled in ways no other light source can, which offers almost inexhaustible possibilities for inclusion into dynamic and energy saving Lighting Management Systems.
- The light is less damaging to the items being illuminated. LEDs emit negligible amounts of harmful IR (heat) and UV radiation. In retail and some other applications, this is crucial because heat makes foods and materials dry and deteriorate, and UV fades fabrics and causes damage to various substances. LED minimises damage, and so reduces losses.
- Air conditioning systems can work less. It is important that indoor spaces not be too hot so that occupants are comfortable and motivated. In large-area applications where many luminaires are switched on for extended periods of time, an immense amount of heat is emitted from conventional light sources. Subsequently, air conditioning costs in such spaces are very high. By using low-IR LED, the energy consumption of AC systems and associated costs can be greatly reduced.

In our fight to protect the environment, reduce energy use, and minimise costs, it is clear that LED is the future of lighting.



With consistently increasing demand for energy and its environmental impact, we want to make choices that are not only financially but also ecologically sound. As downlights form a fundamental part of many lighting systems, it is of vital importance to pay attention to their long-term performance. Making the step to install new LED lighting really can make a difference. Maybe more than you expect.

System efficacy

ZIPAR luminaires offer exceptional efficacies. This is the result of combining the best LEDs with cleverly designed PCBs, selection of the most effective components, and the addition of high-performance optical systems.

- ZIPAR UNO / DUO / TRIO / QUATRO-S RECESSED up to 138 lm/W
- ZIPAR SURFACED / SUSPENDED up to 121 lm/W
- ZIPAR TRIO SURFACED up to 136 lm/W
- ZIPAR UNO / DUO / TRIO / QUATRO-S SUSPENDED up to 138 lm/W
- ZIPAR TRACK up to 121 lm/W
- ZIPAR MOVABLE up to 121 lm/W
- ZIPAR ADJUSTABLE up to 121 lm/W

Service lifetime

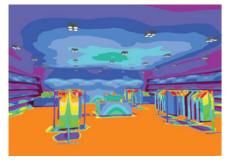
All ZIPAR luminaires have a lifetime of 50,000 hours / L80. Based on 14 hours of operation per day, 7 days per week, this equates to almost 10 years of reliable service without the need to change a single light source. This can be further improved by the use of an energy saving Lighting Management System.



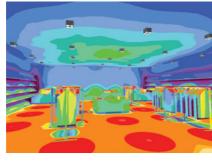
The real difference LED makes

To fully understand the scope of benefits offered by installing ZIPAR, let us make real comparisons between comparitive conventional HM and HIT spotlights and ZIPAR with LED.

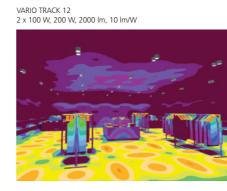
FUTURO 22 4 x 100 W, 400 W, 4000 lm, 10 lm/W



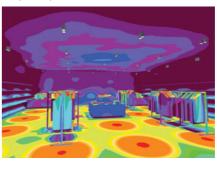
ZIPAR QUATRO-S RECESSED 45 W, 4900 lm, 131 lm/W



System efficacy Energy consumption ▲ 1100 % ▼ 89 %

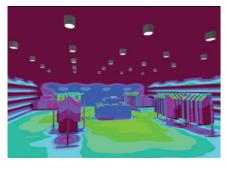


ZIPAR DUO SUSPENDED 23 W, 2750 lm, 120 lm/W

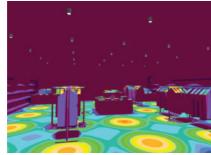


System efficacy Energy consumption **▲ 1100** % ▼ 89 %

TUBUS 291 2 x 18 W, 35 W, 1550 lm, 52 lm/W



ZIPAR SURFACED 12 W, 1450 lm, 121 lm/W

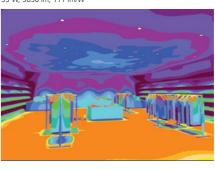


System efficacy Energy consumption **▲ 133 %** ▼ 66 %



DOWNLIGHT 253 70 W, 77 W, 3350 lm, 44 lm/W

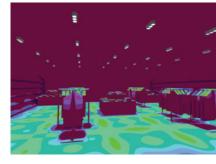
ZIPAR ADJUSTABLE 33 W, 3650 lm, 111 lm/W



System efficacy Energy consumption **▲ 152 %** ▼ **57** %



VARIO MINI 3 3 x 35 W, 105 W, 4800 lm, 46 lm/W



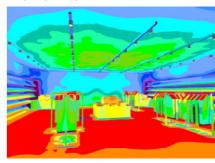
ZIPAR TRIO SURFACED 32 W, 4350 lm, 136 lm/W



System efficacy Energy consumption **▲ 196 %** ▼ 70 %



ZIPAR TRACK 33 W, 15 W, 3650 lm, 111 lm/W



System efficacy Energy consumption



12/13



Zipar

THE RIGHT LIGHT WHERE YOU NEED IT

All ZIPAR variants include adjustability of the light direction. Whether you want to focus light on a product display or mannequin, a painting or sculpture, or a restaurant table or bar display, you are assured that you can adapt your lighting to changing needs with ease. What's more, you can select from standard 24° and 40° reflectors, or an optional 8° reflector to make sure the light beam is exactly suitable.

A LOT OF POWER IN A SMALL SPACE

The smallest ZIPARs have a diameter of only 80 mm. Larger variants maintain the same luminaire head dimensions plus frames. But don't let these sizes fool you, because ZIPAR provides lumen outputs ranging from 1100 lm up to an amazing 9000 lm.

UNIFIED MINIMALIST DESIGN

It may well be the case that the best way to meet specific lighting needs is to combine various ZIPAR variants. This is an excellent option from both a practical point of view and an aesthetic one. All variants maintain a unified design, and are available in white or other colours on request. In this way, every ZIPAR installation can be precisely tailored to need without disturbing the design of the space.

Few luminaires are required to do so much as spotlights. Excellent colour rendition is a must alongside adjustable narrow beam light distribution. ZIPAR provides all this and more without compromise on efficiency.

IPAR 14/15

Design and materials



High-quality illumination exactly how and where you need it.



ZIPAR TRACK

ZIPAR 16/17



Specification matrix Zipar system efficacy up to 138 lm/W

ZIPAR UNO / DUO / TRIO / QAUTRO-S RECESSED













Application Light distribution Reflector







STANDARD





ON REQUEST

CCT

ZIPAR UNO / DUO / TRIO / QUATRO-S SUSPENDED























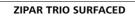




ZIPAR SUSPENDED





























ZIPAR MOVABLE

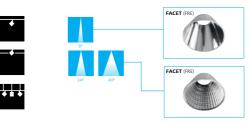


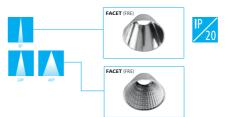
ZIPAR TRACK

























20/21

Zipar variants

ZIPAR UNO / DUO / TRIO / QUATRO-S RECESSED













ZIPAR SURFACED







ZIPAR TRIO SURFACED







ZIPAR SUSPENDED







ZIPAR

ZIPAR UNO / DUO / TRIO / QUATRO-S SUSPENDED













ZIPAR TRACK







ZIPAR MOVABLE







ZIPAR ADJUSTABLE

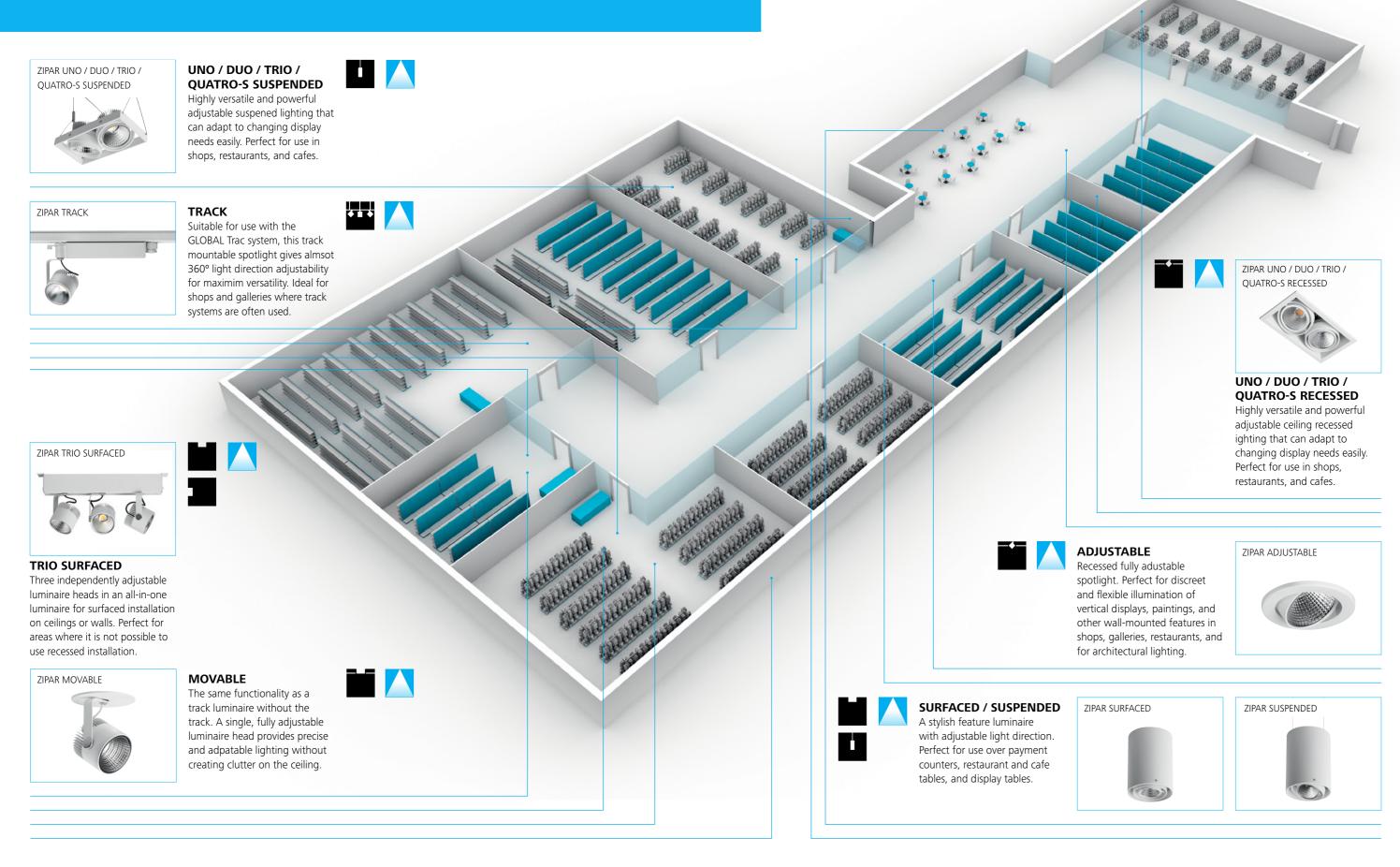






ZIPAR 22/23

Application



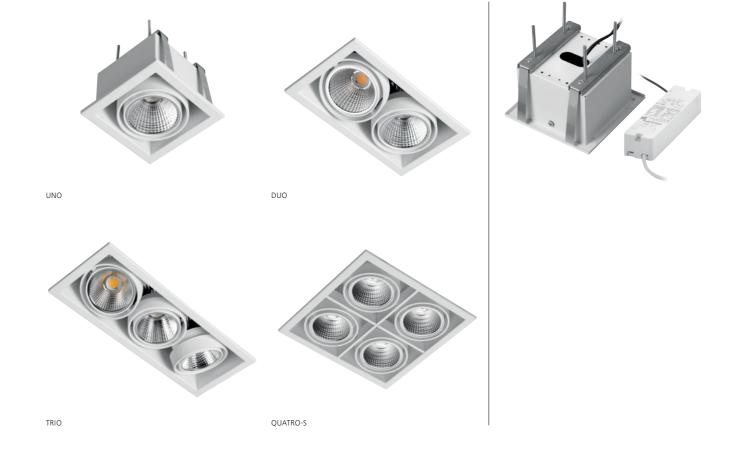
24/25







Zipar Uno / Duo / Trio / Quatro-S Recessed

















Light source **Optical system**

Wiring Materials

Surface finish Service lifetime

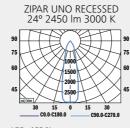
Mounting

LED Facet reflector (FRE)

Electronic control gear FIX/DALI (ECG/EDA) Housing: sheet steel + extruded aluminium Reflector: facet anodised aluminium Housing: white RAL 9003 (W03)

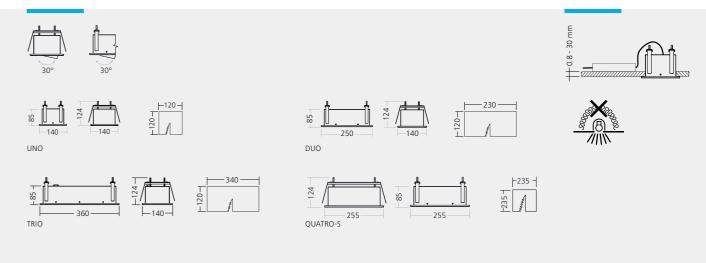
Ceiling recessed (RCB)

50,000 hours/L80 Ambient temperature From -20 °C to +35 °C









| TYPE | NET LUMEN OUTPUT | POWER | SYSTEM | | CORRELATED COLOUR | BEAM | WEIGHT |
|---------------------------|-------------------------|--------------------|--------------------|-------------------|------------------------|-----------|--------|
| | (at Ta = 25 °C) [lm] | CONSUMPTION [W] | EFFICACY [lm/W] | INDEX CRI [Ra] | TEMPERATURE CCT [K] | ANGLE | [kg] |
| ZIPAR UNO RECESSED | 1400 | 12 | 117 | 80+ | 3000 | 24° / 40° | 1.2 |
| ZIPAR UNO RECESSED | 1450 | 12 | 121 | 80+ | 4000 | 24° / 40° | 1.2 |
| ZIPAR DUO RECESSED | 2800 | 21 | 133 | 80+ | 3000 | 24° / 40° | 2.0 |
| ZIPAR DUO RECESSED | 2900 | 21 | 138 | 80+ | 4000 | 24° / 40° | 2.0 |
| ZIPAR TRIO RECESSED | 4200 | 32 | 131 | 80+ | 3000 | 24° / 40° | 2.6 |
| ZIPAR TRIO RECESSED | 4350 | 32 | 136 | 80+ | 4000 | 24° / 40° | 2.6 |
| ZIPAR QUATRO-S RECESSED | 5700 | 45 | 127 | 80+ | 3000 | 24° / 40° | 3.0 |
| ZIPAR QUATRO-S RECESSED | 5900 | 45 | 131 | 80+ | 4000 | 24° / 40° | 3.0 |
| Luminous flux tolerance + | H- 10 %. | | | | | | _ |















28/29



ZIPAR SURFACED

FACET









Zipar Surfaced















Ceiling surfaced (SFD) LED

Wiring

Materials

Surface finish Service lifetime

Optical system

Facet reflector (FRE)

Electronic control gear FIX/DALI (ECG/EDA) Housing: extruded aluminium

Reflector: facet anodised aluminium Top cover: sheet steel

Housing: white RAL 9003 (W03) 50,000 hours/L80 **Ambient temperature** From -20 °C to +35 °C

ZIPAR SURFACED 24° 2450 lm 3000 K LOR =100 % lower flux fraction 100 % upper flux fraction 0 % UGR <19

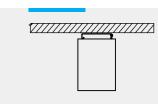
ZIPAR SURFACED 40° 1450 lm 4000 K











| TYPE | NET LUMEN OUTPUT | POWER | SYSTEM | COLOUR RENDERING CORRELATED COLOUR | | BEAM | WEIGHT |
|-----------------------|-------------------------|--------------------|--------------------|------------------------------------|------------------------|-----------|--------|
| | (at Ta = 25 °C) [lm] | CONSUMPTION [W] | EFFICACY [lm/W] | INDEX CRI [Ra] | TEMPERATURE CCT [K] | ANGLE | [kg] |
| ZIPAR SURFACED | 1400 | 12 | 117 | 80+ | 3000 | 24° / 40° | 2.6 |
| ZIPAR SURFACED | 1450 | 12 | 121 | 80+ | 4000 | 24° / 40° | 2.6 |
| ZIPAR SURFACED | 2450 | 21 | 117 | 80+ | 3000 | 24° / 40° | 2.6 |
| ZIPAR SURFACED | 2750 | 23 | 120 | 80+ | 4000 | 24° / 40° | 2.6 |
| ZIPAR SURFACED | 3500 | 33 | 106 | 80+ | 3000 | 24° / 40° | 2.6 |
| ZIPAR SURFACED | 3650 | 33 | 111 | 80+ | 4000 | 24° / 40° | 2.6 |
| Luminous flux toleran | ce +/= 10 % | | | | | | |





















Zipar Suspended

Suspended (SSD)













Mounting Light source

LED Facet reflector (FRE) **Optical system**

Wiring Electronic control gear FIX/DALI (ECG/EDA) Materials Housing: extruded aluminium

> Reflector: facet anodised aluminium Top cover: sheet steel

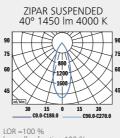
Rope suspension

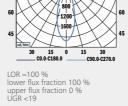
Surface finish Housing: white RAL 9003 (W03)

Service lifetime 50,000 hours/L80 **Ambient temperature** From -20 °C to +35 °C



LOR =100 % lower flux fraction 100 % upper flux fraction 0 % UGR <19

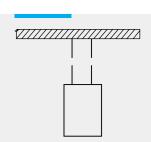












| TYPE | NET LUMEN OUTPUT | POWER | SYSTEM | COLOUR RENDERING CORRELATED COLOUR | | BEAM | WEIGHT |
|-------------------------|------------------|-------------|--------------------|------------------------------------|------------------------|-----------|--------|
| | (at Ta = 25 °C) | CONSUMPTION | EFFICACY [lm/W] | INDEX CRI [Ra] | TEMPERATURE CCT [K] | ANGLE | [[cm] |
| | [lm] | [W] | [IIII/VV] | CNI [Nd] | | | [kg] |
| ZIPAR SUSPENDED | 1400 | 12 | 117 | 80+ | 3000 | 24° / 40° | 2.5 |
| ZIPAR SUSPENDED | 1450 | 12 | 121 | 80+ | 4000 | 24° / 40° | 2.5 |
| ZIPAR SUSPENDED | 2450 | 21 | 117 | 80+ | 3000 | 24° / 40° | 2.5 |
| ZIPAR SUSPENDED | 2750 | 23 | 120 | 80÷ | 4000 | 24° / 40° | 2.5 |
| ZIPAR SUSPENDED | 3500 | 33 | 106 | 80+ | 3000 | 24° / 40° | 2.5 |
| ZIPAR SUSPENDED | 3650 | 33 | 111 | 80+ | 4000 | 24° / 40° | 2.5 |
| Luminous flux tolerance | e +/- 10 %. | | | | | | |























Zipar Trio Surfaced













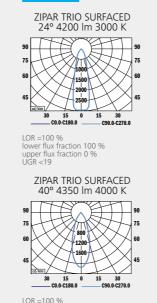


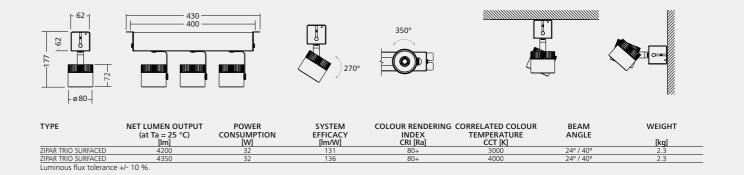
Electronic control gear FIX/DALI (ECG/EDA) Materials Housing: sheet steel + extruded aluminium Reflector: facet anodised aluminium

Tilting mechanism: steel

Surface finish Housing: white RAL 9003 (W03) 50,000 hours/L80

Ambient temperature From -20 °C to +35 °C















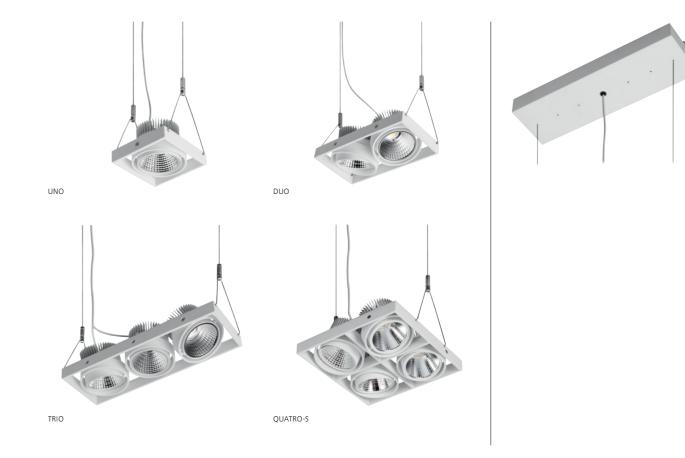








Zipar Uno / Duo / Trio / Quatro-S Suspended





















Materials



Optical system Facet reflector (FRE) Wiring Electronic control gear FIX/DALI (ECG/EDA)

Gearbox: sheet steel

Reflector: facet anodised aluminium Frame: extruded aluminium

Rope suspension

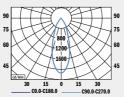
Suspended (SSD)

Surface finish Housing: white RAL 9003 (W03)

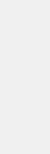
Service lifetime 50,000 hours/L80 Ambient temperature From -20 °C to +35 °C



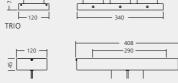
ZIPAR UNO SUSPENDED 40° 1450 lm 4000 K

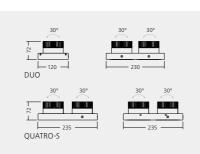




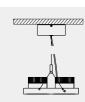












| TYPE | NET LUMEN OUTPUT (at Ta = 25 °C) [lm] | POWER CONSUMPTION [W] | SYSTEM EFFICACY [lm/W] | COLOUR RENDERING INDEX CRI [Ra] | CORRELATED COLOUR TEMPERATURE CCT [K] | BEAM ANGLE | |
|--------------------------|---|-----------------------------|------------------------------|---------------------------------------|---------------------------------------|---------------|--|
| ZIPAR UNO SUSPENDED | 1400 | 12 | 117 | 80+ | 3000 | 24° / 40° | |
| ZIPAR UNO SUSPENDED | 1450 | 12 | 121 | 80+ | 4000 | 24° / 40° | |
| ZIPAR UNO SUSPENDED | 2450 | 21 | 117 | 80+ | 3000 | 24° / 40° | |
| ZIPAR UNO SUSPENDED | 2750 | 23 | 120 | 80+ | 4000 | 24° / 40° | |
| ZIPAR DUO SUSPENDED | 2800 | 21 | 133 | 80+ | 3000 | 24° / 40° | |
| ZIPAR DUO SUSPENDED | 2900 | 21 | 138 | 80+ | 4000 | 24° / 40° | |
| ZIPAR DUO SUSPENDED | 4900 | 39 | 126 | 80+ | 3000 | 24° / 40° | |
| ZIPAR DUO SUSPENDED | 5500 | 43 | 128 | 80+ | 4000 | 24° / 40° | |
| ZIPAR TRIO SUSPENDED | 4200 | 32 | 131 | 80+ | 3000 | 24° / 40° | |
| ZIPAR TRIO SUSPENDED | 4350 | 32 | 136 | 80+ | 4000 | 24° / 40° | |
| ZIPAR TRIO SUSPENDED | 7350 | 57 | 129 | 80+ | 3000 | 24° / 40° | |
| ZIPAR TRIO SUSPENDED | 8250 | 63 | 131 | 80+ | 4000 | 24° / 40° | |
| ZIPAR QUATRO-S SUSPENDED | 5700 | 45 | 127 | 80+ | 3000 | 24° / 40° | |
| ZIPAR QUATRO-S SUSPENDED | 5900 | 45 | 131 | 80+ | 4000 | 24° / 40° | |



























Zipar Track















Suspended or ceiling surfaced lighting track system

- suitable for GLOBAL Trac (TRS) Light source LED

Optical system Facet reflector (FRE)

Wiring Electronic control gear FIX/DALI (ECG/EDA) Materials Housing: sheet steel + die cast aluminium Reflector: facet anodised aluminium

Surface finish Housing: white RAL 9003 (W03) Accessories Various types of connectors and suspension

equipment (GLOBAL Trac)

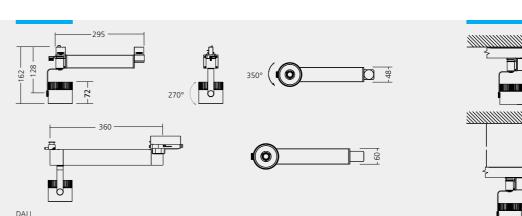
Service lifetime 50,000 hours/L80 **Ambient temperature** 24° / 40° from -20 °C to +35 °C

8° from -20 °C to +30 °C









| TYPE | NET LUMEN OUTPUT (at Ta = 25 °C) [lm] | POWER CONSUMPTION [W] | SYSTEM EFFICACY [lm/W] | COLOUR RENDERING INDEX CRI [Ra] | CORRELATED COLOUR TEMPERATURE CCT [K] | BEAM ANGLE | WEIGHT [kg] |
|-------------------------|---|-----------------------------|------------------------------|---------------------------------------|---|---------------|----------------|
| ZIPAR TRACK | 1100 | 11 | 95 | 80+ | 3000 | 8° | 0.8 |
| ZIPAR TRACK | 1150 | 11 | 100 | 80+ | 4000 | 8° | 0.8 |
| ZIPAR TRACK | 1400 | 12 | 117 | 80+ | 3000 | 24° / 40° | 0.8 |
| ZIPAR TRACK | 1450 | 12 | 121 | 80+ | 4000 | 24° / 40° | 0.8 |
| ZIPAR TRACK | 2450 | 21 | 117 | 80+ | 3000 | 24° / 40° | 0.8 |
| ZIPAR TRACK | 2750 | 23 | 120 | 80+ | 4000 | 24° / 40° | 0.8 |
| ZIPAR TRACK | 3500 | 33 | 106 | 80+ | 3000 | 24° / 40° | 0.8 |
| ZIPAR TRACK | 3650 | 33 | 111 | 80+ | 4000 | 24° / 40° | 0.8 |
| Luminous flux tolerance | e +/- 10 %. | | | | | | |























Zipar Movable

















Materials

Surface finish Service lifetime

Mounting

Ceiling recessed LED Facet reflector (FRE)

Electronic control gear FIX/DALI (ECG/EDA) Housing: sheet steel + extruded aluminium Reflector: facet anodised aluminium

> Housing: white RAL 9003 (W03) 50,000 hours/L80

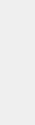
Ambient temperature 24° / 40° from -20 °C to +35 °C 8° from -20 °C to +30 °C

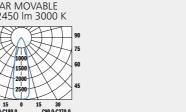
Tilting mechanism: steel

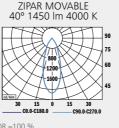
ZIPAR MOVABLE 24° 2450 lm 3000 K



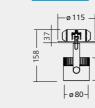








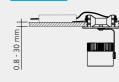














| TYPE | NET LUMEN OUTPUT (at Ta = 25 °C) | POWER CONSUMPTION | SYSTEM EFFICACY | COLOUR RENDERING CORRELATED COLOUR INDEX TEMPERATURE | | BEAM ANGLE | WEIGHT |
|-------------------------|-------------------------------------|----------------------|--------------------|--|---------|---------------|--------|
| | (at 1a = 25 °C) [lm] | [W] | [lm/W] | CRI [Ra] | CCT [K] | ANGLE | [kg] |
| ZIPAR MOVABLE | 1100 | 11 | 95 | 80+ | 3000 | 8° | 0.8 |
| ZIPAR MOVABLE | 1150 | 11 | 100 | 80+ | 4000 | 8° | 0.8 |
| ZIPAR MOVABLE | 1400 | 12 | 117 | 80+ | 3000 | 24° / 40° | 0.8 |
| ZIPAR MOVABLE | 1450 | 12 | 121 | 80+ | 4000 | 24° / 40° | 0.8 |
| ZIPAR MOVABLE | 2450 | 21 | 117 | 80+ | 3000 | 24° / 40° | 0.8 |
| ZIPAR MOVABLE | 2750 | 23 | 120 | 80+ | 4000 | 24° / 40° | 0.8 |
| ZIPAR MOVABLE | 3500 | 33 | 106 | 80+ | 3000 | 24° / 40° | 0.8 |
| ZIPAR MOVABLE | 3650 | 33 | 111 | 80+ | 4000 | 24° / 40° | 0.8 |
| Luminous flux tolerance | e +/- 10 %. | | | | | | |



























Zipar Adjustable



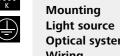














LED Surface finish Service lifetime

Ambient temperature 24° / 40° from -20 °C to +35 °C 8° from -20 °C to +30 °C

Ceiling recessed Facet reflector (FRE) Electronic control gear FIX/DALI (ECG/EDA) Housing: sheet steel + extruded aluminium Reflector: facet anodised aluminium Housing: white RAL 9003 (W03) 50,000 hours/L80

















| TYPE | NET LUMEN OUTPUT (at Ta = 25 °C) | POWER CONSUMPTION | SYSTEM EFFICACY | COLOUR RENDERING CORRELATED COLOUR INDEX TEMPERATURE | | BEAM ANGLE | WEIGHT |
|-------------------------|-------------------------------------|----------------------|--------------------|--|---------|---------------|--------|
| | [lm] | [W] | [lm/W] | CRI [Ra] | CCT [K] | ANGLE | [kg] |
| ZIPAR ADJUSTABLE | 1100 | 11 | 95 | 80+ | 3000 | 8° | 0.8 |
| ZIPAR ADJUSTABLE | 1150 | 11 | 100 | 80+ | 4000 | 8° | 0.8 |
| ZIPAR ADJUSTABLE | 1400 | 12 | 117 | 80÷ | 3000 | 24° / 40° | 0.5 |
| ZIPAR ADJUSTABLE | 1450 | 12 | 121 | 80+ | 4000 | 24° / 40° | 0.5 |
| ZIPAR ADJUSTABLE | 2450 | 21 | 117 | 80÷ | 3000 | 24° / 40° | 0.5 |
| ZIPAR ADJUSTABLE | 2750 | 23 | 120 | 80+ | 4000 | 24° / 40° | 0.5 |
| ZIPAR ADJUSTABLE | 3500 | 33 | 106 | 80+ | 3000 | 24° / 40° | 0.5 |
| ZIPAR ADJUSTABLE | 3650 | 33 | 111 | 80÷ | 4000 | 24° / 40° | 0.5 |
| Luminous flux tolerance | +/- 10 %. | | | | | | |















OMS

Quality lighting developed and produced in Europe.

of industrial and state-of-the-art luminaires and comprehensive interior and exterior lighting solutions. Since our establishment back in 1995, we have risen to become one of the fastest growing lighting companies in Europe, operating in 122 countries around the globe.

Established 1995

Number of employees 950

Export 98.5 %

Production surface area 93,500 m²

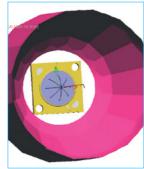
Innovation requires a different approach.

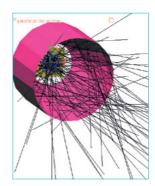
We have one of the best equipped R&D departments in Europe where you will find a team of highly qualified and experienced specialists. This allows us to develop products from concept to manufacture all under one roof.

OPTICAL DESIGN

Optimal luminaire performance is only achieved if effective and appropriate optical parts are selected and refined to meet the specific needs of each product. We have access to the latest development technologies as well as having vast practical experience and theoretical knowledge, all of which are applied to every product that passes through our hands.

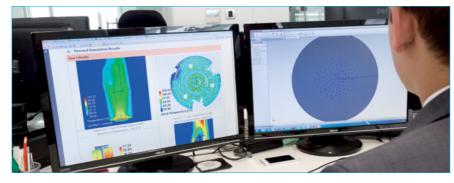






THERMAL DESIGN

The digitisation and miniturisation of technologies places increased emphasis on the use of optimal thermal management. We have extensive test facilities that allow us to characterise every product to ensure reliable performance. We are also active in research and the development of innovative concepts.



ELECTRONIC DESIGN

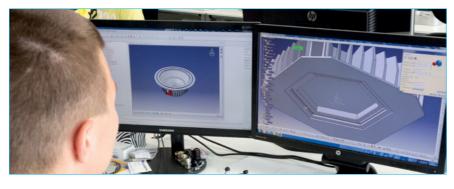
The boundaries of electronic design are consistently being broken by new technologies as well as by the innovative use of existing ones, highligthing the need for flawless development processes. We create advanced system level designs with all stages verified in-house, including DALI compatibility and long-term performance. In addition, we put a great deal of energy into the innovation of new products.





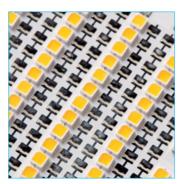
MECHNICAL ENGINEERING

We have more than 20 years of experience in the mechanical design of luminaires, their customisation, and the development of other mechanical appliances and precision tools such as optical measurement and electronic testing devices. Using the latest software, analysis methods and equipment, we can develop mechanical designs for anything from the simplest tools to complete mechanical solutions.



From concept to manufacture, under one roof.

Our superior manufacturing capabilities are the backbone of the company. For this reason, we view continual technological development as paramount and invest our energy in what matters most.





LED PRODUCT DEVELOPMENT

LED light sources offer a great many advantages over conventional ones because they are fundamentally different technologies. This means that the development of LED products requires a fundamentally different approach to their industrial, optical, electronic, thermal, and mechanical design.





LED PRODUCT MANUFACTURE

Our LED modules are designed by our own electrical engineers in close collaboration with the optical and thermal teams. This, in combination with fully automated PCB production, means our products meet the most rigorous design standards. All of our LED luminaires are assembled in a specialised ESP facility and thoroughly tested using precision equipment in line with stringent ISO 9001 technical standards.



METAL & PLASTICS PRODUCTION

We have been manufacturing luminaires for more than 20 years. That history stands as a firm foundaton for our current high-tech production facilities and processes. We use a wide range of machines that together offer us unbeatable production scalability and versatility.





SPECIAL REQUEST FACTORY

Our special request factory provides us with unrivalled flexibility. The machines allow us to make very small and precise parts with ease and at speed so that we can respond quickly to customer demand, produce rapid prototypes and customised solutions, and shorten the development time of new products.

ZIPAR 56/57