



#### ON THE COVER:

New Young Victoria & Albert Museum in London, UK. Lighting design by Speirs Major. Photo credit: Hufton & Crow.

#### VOL 3 / 2024 (JULY-SEPT) TOPICS

- Features: Lighting Places of Worship
- Trends: Smart Urban Lighting
- Spotlight: Exclusive Lighting Designer Interview
- Lighting Product
   Showcase: Smart Lighting,
   Outdoor Lighting, Indoor
   Lighting, LED Lighting,
   Lamps / LED, Ballast /
   Transformers, Lighting
   Controls, Emergency / Exit

#### ASSOCIATE PUBLISHER Eric Ooi

eric.ooi@tradelinkmedia.com.sg

#### EDITOR Amita Natverlal

lighting@tradelinkmedia.com.sg

### MARKETING MANAGER Felix Ooi

felix.ooi@tradelinkmedia.com.sg

#### HEAD OF GRAPHIC DEPARTMENT/ ADVERTISEMENT COORDINATOR Fawzeeah Yamin

fawzeeah@tradelinkmedia.com.sg

## CIRCULATIONS EXECUTIVE Yvonne Ooi

yvonne.ooi@tradelinkmedia.com.sg

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## Dear Readers,

Hello and welcome to another issue of Lighting Today. This issue showcases lighting solutions for museums. The lighting in museums needs to accentuate the colour, material and design of the exhibits or artefacts, for visitors to enjoy their visit. So it is important for a museum project to use the correct type of lighting. Read more about the projects inside. Light pollution is a major issue in many countries but there are ways to tackle it. In Trends, we interview France-based LUCI (Lighting Urban Community International) on its various activities related to light pollution and on how the network is acting to tackle it. Lastly, we have put together a show review of Light + Building 2024 which took place in Frankfurt am Main from 3 to 8 March 2024. Over 151,000 visitors travelled to the world's leading trade fair for lighting and building-services technology. Happy Reading!

Editor Amita Natverlal

**Industry Partners of Lighting Today** 



National Lighting Bureau

events calendar 3

30 April - 5 May 2024

Architect Expo 2024

**IMPACT** 

Bangkok, Thailand

Website: www.architectexpo.com/2024/en/

9-11 May 2024

LED Expo Mumbai 2024

Jio World Convention Centre

Mumbai, India

 $Website: \verb|https://led-expo-mumbai.in.messefrankfurt.com/mumbai/en.htm||$ 

9-12 June 2024

Guangzhou International Lighting Exhibition (see show ad on page 54)

China Import and Export Fair Complex

Guangzhou, China

 $\textbf{Website:} \ \, \textbf{https://guangzhou-international-lighting-exhibition.hk.messefrankfurt.com/}$ 

guangzhou/en.html

26-28 June 2024

International Light Convergence EXPO 2024

KINTEX Exhibition Centre

Seoul, Korea

Website: https://www.light-convergence.com/enter.asp

3-6 July 2024

ARCHIDEX 2024 (see show ad on page 53)

KL Convention Centre Kuala Lumpur, Malaysia

Website: https://archidex.com.my/

7-13 July 2024

LED-LIGHT Malaysia 2024

MITEC

Kuala Lumpur, Malaysia

Website: http://www.malaysialed.com/

17-20 July 2024

Mega Lighting 2024 (see show ad on page 5)

BITEC

Bangkok, Thailand

Website: www.megabangkokel.com/en/

**4-6 September 2024** 

BEX Asia 2024

Marina Bay Sands

Singapore

Website: https://www.bex-asia.com/

**5-7 September 2024** 

LED Expo Thailand 2024 (see ad on page 56)

IMPACT Exhibition Centre

Bangkok, Thailand

Website: https://www.ledexpothailand.com/

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## **BUYERS PLEASE COME & VISIT**



17-20 JULY 2024
BITEC, BANGKOK, THAILAND





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Organiser:

Show Manager:

Co-organiser:















# Inaugural Smart Lighting Expo, Spring Lighting Fair receive enthusiastic response

Hong Kong – Organised by the Hong Kong Trade Development Council (HKTDC), the inauguralSmart Lighting Expo and 15th Hong Kong International Lighting Fair (Spring Edition) (Spring Lighting Fair) concluded successfully on 9 April 2024. The twin lighting fairs welcomed some 16,000 buyers from 107 countries and regions, making a strong start to the HKTDC technology fairs in April.

Sophia Chong, Deputy Executive Director of the HKTDC, said: "As one of the partner events of the Business of Innovation & Technology Week (BITWeek), the inaugural Smart Lighting Expo and the 15th Hong Kong International Lighting Fair (Spring Edition) attracted not only buyers in Hong Kong but those from Mainland China, Australia, India, Japan, Korea, the Philippines, Russia and the United States, a testimony to the fairs' internationality. The two lighting fairs brought enormous business opportunities to those in the industry and served as an ideal platform for exchanging ideas on the latest market development and trends.

"An exciting line-up of mega events will captivate visitors one after another, with the HKTDC launching the four-dayInnoEXandHong Kong Electronics Fair (Spring Edition) this Saturday (13 April) following the successful



Organised by the Hong Kong Trade Development Council (HKTDC), the inaugural Smart Lighting Expo and the 15th Hong Kong International Lighting Fair (Spring Edition) concluded successfully on 9 April 2024, attracting some 16,000 buyers from 107 countries and reagions. Photo credit: HKTDC

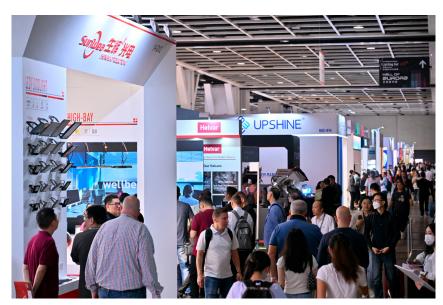
conclusion of the lighting fairs. We will also organise a series of lifestyle fairs later this month, including Fashion InStyle, Home InStyle, Hong Kong Gifts & Premium Fair, Hong Kong International Printing & Packaging Fair, the brand-new Deluxe Printpack Hong Kong and Hong Kong International Licensing Show, poised to foster economic development in Hong Kong across different industries."

## Smart lighting products unlock unlimited potential

An on-site survey of 507 exhibitors and buyers found 63 percent anticipated higher sales in the next 12 to 24 months while 35 percent expected stable sales, a testimony to optimism in the lighting market. Other key findings are as follows:

Market outlook and product trends:

- Respondents considered the North America (62 percent), Mainland China (59.7 percent), ASEAN countries (59.6 percent) and Northern & Western Europe (55 percent) to be promising lighting markets over the next two years in terms of growth.
- For the industry overall, household lighting systems that are compatible with or can be controlled by smart phone/tablet applications (40 percent), smart lighting systems primarily geared for energy-saving for household/industrial/commercial purposes (38 percent) and household lighting systems that are connected to or compatible with the Internet (27 percent) were considered to have the greatest market potential.
- Respondents named home automation and smart lighting control systems (46 percent),



The Smart Lighting Expo featured pavilions of Foshan city, Zhongshan city and Jiangmen city's Jianghai district, strongholds of the lighting industry in the Guangdong-Hong Kong-Macao Greater Bay Area, while the Spring Lighting Fair featured pavilions from Jiangsu province and Xiamen city. Photo credit: HKTDC



The Hall of Aurora at the Spring Lighting Fair featured premium lighting products from more than 260 renowned brands. *Photo credit:* HKTDC



The lighting fairs featured the Asian Lighting Forum and Smart Lighting Solution Forum where experts shared insights on trends and developments in the lighting industry, such as AI, IoT, smart home and human-centric lighting for healthcare market, serving as valuable platforms for knowledge exchange and networking among industry professionals. Photo credit: HKTDC

energy-efficient lighting control solutions (37 percent) and outdoor smart security lighting systems (22 percent) as having the biggest potential for smart lighting.

 Respondents revealed that consumers would be willing to pay an average premium of 24 percent for smart-lighting products.

## Participants applaud robust trading opportunities

Organised under the theme Bright Lighting • Smart Living, the lighting fairs attracted over 1,300 exhibitors and featured a diverse array of innovative lighting products and technologies ranging from sustainable and human-centric lighting to fashionable lighting products.

Among zones, the Smart Ecosystem and IoT Supply Chain Area in the Smart Lighting Expo and the Hall of Aurora in the Spring Lighting Fair captured the attention of many buyers.

Trading at the twin shows was promising. Mars Lee, CEO of Zhongshan OBALS Lighting Electric Co., Ltd., said: "The debut Smart Lighting Expo is a good platform to promote our customised smart lighting products and apps targeting high spending markets in Australia and Europe. We are so happy that on the first day of the fair, multiple buyers from Australia and Europe have placed orders for our smart lighting control systems, track lights, downlights and linear lights worth

RMB3.8 million [US\$525,000] in total. We are very satisfied with the results and have already signed up for next year's Smart Lighting Expo."

Orachat Leingpeboon, Vice President Smart City Promotion, Digital Economy Promotion Agency (DEPA) from Thailand, visited the Smart Lighting Expo and said: "I am here to see the latest smart lighting solutions, energy-saving and eco-friendly products for smart city development projects in Thailand. I'll provide my suggestions to related government departments and bridge the supply and demand sides. At the Expo, I have seen new and interesting technologies such as solar wrap poles, smart home solutions and horticultural lighting. I'll share these new technology updates with related government departments and the public in a webinar in Thailand. I'll recommend the twin fairs to the Department of Alternative Energy Development & Efficiency and the Illuminating Engineering Association of Thailand too."

At the Spring Lighting Fair, a loyal exhibitor from Hong Kong, Walter Zeng, Product Manager of KTE Electrical Ltd., said: "On the first fair day, we have talked to more than 200 overseas buyers mainly from Europe. The HKTDC's Click2Match platform also provides extra opportunities for us to find new buyers and we have already set up at least three online meetings. We estimate that our sales turnover generated by this fairwill surge by 50-80 percent."

Firat Kendal Aksoy, General Manager of Kendal Elektrik from Turkiye, said: "We visit the Spring Lighting Fair regularly to source new products and close deals with existing suppliers. This year, I have found three potential suppliers of magnetic track lights, solar lights, desk lamps, new designs for cabinet lights and spotlights. I have already finalised my orders with two suppliers for a total of US\$1.5 million worth of LED bulbs, floodlights and ceiling lights. I am going to close another eight to nine deals during the fair period. The Scan2Match function allows me to bookmark favourite suppliers in the HKTDC Marketplace App and know more about their new products."

Under the hybridEXHIBITION+ model, the twin lighting fairs combinedin-person sourcing with online meetings via the HKTDC'sClick2Matchsmart business-matching platform and hktdc.com sourcing platform. Click2Match will be available until 16 April to facilitate discussions between exhibitors and buyers around the world.



The HKTDC's Scan2Match service enabled buyers to use the HKTDC Marketplace App's Scan2Match function to bookmark their favourite exhibitors, browse product information and e-floor plans, enquire about products, facilitating online business discussions with exhibitors during or after the show period. Photo credit: HKTDC

#### LiGHT 23 back with a bang for second year



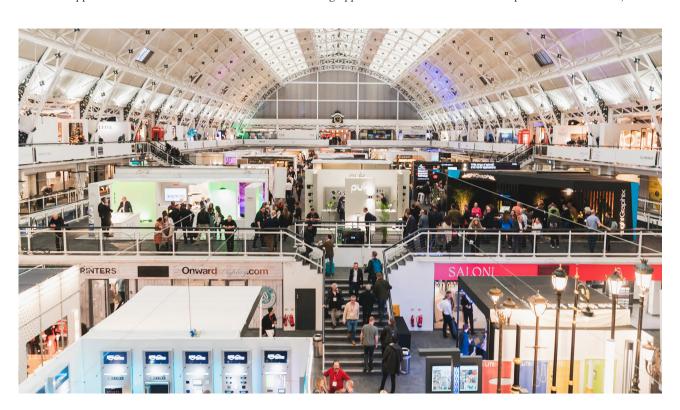
WK – Held over two days at the Business Design Centre, the UK's only trade show dedicated to lighting specification saw a 43 percent increase in attendees from its launch event last year – closing its doors to a buzz of positivity.

The design community came out in force to support the show – with 4776

attendees passing through the doors to see the latest offerings from more than 150 high-end international lighting brands and engage with no less than 22 talks and presentations from design experts working with light, all while making new industry connections through various networking opportunities.

Attended by a broad mix of designers working in architecture, interiors, lighting, and product design, as well as engineers, end-users, and specifiers, LiGHT 23 saw several new features introduced this year.

A particular highlight included the new darc space decorative area, which



saw high-end lighting brands for the interiors market exhibit for the first time – names such as Empty State, Marset, Nexia, Artemide, Ebb & Flow, Lodes, and Quasar to name but a few, presented their latest decorative and bespoke lighting collections to designers keen to find inspiration for their next projects.

The new Associations Lounge, furnished by leading Danish brand Muuto was a real focus of LiGHT 23, providing a comfortable space for designers to meet with colleagues and take the weight off! The International Association of Lighting Design (IALD) and the British Institute of Interior Design (BIID) invited existing members, along with potential new ones, to enjoy the space and make the most of the complimentary refreshments.

The[d]arc thoughts talks programme, in collaboration with lighting control specialist Lutron, again attracted a steady stream of guests across the two days, keen to learn more about the hot topics in lighting.

With every talk well attended, the programme included a variety of presentations and panel discussions covering everything from sustainability and circular design; to designing for global brands, healthy office spaces, and restaurant / bar design. As well as a project presentation from interior design studio Space Invader and a special look at the bespoke lighting piece from Quasar, featured in the Netflix hit Glass Onion, the programme was topped by a keynote presentation from Peruvian New York-based light artist Grimanesa Amoros.



LiGHT 23 also provided a platform for the latest instalment of the ILP's How to be Brilliant talks, with Light Bureau's Paul Traynor taking to the stage, while the very first Lighting Police walking workshop also took place.

LiGHT WORK made a welcome return, with show visitors making good use of the dedicated workspace area. Illuminated by table lamps from British lighting brand Tala, LiGHT WORKwas a beautiful relaxing space allowing show attendees to complete office tasks, while offering dedicated wi-fi, free coffee, and charging points.

Delighted with the success of LiGHT 23, [d]arc media Managing Director, Paul James said: "We are thrilled with the overwhelming response to the show. The massive increase in

exhibitor and visitor numbers confirms that London, and the UK, has been craving a trade show that serves the lighting specification market. We have seen a 40% increase in attendees this year and it's only year two!

"With an almost 100 percent rebook rate from exhibitors during the show itself, this is just the beginning for LiGHT Expo in London and we're excited to see what the 2024 edition will bring, as we expand further into the Business Design Centre. We have had nothing but positive feedback from exhibiting brands and visitors alike."

Free to attend, dates for next year's show are now confirmed as 20 & 21 November 2024.

For further announcements head to:www.lightexpo.london

#### AnyCasting joins the Zhaga Consortium

Piscataway, NJ, USA – The company AnyCasting from Korea has become a Regular Member of the Zhaga Consortium. AnyCasting develops and manufactures high quality LED lighting lenses using AnyCasting's independently developed optical design and ultraprecision plastic injection technology.





As a Regular Member of the Zhaga Consortium, AnyCasting and its lighting department AnyOptics will actively participate in shaping industry standards. This move not only reflects AnyOptics' commitment to excellence but also positions the company as a leader in promoting sustainability and energy efficiency in the lighting sector.

"The Zhaga Consortium is very pleased to be joined by AnyCasting," states Heinrich Thye, Secretary General of the Zhaga Consortium and continues "we

are a global lighting-industry organization that aims to standardize interfaces of components of LED luminaires. The source of inspiration for market needs is our global membership. The Zhaga specifications enable multi-vendor ecosystems of interoperable products. We are convinced that through its membership, AnyCasting will further strengthen the Zhaga component ecosystem and contribute significantly to the success of the Zhaga mission and vision."

# Obsidian Control Systems adds Technical Support and Training Specialist to growing global team

Rerkrade-Holz, Limburg, Netherlands – Obsidian Control Systems is delighted to announce the addition of Daniel Boerner to its expanding global team as a newly appointed Technical Support and Training Specialist. Daniel started in the new position in November and uses his expertise in lighting control to support Obsidian's acclaimed NETRON line of data distribution products. Over time, his role will extend to encompass support for all products under the Obsidian brand.

Daniel brings valuable experience from his previous position at Acuity Brands, where he served as a Technical Support Specialist for six distinct product lines. Additionally, he served as coach, author, and publisher for a Knowledge Centered Service (KCS) program, contributing content for customer-facing troubleshooting and training.

Having been involved in production from an early age, Daniel has extensive experience in the industry from the artist, integrator and designer perspectives. He has toured as a guitarist, worked for an integration/live events company, and has served as a touring lighting designer/director, among other positions. "Live events are something I am deeply passionate about," he stated. "Having the opportunity to work both as an integrator and lighting director nationwide helped me develop into a multi-faceted technician that understands the challenges faced in the field."

In his new role at Obsidian, Daniel's primary responsibilities encompass firmware/software testing, customer support, and the creation of technical documentation and training materials for the NETRON



**Daniel Boerner** 

line. Applying his extensive industry experience, he will also contribute to future product development.

Matthias Hinrichs, Product Manager at Obsidian Control Systems, expressed his enthusiasm, commenting, "Daniel is a great addition to our Obsidian team who is already positively impacting the support we provide to our customers worldwide.

He comes with a lot of valuable, real-world experience in entertainment data applications that allows him to provide expert-level support to ensure clients' success. We are excited about the input and influence he can have across Obsidian's entire product line. The brand has seen amazing industry acceptance, and Daniel's position is an important step in our commitment to excellent customer support."

Obsidian Control Systems continues its remarkable growth in both lighting console and data distribution solutions. The company is expanding its award-winning NETRON line of signal distribution with a comprehensive line tailored for system integrators and fixed installations, along with the introduction of the world's first IP66-rated devices for entertainment data distribution.

"I am extremely grateful for the opportunity to work with such an incredible team here at Elation, a company that has noticed and values the expertise I can bring to the table," Daniel said. "I am very excited to be challenged in my craft while also providing excellent, detailed support of the Obsidian line."

# Lighting Reality makes groundbreaking move with new product launch

#### LR Selector promises to give competitive advantage to thousands of OEMs.

ighting Reality unveiled new that provides unparalleled optimised product selection capability to specifiers of small, simple projects. only enables not projects to be calculated on the go, but compares a range of different

options providing specifiers with the confidence to select the optimal solutions for projects.

LR Selector is a tool that helps electrical contractors find the products they need from within a manufacturer's own product portfolio, quickly and easily anywhere in the world.

**88**LR Selector

LR Selector is a whitelabelled application that can be plugged into manufacturer websites to match their brand and style, enabling contractors to input their project specifications, which will then generate a detailed list of required products to compare and consider for the scheme.

With 23 years' experience in the lighting industry, Lighting Reality has been the trusted partner to thousands of clients, providing intelligent, reliable software solutions that have helped to revolutionise the industry. The launch of LR Selector is the firm's latest move in creating intelligent intuitive software that will support OEMs and create faster, more reliable interfaces with contractor customers.

The product is a departure from more traditional manufacturer search tools, which tend to allow contractors to compare their needs against individual products rather than a selection of products. LR Selector allows for the contractor's needs to dictate the products and fittings required – optimising each element for maximum impact. The application also allows for a detailed product comparison, providing the ultimate knowledge bank for customers to choose the very best option for lighting schemes.

The application is also smart phone enabled, which allows for easy access on the goand has a downloadable report which reproduces the detailed findings of the optimised search, that can be shared with colleagues and customers as required.

Richard Hall from Lighting Reality, said: "We know that we have created a true force to be reckoned with here - giving manufacturers the competitive advantage that comes with offering their customers (quick, easy, intuitive) seamless and comprehensive tool that allows them to dictate exactly they need for their schemes. LR the Selector optimises choices available from the manufacturer's portfolio and provides additional smart functionality that will truly add value. What's more, the seamlessness of the process will help to build brand loyalty as contractors experience thevery bestservice from manufacturers.

"The app is easy to plug into existing websites, alleviating the need for expensive web development time. The whole process is so simple, user-friendly and adds real value to customers who would traditionally need to spend valuable time researching and calculating individual scheme elements before placing their orders with OEMs."

#### **Customer Interfaces**

LR Selector's white label application allows customers to fully integrate the functionality into their own website, which can be reskinned to match brand colourways. The ready-made front end allows customers to access Lighting Reality's patented algorithm



Richard Hall from Lighting Reality.

and software, with all calculations completed via the company's cloud-based programme.

Lighting Reality also offers a bespoke software service that enables manufacturers to tailor the functionality to their own specific needs.

Richard said: "The ease of use and speed of set-up means that our customers can offer LR Selector technology within a couple of weeks of commissioning. The depth of knowledge that contractors can enjoy from LR Selector is transforming the whole specification process for lighting projects. It's an exciting movement for the industry and we are looking forward to rolling the product outfurther in the coming weeks and months."

#### Pharos joins Q-SYS Technology Partner Program

ondon, UK – Specialist lighting controls manufacturer, Pharos Architectural Controls, announced it has joined the Q-SYS Technology Partner Program. This program enables software and hardware technology partners to create market-ready solutions that integrate seamlessly with Q-SYS, a cloud-manageable audio, video and control Platform.

As part of the programme, key products from the Pharos range have been verified and endorsed by Q-SYS, following plugin integration with a Q-SYS Ready badge.

Pharos Designer and Pharos Expert will integrate with Q-SYS to provide integration with its 'architainment' and show control system for advanced installation through Q-SYS and Expert's DMX control.

Pharos Designer is the company's original, award-winning range, which now boasts a wide range of controllers to suit any DMX, eDMX and DALI lighting project, as well as comprehensive show control capabilities and free software that enables users to design and build installations as they wish. Pharos Expert enables the ultimate in dynamic architectural lighting with its practical, straightforward control solution, centred around a single, reliable controller.

Bas Hoksbergen, Commercial Director at Pharos, said: "Our inclusion in the Q-SYS Ecosystem is the next stage in the development of our products to ensure customers have the best possible experience in their integration capabilities. We are excited to announce this partnership and look forward to seeing our customers make amazing projects."

"We are proud to have Pharos join our program and work collaboratively with us on a plugin integration that will enable elevated experiences across our shared customers," says Geno Zaharie, Principal, Alliances & Ecosystem, Q-SYS.

# Studio Lumen embarks on a luminous journey in India: Unveiling a new office to fuse innovation with heritage

India – Studio Lumen, a revolutionary force in the realm of lighting design, proudly announces the inauguration of its newest office in India. The new office is a strategic expansion that represents Studio Lumen's unwavering commitment to meeting the escalating demand for cutting-edge lighting solutions in the region, underscoring the company's pledge to deliver unrivalled lighting design creativity and expertise.

The opening of Studio Lumen's Indian office is not just a geographic expansion but a celebration of the rich heritage woven into the fabric of the team. Leveraging the diverse talents of some of its original team members, the company seeks to infuse projects with cultural nuances, creating a unique amalgamation of art and functionality.

Two key team members, seasoned from their experiences in Dubai, have chosen to return to their roots in India, bringing with them a wealth of international design expertise. Their relocation signifies a homecoming that will undoubtedly enhance the global perspective Studio Lumen brings to each project.

Siddharth Mathur, Founder and Director stated, "We are thrilled to further illuminate the design landscape in India and integrate our global



experiences with the rich tapestry of Indian culture. The new office is not just a physical space; it is a canvas where heritage meets innovation."

The Indian office is an expansion in response to project demand in and around the area and allows the company to base the team now much closer to clients in the region. With 6-7 newly recruited team members this dynamic blend of seasoned professionals and fresh talent ensures a collaborative and inclusive environment, fostering an exchange of ideas that transcends borders.

The opening of the Indian office is part of a broader overall vision for

Studio Lumen, akin to a constellation of stars lighting up the design world. With recent expansions in Dubai and the establishment of the new office in India, Studio Lumen is poised to illuminate projects on a global scale.

As Studio Lumen embarks on this journey in India, they are not merely expanding their footprint; they are creating a nexus of design brilliance that draws inspiration from Indian heritage, inviting clients and partners to join them on this luminous journey, where they promise to continue pushing boundaries and creating extraordinary lighting experiences.

# SIXTY82 launches AMEG Group as its exclusive distributor for Kazakhstan

Drachten, Netherlands – SIXTY82, a leading innovator in the design and manufacture of trussing and staging systems, is excited to announce the strategic partnership with AMEG Group, marking them as the exclusive distributor for Kazakhstan. This collaboration signifies SIXTY82's ongoing commitment to expand its global distribution network and deliver superior solutions to the Kazakh market.

AMEG Group, renowned as the premier AV company in Kazakhstan, exemplifies the pinnacle of service excellence and industry expertise. This alliance is poised to set new standards in the entertainment sector, marrying AMEG's local knowledge with SIXTY82's cutting-edge products.

"We are delighted to partner with AMEG Group, spearheaded by the seasoned Evgeniy," expressed Fokko Smeding, CEO of SIXTY82. "Their profound market understanding and commitment to quality make them the ideal representative for our brand in Kazakhstan. We look

forward to a fruitful collaboration and the mutual growth that lies ahead."

Evgeniy Davydov, Sales Director at AMEG Group, shared, "Being chosen as the exclusive distributor for SIXTY82 is a great honour and responsibility. Their innovation and quality are unmatched, and we are eager to integrate their solutions into our market. This partnership is a significant milestone for us and the local entertainment industry."

In a move to solidify this new alliance, SIXTY82 has appointed Henry Schuil as the dedicated account manager for Kazakhstan, underscoring the company's dedication to the region. Demonstrating an immediate commitment, Marc Hendriks, SIXTY82's Technical Director, and Henry Schuil recently led two successful seminars in Astana and Almaty, in cooperation with AMEG Group. The events saw a turnout exceeding expectations, facilitating invaluable discussions with end-users about their unique needs.

#### With extensive business opportunities, 10th edition of LED Expo Thailand is set to illuminate the ASEAN region

Bangkok, Thailand – LED Expo Thailand, ASEAN's premier exhibition for the lighting industry, organised by MEX Exhibitions Pvt. Ltd. and IMPACT Exhibition Management Co. Ltd., is scheduled to take place 5-7 September 2024 at IMPACT Exhibition Centre, Bangkok, Thailand, showcasing the latest advancements and trends in the ever-evolving field of LED and Smart lighting technology.

Organised under the theme 'Connected lighting for sustainable living', the 10th edition of LED Expo Thailand focuses on providing innovative lighting solutions for Sustainable lighting, Energy Efficient Lighting, Healthcare & Social Care Lighting, Horticulture Lighting, Human Centric Lighting, and Smart Lighting. Targeting local as well international professionals the industry, the trade fair aims to revolutionise and make a difference in the future of LED & Smart Lighting industry.

LED Expo Thailand brings together 'Energy Efficiency and Digitalisation for SMART Lighting' under one roof to benefit all stakeholders in the heart of the ASEAN region. The 2024 expo serves as a hub for Thailand's 400+ leading brands to gather at one platform for extensive networking and lead generation. Smart Living Expo, colocated with LED Expo Thailand is a cutting-edge showcase of innovative technologies and solutions that are revolutionising modern living spaces.

Elevating the trade fair experience, the Thailand "Lighting Digital Transformation" Workshops, Smart ASEAN Forum Knowledge Sessions, Thailand Smart Lighting Industry Seminars, Lighting Innovation Showcase, and Business Matching Program in addition to other highlights emerge as key takeaways from the event.

Ms. Himani Gulati, Director, MEX Exhibitions Pvt. Ltd. says, "We believe that LED Expo Thailand is not just a trade fair but a hub for knowledge exchange and business growth. The carefully curated expo, including the conference sessions, product launches, and networking opportunities, is geared towards empowering professionals and businesses in the lighting industry to







thrive in a dynamic and competitive market. Also I am excited about the Introduction of Smart Living Expo along with the show."

Mr. Loy Joon How, General Manager, IMPACT Exhibition Management Co. Ltd. said, "We are thrilled to mark the 10th edition of LED Expo Thailand, a testament to a decade of driving innovation and progress in the lighting industry. The upcoming event promises to be a dynamic platform, offering participants a unique blend of cutting-edge technology, insightful discussions, and unparalleled business opportunities."

#### Why Thailand?

Thailand has emerged as a key player in the global LED lighting market. The country's robust economic growth, projected GDP expansion, and increasing middle-income population contribute to a thriving market for LED lighting products. Furthermore, Thailand's supportive governmental policies, with agencies like the

Electricity Generating Authority of Thailand (EGAT) and the Provincial Electricity Authority (PEA) actively promoting LED lighting adoption, create a conducive environment for industry players.

Thailand's strategic geographical location within Southeast Asia, serves as a regional hub for trade and commerce, attracting manufacturers, suppliers, and professionals from around the world to participate in LED Expo Thailand – the largest LED lighting exhibition in Southeast Asia. This prominent event serves as a key industry face-to-face platform for networking, business collaborations, and showcasing the latest innovations in LED & Smart lighting technology.

Thailand's dynamic LED lighting market, strong government support, economic growth prospects, and its strategic position as a regional business hub make it an ideal choice for industry professionals and stakeholders seeking to tap into the growing opportunities in the LED lighting sector.





# New Young Victoria & Albert Museum

London, UK

#### **PROJECT NAME**

New Young Victoria & Albert Museum

#### **PROJECT LOCATION**

London, UK

#### **CLIENT**

Victoria & Albert Museum

#### **ARCHITECT**

deMatos Ryan

#### **LIGHTING DESIGN**

Speirs Major – Clementine Fletcher-Smith, Benz Roos, Neville de Sa

#### **DISPLAY LIGHTING COMMISSIONING**

Studio ZNA

Left: In the central "Town Square" re-opened skylights allow filtered natural light into the space, while colour-change uplighting creates flexibility for events.

Photo: © Hufton & Crow



 $\textbf{Carefully designed lighting helps to direct movement through the redesigned spaces of the museum. \textit{Photo:} © \textit{Luke Hayes, courtesy of the V \& A}$ 



Soft warm uplighting to the barrel-vaulted roof celebrates the architecture and softens contrast, while spotlighting provides functional light and highlights key architectural features. Photos: © Hufton & Crow





Uplighting delivers a warm evening ambience or can be adjusted to colours to support events in the central square. Photos: © Hufton & Crow

Speirs Major Light Architecture's (SMLA's) lighting design for the new Young Victoria and Albert Museum sees natural light restored to the historic central 'Town Square' alongside sensitively designed architectural lighting and exhibition lighting infrastructure.

Facilitating easy navigation and promoting joyful exploration, the new lighting also offers the flexibility to adjust the ambience of this key space in support of the museum's events programme.

Housed within a Grade II\* listed building in East London, the recent re-imagining of the much-loved Museum of Childhood is the result of a robust co-design approach that sought input from local children and other user groups.

Focused on accessibility and engagement, SMLA's lighting design supports the aims of drawing visitors to

exhibition spaces "up and down" via a new spiralling staircase; and "around and about" the learning spaces, while preserving and enhancing the historic fabric of the building.

In the historic 'Town Square," the skylights have been re-opened within the barrel-vaulted roof and the central hall has been decluttered, revealing its magnificent original volume.

SMLA conducted numerous daylight studies to understand the implications of unblocking the skylights, both in terms of visitor experience and on the exhibits themselves, which subsequently informed the degree of transparency and filters applied to the glazing.

New artificial uplighting reveals the roof structure and highlights key architectural features such as the feature spiral stair, while providing functional lighting to the Town



In the side exhibition spaces, a flexible balance of architectural artificial lighting and exhibition lighting can be adapted to suit the degree of sensitivity of the exhibits. Photo: © Hufton & Crow



Above & below: Existing lighting equipment was audited and re-used where possible. Photos: @ Luke Hayes, courtesy of the V & A.









Fun details keep the ambience fresh and invigorating in the lower ground floor spaces. Photos: © Hufton & Crow

Square when natural light fades.

As the building is a listed heritage asset, great care was taken to ensure the lighting did not impact the original material structure. An unobtrusive custom ledge detail was designed to accommodate the lighting equipment, which includes twin rows of individually controlled linear lengths of colour change (RGBW) LEDs for uplighting, and clamps for functional spotlighting to the adjacent spaces.

To either side of the Town Square, the skylights above the exhibition spaces in each wing have remained blackedout to daylight, however the barrel-vaults in these areas are celebrated with simple, warm white uplighting that can be switched off for sensitive exhibitions. One key aspect of the project was to re-use and repurposed as much existing equipment as possible. To this end, SMLA made an audit of all the existing spotlights, retaining the best quality fittings for re-use in the new Temporary Gallery.

On the lower ground floor, a new lunchroom for school groups and a series of classrooms and design studios have been created from former storage and office space. With limited natural light in these rooms, the lighting design supports a vibrant ambience with neat details such as glowing ring-shaped pendants, integrated cabinet lights and uplights within the small arched windows that peek through to the ground level above. Each room is provided with a simple controls interface for ease of use and flexibility.





# Ad Gefrin Distillery

Northumberland, UK

#### **PROJECT NAME**

Ad Gefrin Distillery

#### **PROJECT LOCATION**

Northumberland, UK

#### CLIENT

Ad Gefrin (Alan, Eileen and Chris Ferguson)

#### LIGHTING DESIGN

Michael Grubb Studio

#### **ARCHITECT**

Richard Elphick, supported by Todd Milburn, Red Fox, and JCP

#### CONSTRUCTION

Brims Construction Ltd

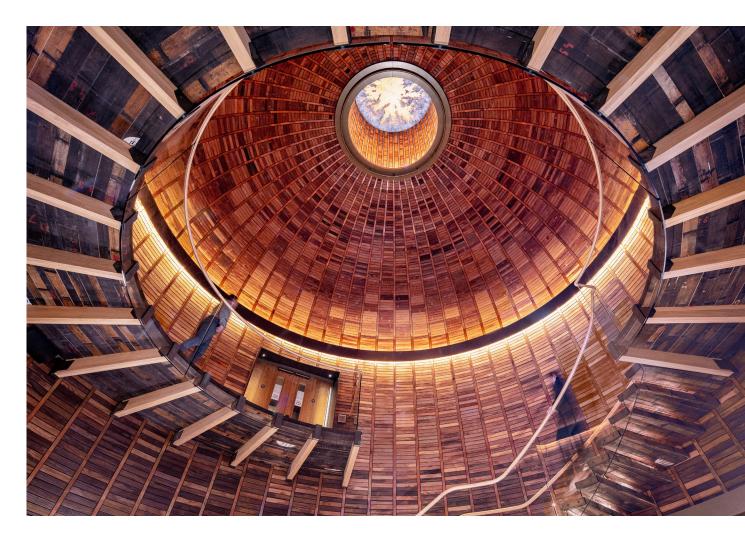
#### **INTERIOR DESIGN**

Studio MB

#### **PHOTOGRAPHY CREDIT**

Sally Ann Norman





d Gefrin reawakens the Northumbrian tradition for whisky. Launched in March 2023, it was a unique opportunity to illuminate a brand new museum, visitor experience and whisky distillery, located at the centre of the local village community in Wooler, an area steeped in Anglo-Saxon history. Located just one hour from Newcastle-upon-Tyne, the distillery borders Northumberland National Park, home to the darkest skies in the UK.

Michael Grubb Studio was directly appointed at the early stages of planning in 2019 by the local client Alan, Eileen and



Chris Fergusonto create a Lighting Design. The brief was for the lighting to showcase the Ad Gefrin brand and provide a visitor experience in multiple areas serving different functions, including a working whisky Distillery, Barrel Store, Bistro, Retail, Function Room, Museum and grand Atrium entrance. Showcasing the Ad Gefrin brand and supporting the local community were fundamental, using local companies and craftspeople to create a landmark and legacy that celebrated their rich ancestry for future generations to enjoy and benefit from.

The new building design was led by local Northumbrian architect, Richard Elphick, with exhibition design by Studio MB. There was meticulous attention to detail, using traditional and contemporary materials and the finest of finishes. World renowned family run company Forsyth Ltd supplied the copper stills. Ad Gefrin's, innovative design teams combined traditional techniques, sustainable design practices and modern efficiencies. The use of natural light played a vital role in the design, with large windows allowing in plenty of daylight. After dark, minimal lighting was used to extend winter use and create a warm ambience, selecting a low level of brightness to respect the dark skies. All exterior lighting was kept low level and minimal, to assist with wayfinding along key routes around the building.

The impressive, domed Atrium entrance sets the tone, light encircles the space, drawing the gaze up to the copper skylight. Sophisticated, welcoming, warm, lighting highlights the architectural design and fabric of the building connecting people with their surrounding, natural environment. Due

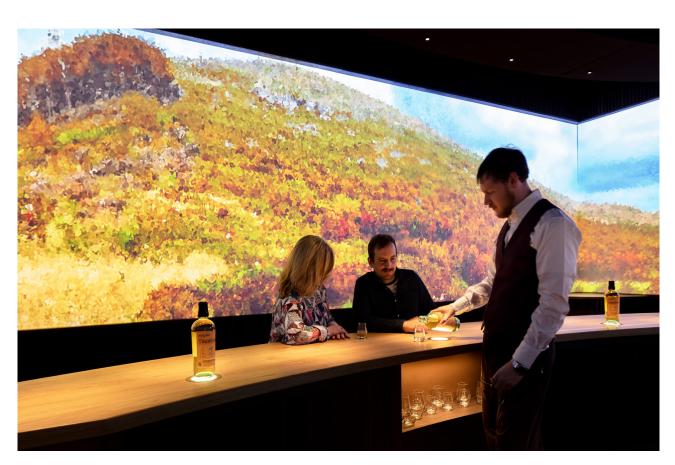


to its form, materials and the hand craftwork involved in the design and construction of the Atrium, its charm was also its challenge, particularly for integrating lighting within the dome and spiral staircase. The Lighting Design approach had to suit the traditional construction techniques used which required more time and consideration,

but ultimately the Atrium has a crafted, beautiful high-end finish.

Melissa Byers, Head of Bournemouth Studios advised, "The process of interrogating and challenging design often promotes innovation and benefits the end result. Typically, we could have chosen an encapsulated, acrylic, flexible linear product to suit the curvature of the dome. However, following a series of lighting tests, multiple straight shorter lengths of LED luminaires were chosen as they delivered a brighter lit effect, with a lower wattage output, whilst short lengths could individually be removed and easily upgraded or maintained over time due to the product's design and materiality, making this approach both more effective and sustainable."

The Bistro is a multi-functional bar, café and restaurant which caters for visitors and locals. During the day, the space is flooded with light, so it was important to select a design that had as much presence by day as it did by night. A decorative light feature was created using 270 spherical, glass globes internally illuminated by fibre optics suspended from the ceiling, a design inspired by Northumberland's starscape. The lighting layout and installation of the optical fibres presented as a challenge, due to the shallow, sloped, narrow, wooden slatted ceiling design and ductwork resulting in potentially long optical fibre runs across the ceiling. The layout and design needed to counter this to minimise excessive optical fibres lengths which can result in green discolouration to the optical fibres. Significant, co-ordination and planning





went into the design and installation approach in advance, to establish the layout with the optical fibre lengths cut by hand on site and curated by eye to produce the final, organic arrangement.

The lighting also needed to serve multiple functions, sometimes with challenging operational requirements, such as in the Distillery, an ATEX rated, potentially explosive working environment, also experienced by visitors on tours. Functional lighting was combined with decorative lighting to create two lighting scenes to support each requirement. Directional, warm spotlights illuminate the distillery copper pot stills, enhancing the raw materials and textures, as well as highlighting interior architectural features to create a community focal point after dark visible through large arched windows from the street.

Adjacent to the Distillery is the Function Room, featuring an impressive, vaulted ceiling, also visible from the street through large windows. A series of pendant designs were reviewed, ultimately resulting in the selection of large, curved, tiered copper-leafed pendants that make a visual connection through their form, materiality and warmth with the copper Distillery pot stills. The quantity of pendants, scale, number of tiers, orientation of the tiers and layout were all tested in 3D in order to create the best visual impact experienced internally, as well as externally from the street view. The final design settled upon includes three pendants, and alongside the pot stills, they create a striking landmark viewed from the exterior that celebrates the Ad Gefrin Brand.

The Lighting Design for the visitor experience includes a Tasting Room, Retail, Museum and Great Hall. The lighting within the tasting experience was kept to an absolute minimal by using very, narrow beam, discretely mounted spotlights and LED light sheets to highlight the colour and qualities of

the whisky, allowing the rest of the room to fall into darkness to support the 360 degree AV experience. A similar, discrete approach was also used in the Great Hall and Museum to ensure that the artefacts and AV are the key focal point. Retail lighting in the shop at higher level provides a clear floor area for visitor movement and allows the space and displays to be used flexibly with feature lighting to highlight products available for sale.

Michael Grubb, Founder and Managing Director of Michael Grubb Studio, said: "There was a real investment in the local community throughout this project. The clients are a family-run business who were committed to involving and benefitting local people. This level of care can be seen throughout the details of the project and the high quality of the result, due to their craftsmanship and personal attention to detail. This is something that they really wanted the community to be proud of. The success of this project is also due to teamwork and all the pieces coming together. A good working relationship between the client, contractor, designers, and engineers created a pleasant experience and a real harmony to the project."

Eileen Ferguson, Co-founder of Ad Gefrin, commented: "We could not be happier with the result of the lighting design. Michael Grubb Studio worked closely with us on the process of how to bring our vision to life, allowing us to take a personal approach to the project. One of the things we have enjoyed so much about this project has been the process of seeing the design come to life from the initial concepts to the finished project onsite. We are incredibly proud of what the team have accomplished, creating a space which serves the local community while demonstrating our values and style as a brand."



# Sanxingdui Archaeological Museum

Guanghan City, Sichuan, China

#### **PROJECT NAME**

Sanxingdui Museum

#### **PROJECT LOCATION**

Guanghan City, Sichuan, China

#### **ARCHITECTURE**

Liu Yi / CSWADI (China Southwest Architectural Design and Research Institute Corp. Ltd), Chengdu / China

#### **LIGHTING DESIGN**

iLicht Lighting Engineering Design (Chengdu) Co., Ltd., Chengdu / China

#### **PHOTOGRAPHY**

Studio SZ / Justin Szeremeta, Shanghai / China

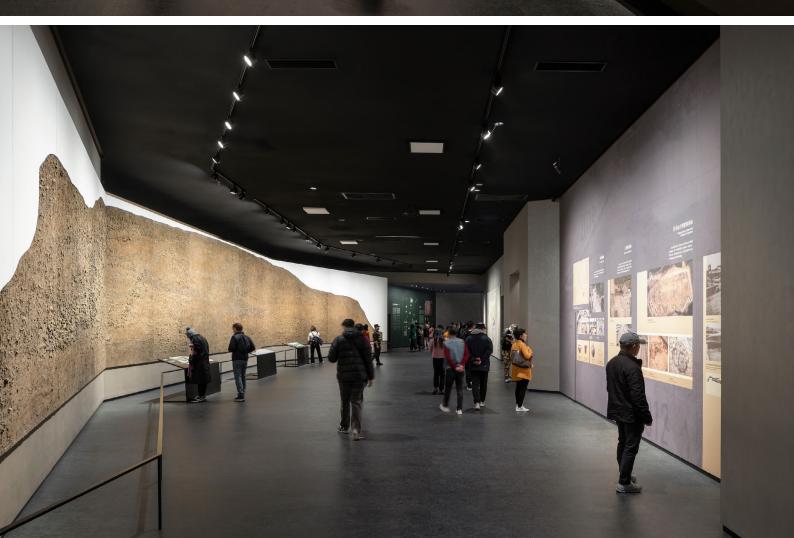
#### **PRODUCTS**

ERCO track, Parscan 48V, Optec, Gimbal, Quintessence

#### **PHOTO CREDITS**

© ERCO GmbH, www.erco.com, Photography: Studio SZ / Justin Szeremeta





Sanxingdui Museum stands as a testament to the rich cultural heritage and archaeological discoveries unearthed at the Sanxingdui site. The site holds a significant place in the study of ancient Chinese civilisation, and the museum is renowned for its impressive collection of bronze masks, jade artifacts, and pottery, providing a captivating glimpse into the unique culture of the ancient civilisation during the late Neolithic period. To illuminate these precious artifacts with the utmost care and precision, ERCO luminaires were chosen due to high quality performance and their contribution to cultural protection through lighting.

#### Precise Illumination: Bringing Artifacts to Life

ERCO meticulously evaluates the potential damage factors of its light sources, ensuring that cultural relics are safeguarded from the detrimental effects of light radiation. This dedication to protection aligns seamlessly with the museum's mission to preserve and showcase the Sanxingdui artifacts for generations to come. The Sanxingdui Archaeological Museum is a vast and complex space, with a wide variety of exhibits. The lighting designers were faced with the challenge of creating a lighting scheme that would meet the specific needs of each exhibit, while also maintaining a sense of coherence and unity throughout the museum.

The project had a tight construction schedule which meant a shorter lead time and higher uncertainties. Due to that, the lighting designer proposed a "changetolerant" concept. This adaptable approach involved utilising luminaires with interchangeable lenses, allowing for beam angle adjustments without the need for fixture replacements. This level of flexibility allows for effortless adjustments to accommodate changing exhibition layouts and lighting requirements.

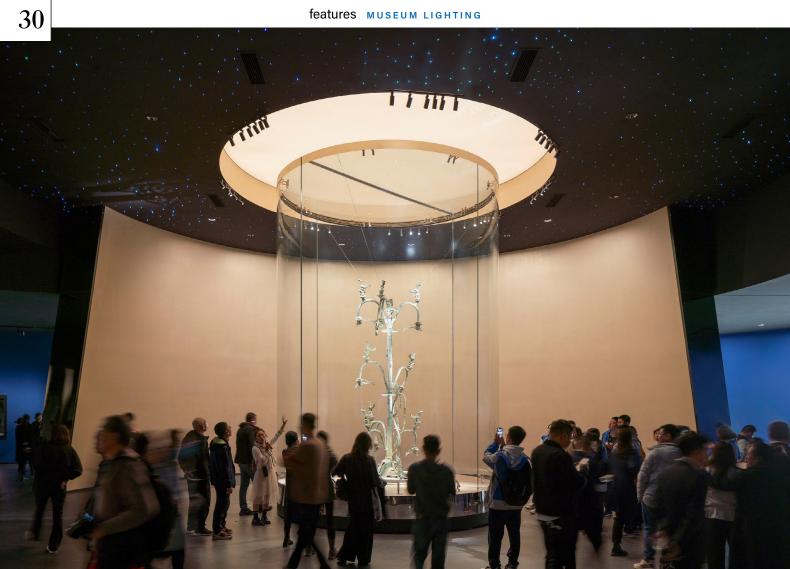
Furthermore, the implementation of Casambi Bluetooth control technology empowered the team to fine-tune the lighting intensity without disrupting the delicate artifacts.

## High colour rendering index (CRI) for accurate artifact representation

The showcases are lit with ERCO Parscan 48V spotlights in size XS, drawing visitors to the intricate details of the artifacts. These versatile luminaires deliver precise beam control and adjustable light intensity, ensuring that each artifact is illuminated evenly and effectively. The Parscan accessories also allow curators and the museum maintenance team to adjust the light distribution as needed. The carefully controlled lighting eliminates glare and harsh shadows, allowing for the creation of dramatic contrasts and subtle nuances that accentuate the unique features of each piece.

In addition to the beam control and flexibility, the high colour rendering index (CRI) of the Parscan 48V spotlights accurately reproduce the colours of the artifacts. This is especially important for the bronze masks, where the rich hues and intricate details that were once veiled in obscurity now emerge with newfound vibrancy.







Beyond the artifacts themselves, Parscan 48V and Optec spotlights enhance the overall ambiance of the exhibition space. The carefully controlled contrast levels create a sense of drama and intrigue, guiding visitors through a captivating narrative of ancient Chinese civilization. The flexibility of track lighting empowers the museum maintenance team to effortlessly adjust the position of the luminaires or seamlessly add, remove, or replace them as required.

The harmonious interplay of ERCO's lighting solutions and the Sanxingdui artifacts has transformed the museum into a captivating sanctuary of ancient Chinese history. The precise illumination accentuates the textures and details of the artifacts, revealing their hidden beauty and captivating visitors with their enigmatic allure. The lighting design has masterfully transformed the museum into a stage where the history comes alive, illuminating a chapter of human history that continues to fascinate and inspire.





## "We Connect Cities With Light" - Interview with LUCI

Light pollution is a major issue in many parts of the world. It is caused largely by bad lighting design or by the use of lighting products that are not eco-friendly. But the good news is that the lighting community is realising this problem and taking action. In this article, we interview France-based LUCI (Lighting Urban Community International) on its various activities related to light pollution, on how the network is acting to tackle it and on its way forward. Some of its founding member cities are from Asia.

# Q: LUCI or Lighting Urban Community International is the international network of cities on urban lighting. What was the motivation for forming LUCI?

**A:** LUCI Association was formed in a period when cities started to rethink public space, including its night-time experience, not only making it safe, but also attractive.

Let's go back in time: 22 years ago, the city of Lyon in

France was hosting its twin cities. The mayor of Lyon at that time, was very into international politics and wanted a more focussed exchange with its twin cities. Amongst the topics the city of Lyon wanted to work with on international scale was gastronomy, silk, and lighting. Lyon at that time already worked on lighting for some 10 years; it had the festival of light and was working towards its first lighting masterplan.

The around 15 cities that gathered in Lyon at that moment, agreed to start an international cooperation on the topic of urban lighting and officially founded LUCI. A small but very motivated group within these founding cities, Bratislava, Budapest, Glasgow, Guangzhou, Liège, Lyon, Montréal, Ouagadougou, Putrajaya, Porto Novo, Rabat, Shanghai and Turin, started a dream: Building the future of light together. They launched the creation of a network that brings together cities from around the world to think about urban lighting.

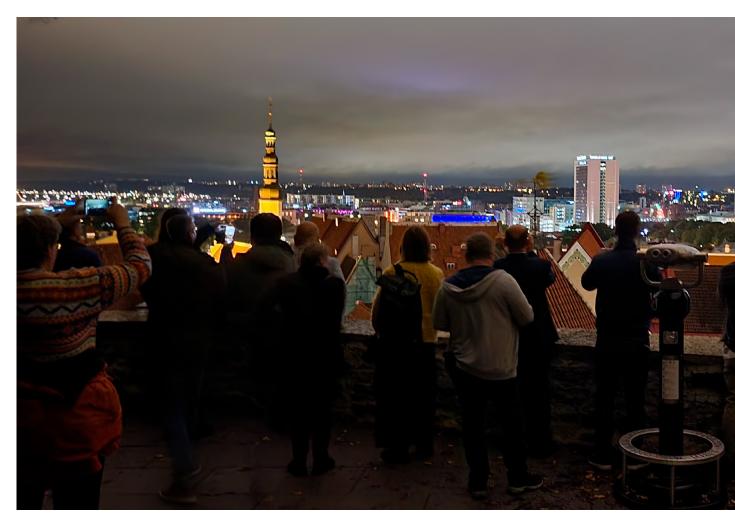


Photo: ©LUCI Association



Photo: ©Rami Saarikorpi



## Q: What does LUCI do and how many member cities are there in your network?

A: In LUCI we say that we connect cities with light. LUCI is the international meeting place for cities, with international conferences and events, both in person and on-line. During these meeting moments we learn from each other, but we also do things together, through working groups and workshops for example and night visits where we observe the different aspects of the night, and we experience things together.

In LUCI we create spaces for cities to express their views. By putting forward these views through internationally recognised documents such as the LUCI Declaration, our cities can influence. Cities become part of a collective voice advocating for sustainable and innovative urban lighting practices.

In LUCI we meet, we learn, we act, and we speak. At this moment the LUCI network counts close to 70 cities and 40 associated members. The associated members are important representatives of the lighting industry, lighting design, research and light artists.

## Q: How do the member cities in your network collaborate with each other?

A: We have several working groups that allow us to go more in depth on certain topics, that are initiated and lead by cities. We also work on multilateral cooperation projects and research initiatives that explore the new facets and potentials of light. So, these are cross-border projects often with funding from the European Union or other funding organisations. Through such projects we help cities to progress together on, for example, the topic of Light, Health & Wellbeing. On this particular project, we invite you to learn about and check the progress of our project *ENLIGHTENme* funded by the European union (https://www.enlightenme-project.eu/).



Photo: ©Jiri Halttunen

# Q: Light pollution is a global issue. In your view, what are the issues that are causing light pollution in the world today?

A: Cities are growing more and more and lighting today is a very precious common good, like water. Cities must deliver lighting, which is really an essential infrastructure. Through public lighting we have extended life in cities, offering longer workdays and leisure. Light pollution is the direct effect of a growing world population coupled with increasing urbanisation and related changes in mobility and lifestyle, and also a change in lighting technology that has made lighting ever more ubiquitous.

## Q: How is the network acting to tackle light pollution? Do you have any case studies to show us?

A: As mentioned earlier, we have several working groups, and one of them is the Light Pollution Working Group. This working group has been active since 2022 and meets on a regular basis. During these meetings we discuss challenges, solutions and share good practices. Cities share their initiatives and projects, but also external experts are invited to these meetings to share the latest developments to mitigate light pollution.



Photo: ©LUCI Association

We had a gathering with a high level of expertise on light pollution, during the Tallinn Urban Lighting Seminar 2023 "Light Pollution in Focus" and we will have another one in Montpellier during the LUCI Annual General Meeting in Montpellier, a city that launched its Lighting Masterplan in the context of their new Climate Plan. The content of this event will be all around measures to prevent and fight light pollution.

Besides very concrete case studies of several cities that will be shared in a publication, this Working Group delivered a position paper: A cities' approach to reducing light pollution. This co-written paper was the result of several co-creation sessions of the working group and got integrated in the LUCI Declaration as a thematic chapter. The LUCI Declaration had 1000 printed copies in English (https://www.luciassociation.org/download-the-lucideclaration-for-the-future-of-urbanlighting/) and has been translated in Korean, French, Spanish, and Dutch with 400 downloaded digital versions, forming an excellent example of LUCI, the voice of cities.

#### Q: How do you see the network going forward?

A: The LUCI network continues to support cities improve their urban lighting and become more sustainable with the use of light. We support cities to find a balance, in their lighting policies, between aesthetics, attractiveness, energy efficiency, safety and security. It's not that easy because finding this balance depends on lighting cultures and norms, legislation and current practice: there is often quite some work to do! In LUCI we remain open to all ideas and cooperation initiatives that will make the network stronger, to learn together and produce a strong collective intelligence.

LUCI, as cities, must adapt to new circumstances linked to the fluidity and mutation of the world stage, as we become more agile as an organisation, we aim to better respond to needs from cities all over the world, offer more dedicated services and help cities improve urban lighting policies.

The network is growing stronger and stronger because there is a strong need for cooperation and exchange of knowledge on urban lighting, and also because we have good fun, and have such a great network of members, experts and partners!

#### **About LUCI**

LUCI (Lighting Urban Community International) is the international network of cities on urban lighting. Created in 2002 and based in Lyon, France, today LUCI is a non-profit organisation bringing together close to 70 member towns and cities worldwide that use light as a tool for social, cultural and economic development. It also includes over 50 associated members from the lighting industry, design agencies and research institutes. For more information on LUCI and its activities, visit https://www.luciassociation.org/



Harmeet Singh Issar – Founder Partner, Design Matrix.

Photo credit: Design Matrix

# Interview with **Harmeet Singh Issar,** Founder Partner, Design Matrix

# LT: Tell us about Design Matrix – when was the company formed and what is your corporate philosophy?

Harmeet: Sanjeev Nangia and I founded Design Matrix nearly two decades ago. It was an era when architectural lighting – as a discipline – was still in its infancy in India, and when the only lighting designers were either working in theatre or the film industry, At that time, Design Matrix worked to pioneer lighting design in this field. Since then, both the profession and us have come a long way. And much like the discipline and its recognition, the practice too has grown, matured and expanded its horizons. Today we have a portfolio of nearly 400+ completed and on-going projects worldwide; with offices in New Delhi, Mumbai, Bengaluru, Sydney and Dubai; and, we are one of the country's only ISO 9001:2015 certified lighting design consultancies.

At the heart of our work lies an invisible medium that not only enables visibility but also creates environments that engage senses and are a pleasure to behold and occupy. As we continue with our explorations with light, our most important achievement and also our most important objective at Design Matrix has remained our relationship with our clients, built on values of integrity, professionalism and respect. This, along with our ever expanding client base, stands as testimony to the quality, creativity and ingenuity of our work.

# LT: Can you name us some lighting projects that Design Matrix has worked on? Which lighting project in your firm are you most proud of and why?

Harmeet: We are both humbled and thrilled to be a part of some landmark big and small developments in the country and abroad. At an urban level, we have done the lighting masterplanning for the entire Aero-city Hospitality District at New Delhi – which has been termed as 'one of the most walkable part of the city' by day and by night.

The lighting for the City Palace at Jaipur, was completed a few years ago, towards revitalizing this edifice for nighttime tourism and to give to the city a stirring night-time jewel

Light and its ability to evoke emotions has always fascinated us. We are honoured to be a part of some reverent places of worship across India and Africa where lighting has made a big difference to the way communities not only pray but come together and celebrate.



Photos above and right: Aerocity, New Delhi – lighting master-planning by Design Matrix.





Photos above and right: Shree Cutch Satsang Swaminarayan Temple, Nairobi, Kenya – lighting design by Design Matrix.



## 66 The future of lighting in India and Asia is likely to be shaped by technological advancements, a growing focus on sustainability and circularity, and the rising realization of user-centric design.

- Harmeet Singh Issar

#### LT: In your opinion, are architects / interior designers in India paying more attention to lighting design than before, say like five years ago? What are the reasons behind it?

Harmeet: Lighting design has undergone a fundamental shift in the last few decades and the way it is perceived by the design fraternity has changed radically. Earlier it was seen purely as an energy saving strategy, where designed spaces could prove to be more energy efficient. And with the introduction of LEDs this became more ingrained. However, over the years the transformation of lighting design has been akin to the growth of LEDs where while energy savings are a given - and what was once a 'good practice' has become the norm, it has also led to the more vibrant, dynamic, engaging, immersive nature of lighting design as well as its benefits on overall well-being.

Today, as we spend more and more time indoors, there is no space that cannot benefit from the expertise of a lighting designer across building typologies, scale, location or context.

#### LT: What are the challenges in executing an architectural lighting project in India?

Harmeet: The challenges, perhaps are not too different from what other design professions suffer. It starts at the education level and with some clients still seeing lighting design as a part of building services and treating it like an electrical engineering subject - when it really is part design, part technical and in fact part art!

The success of any lighting design project really depends on how well it is integrated and suited to the architecture / interiors / landscape of the development. The onus lies in a large part on the principal consultants on how willingly they collaborate with the lighting design team and benefit from





Photos above: The City Palace, Jaipur - Revitalization for Night-time Tourism - by Design Matrix.

the subject knowledge and experience towards enhancing their vision & the user experience for the space.

#### LT: What changes would you like to see in the lighting industry in India as well as in Asia?

Harmeet: The future of lighting in India and Asia is likely to be shaped by technological advancements, a growing focus on sustainability and circularity, and the rising realization of user-centric design. With increased awareness of All photos courtesy of Design Matrix.

products, technologies and the impact of lighting on our health and wellbeing, stricter regulations and quality control measures need to be implemented to ensure safety and reliability of lighting equipment.

Intuitiveness of smart lighting systems that are seamlessly integrated and lead to more robust systems with much better control and personalization is necessary.



Photo credit: Messe Frankfurt Exhibition GmbH / Pietro Sutera

# Light + Building 2024: Fulminant innovation show provides a stage for sustainability and efficiency in buildings

The modern building is intelligent, connected and as a result saves energy. In combination with alternative energy sources and efficient lighting solutions, emissions in the building sector can be drastically reduced. This makes a significant contribution to achieving climate targets. 2,169 exhibitors presented the latest developments in building technology and trends in innovative lighting design at Light + Building in Frankfurt am Main from 3 to 8 March 2024. Over 151,000 visitors travelled to the world's leading trade fair for lighting and building-services technology.

"The atmosphere at the exhibitors' booths, in the halls and throughout the exhibition grounds was simply fantastic. We are extremely pleased that so many exhibitors and visitors, as well as our long-standing partners, have continued the success story of the world's leading trade fair for lighting and building-services technology in 2024," summarises Wolfgang Marzin, President and Chief Executive Officer of Messe Frankfurt. He adds: "With the switch to renewable energy sources, greater efficiency and sustainability in buildings, the industry has key goals on its agenda. That's why they used the platform intensively, especially in the first few days, to present and discover innovations and drive forward key topics. After all, if we want to achieve the climate protection goals, the building sector is an essential milestone. It is unfortunate that the rail and air transport strikes have already affected Messe Frankfurt's third leading international event since the beginning of the year."



Success in figures. Source: Messe Frankfurt Exhibition GmbH

### Buildings of tomorrow and inspiring lighting solutions

Key topics are the electrification and digitalisation of homes and buildings in order to reduce emissions and reuse raw materials. At Light + Building, the industry presented the digital and electrotechnical infrastructure for this and, on this basis, showcased solutions for dynamic power control, energy storage systems and applications for connected security. One growing area is the range of e-mobility and







Photo credit: Messe Frankfurt Exhibition GmbH / Petra Welzel

charging infrastructure as well as innovations and products for decentralised energy supply systems and components.

Light plays an important role in the architecture of tomorrow. At Light + Building 2024, 65 percent of exhibitors belonged to this sector. They presented high-quality lighting solutions for indoor and outdoor areas as well as dynamic room concepts. Modern LED installations ensure contemporary efficiency and either blend harmoniously into the architecture or emphasise the design elements. Lighting is to provide maximum visual comfort in all living and working environments. Thanks to the materials used, Acoustic Lighting combines a pleasant lighting atmosphere with sound-absorbing functions. Sustainability plays an essential role in both the materials used and the manufacturing processes. Many manufacturers design luminaires in a way that the raw materials used can be recycled at the end of their useful life.

#### Light + Building 2024 in figures

The high-quality, extensive and international portfolio of lighting and building-services technology impressed the visitors. 95 percent of them were extremely satisfied with what was on display and stated that they had achieved 93 percent of their trade fair attendance targets. The most came

to the innovation meeting point from Germany, China, Italy, the Netherlands, France, Switzerland, Belgium, Austria, the UK, Spain and Poland. They came from a total of 146 countries – including, for example, India, the USA, the United Arab Emirates, Australia, Brazil and Singapore. The degree of internationality was thus 51 percent. The level of internationality among the 2,169 exhibitors was also high at 76 percent.

#### Meeting place for the social media community

The social media community also found its home at Light + Building. On 3 and 4 March, the leading content creators in the lighting and building-services technology sector gathered for the Power Creator Days. In addition to live podcasts, expert talks and case studies, visitors had the chance to pedal for a good cause and work together towards a high energy target. A total of 1,510 minutes were cycled on the six fitness bikes. The sponsors will convert the result into a cash donation for the Leberecht Foundation, which Messe Frankfurt will double. The exact amount will be announced on social media further to Light + Building.

The next Light + Building will take place from 8 to 13 March 2026 in Frankfurt am Main. For more information, visit www.light-building.messefrankfurt.com.

#### Voices from the industry

### Alexander Neuhäuser, General Manager ZVEH (Central Association of the German Electrical and Information Technology Trades):

"Light + Building demonstrates how sector coupling can succeed through the necessary connectivity. The electrical trades integrate photovoltaics, storage, electromobility and heat pumps. They show how the energy industry requirements for controllable consumption devices (SteuVE) can be met and thus take account of the current transformation process. The good atmosphere at this year's Light + Building 2024 was also noticeable at the joint stand of the electrical trades, which was very busy on all days of the event. The traditional partners' evening was also a complete success, bringing together the partners of the electrical trades and the industry leaders. We were particularly pleased that so many young people once again took the opportunity to visit the E-House and the workshop street and gain an impression of what is feasible with smart and intelligently connected building automation."

#### Wolfgang Weber, CEO, ZVEI (Electro and Digital Industry Association):

"In the context of climate goals and the economic situation of urgently creating more affordable living space in Germany, technologies are increasingly coming into focus. The exhibiting companies at Light + Building have impressively demonstrated how easily well-designed climate protection can even lead to greater economic efficiency in the operation of houses, buildings and entire neighbourhoods. This requires the right solutions, especially from the electrical and digital industry, such as heat pumps, controllable lighting, charging points and an energy management system. This is relevant – not just in Germany and Europe, but worldwide. Light + Building is the right place to present innovative, climate-friendly technologies and solutions and to engage in dialogue with trade visitors from Germany and abroad."

# A GUINNESS WORLD RECORDS™ title attempt at Light + Building 2024: Zumtobel achieves the world's largest continuous illuminated ceiling with CIELUMA



World record holder CIELUMA at Light + Building 2024. Photo credit: Andrzej Siegmund

Zumtobel now holds the record for the largest continuous illuminated ceiling in the world. The lighting solutions provider from Vorarlberg, Austria, and its development partner Typico from Lochau, also in Austria, accepted the certificate from the Guinness World Records adjudicator at Light + Building 2024 in Frankfurt am Main. In addition to its impressive size of 202.76 square metres, the fascination of the CIELUMA lighting installation is its perfect imitation of daylight.

#### From idea to implementation

Zumtobel and Typico made a joint decision to apply for a GUINNESS WORLD RECORDS title. At the end of 2023, Zumtobel submitted the application documents and was quickly informed they would be able to apply for the world record title. Today, the partners are delighted to have actually succeeded in their attempt. "We're very proud to have been awarded a world record title. First and foremost, we would like to thank our manufacturing partner Typico, with whom we have worked in close collaboration on the development and production of CIELUMA for many years," says Thomas Ölz, VP Brand & Application at Zumtobel. "We couldn't have asked for a better place than Light + Building to achieve the world record." Typico GmbH CEO Thomas König adds: "It's a great honour to have played our part in gaining this world record title. For my team and myself, the world recordholding CIELUMA installation was and is something close to their hearts - project that we worked on intensively and passionately right from the start."



Presentation of the certificate for the world's largest illuminated ceiling by GUINNESS WORLD RECORDS™. Thomas Ölz, VP Brand & Application at Zumtobel together with Thomas König, CEO Typico GmbH.

Photo credit: Andrzej Siegmund

#### Like a sky made of light

A light surface of this size is like a piece of the sky, an effect reinforced by the homogeneity and frameless appearance of the continuously illuminated surface, which has no splices, joints or other disruptive elements. The luminous ceiling fascinates with its homogeneous illuminated surface. Its world recordholding size of 45.029 x 4.503 metres was made possible by a special fabric: Translucent fabrics are the perfect material for producing luminous ceilings in such large dimensions. This material is characterised by its low weight, acoustic effectiveness and thermal permeability. The illuminated ceiling is versatile and easy to install and maintain.

"What's exceptional about CIELUMA is that its world record-holding size is not even the maximum possible. In a larger building, we could create an even bigger illuminated ceiling," says Typico CEO Thomas König.

"The world record set by Zumtobel

is a real first for Light + Building and we are delighted the company chose our venue to do so, because the world's leading trade fair Light + Building is here precisely to showcase such innovations," says Wolfgang Marzin, CEO of Messe Frankfurt. "We would like to congratulate Zumtobel and Typico on this unique achievement. The CIELUMA illuminated ceiling is an impressive light installation, which has given the exhibition hall a very special, welcoming atmosphere."

#### A positive effect on people

CIELUMA allows Zumtobel to exploit the full potential of the Double Dynamic Lighting (DDL) approach. Inspired by the dynamics of a natural canopy of light, the illuminated ceiling brings the changing nature of daylight With its sound-absorbing inside. properties and host of design options, CIELUMA brings to life a new quality in the connection between light, acoustics and space. This has a positive impact on the human body: room users are more focused, more motivated and enjoy a better workflow and greater sense of well-being.

#### Re-use is taken care of

After the end of the trade fair, Zumtobel and Typico will dismantle the components of the CIELUMA installation and use them in upcoming lighting projects. Thanks to its modular design, the illuminated ceiling can be easily separated into its original parts and reused.

For more information, visit www.zumtobel.com.

# Thorn creates digital and immersive experience for visitors at this year's Light + Building

Thorn Lighting welcomed visitors to its digital and immersive stand at Frankfurt's Light + Building event. The lighting brand founded in 1928 showcased elements of its extensive portfolio of indoor and outdoor solutions. Surrounding the outside of the stand were areas focused on Thorn's key outdoor applications — road and street, sports and urban and architectural. Moving into the interior space, visitors were invited to explore the indoor application areas of office and education, retail and industry.

Alongside physical products and prototypes, visitors to 2024's Light + Building got a first look at the City of Thorn. This 3D, interactive city has been designed to demonstrate Thorn Lighting's excellence in key application areas and was shown on large screens. In the City of Thorn, users can navigate through spaces that are all illuminated with the precision and innovation Thorn is renowned for and zoom into specific areas to examine the diverse range of products and control systems including dark-sky friendly outdoor luminaires, sustainable panels for office and education, or connected industrial solutions such as high bays. Just as great cities evolve, so too will Thorn's virtual metropolis, growing over time to incorporate a full spectrum of applications. More information to follow later this year.

Other notable innovations include HAP (High Accuracy Positioning)



Image copyright: Thorn Lighting

which was displayed in the retail and industry booths. Launching in spring, this technology can be used alongside Thorn luminaires to track people or objects, resulting in a range of benefits. Already installed at Thorn's manufacturing facility in Spennymoor (UK), visitors could view livestream data to see its real life usage. Thorn also previewed the Keyture solution, which is a new connectivity and IoT ecosystem. Launching later in the year, the luminaire compatible sensors amplify lighting control, enhancing energy and cost saving potential alongside asset tracking. Also installed in Spennymoor - the factory has seen cost savings of thousands of pounds since January.

During Light + Building, Thorn's sustainable indoor recessed panel 'Omega Moduline' was shortlisted for Architeller's 'Sustainable Product Award'. Mark Mattimoe, Thorn's indoor Product Management Director outlined the luminaire's features (including replaceable LED modules and driver) to a jury at the fair's Design Plaza.

More success came in the form of Light + Building's first ever 'Sustainable Exhibition Stand' prize - awarded to the Zumtobel Group for the stand concepts of Thorn Lighting, Zumtobel Lighting and Tridonic.

Vice President of Thorn, Saurabh Pandhi said, "Returning to Light + Building in March exceeded all of our expectations. Visitor numbers were far greater than anticipated, and through the solutions on display and the knowledge of our teams on the stand, we have solidified Thorn's position as a strong player in the indoor and outdoor lighting market with connectivity and IoT at the core of its solutions. Over the coming months and years, we'll continue to build on our portfolios, prioritising sustainability, efficiency and connectivity for our customers. Thank you to all who toured the Thorn stand - we look forward to continued collaboration going forward."

For more information, visit www.thornlighting.com.



Image copyright: Thorn Lighting

# ERCOplay at Light + Building 2024: Interaction with light at a sustainable exhibition stand



Photo: © ERCO GmbH, www.erco.com, photography: Frank Wiegand

At the Frankfurt exhibition, ERCO unveiled a compelling vision with their motto "hands on light", inviting lighting aficionados from across the globe to engage directly with their sustainably designed Light + Building exhibition stand. The ERCOplay stations offered a hands-on experience, allowing attendees to explore sustainable lighting solutions tailored for both intimate museum display cases and expansive outdoor façades. The exhibition wasn't just about enjoyment; it delved into the crucial question of how lighting can be utilised sustainably. Through its "Greenology" sustainability programme, ERCO showcased innovative product solutions and approaches aimed at enhancing the sustainability of architectural lighting.

Transforming the concept of play of brilliants to light for playing. The luminaire manufacturer's playful adaptation of Richard Kelly's lighting perception triad for the Light + Building exhibition was a creative deviation, allowing visitors at the ERCOplay stations to test their lighting knowledge



Photo: © ERCO GmbH, www.erco.com, photography: Frank Wiegand

across five interactive stations: At Station 1, participants turned into lighting directors on a miniature stage. Using the new Axis showcase lighting, a lighting concept based on the "3-point lighting" approach had to be realised. Moving on to Station 2, the lenses of Optec spotlights were to be changed till the light was precisely aligned with the target surfaces. At the downlight station, the objective was to solve estimation questions, including about light distribution, with a quick tap on the buzzer. Station 4 was outdoor-themed: The teams were asked to practise aligning the Beamer spotlights. The 5th station, 'hands on' Invia, encouraged participants to experiment with ERCO's linear system to create their own lighting scenes including wallwashing, ambient lighting, indirect and accent lighting.

### Expertise for showcases, passion for general lighting

ERCO designs lighting solutions that meet user needs sustainably and ensure architecture remains functional and relevant for decades. The key metrics for energy efficiency (lm/W) and effectiveness (lx/W) of lighting are showcased through the OptecNew spotlights, spotlights, which represent an eco-friendly advancement of our best-selling product. By comparing the illuminance on the targeted surface with the power consumption of the accent lighting fixture, it becomes evident whether light, and consequently energy, is being inefficiently dispersed as scattered light. The company now also offers precise lighting for sensitive artefacts behind glass: With its miniaturised Axis luminaires, ERCO sets the benchmark for lighting quality in showcases. The linear, modular Invia lighting system exemplifies versatility in application on a larger scale and stands out for its ability to provide balanced wallwashing illumination, seamlessly extending even into room corners.

At L+B, ERCO revealed its 'secret passion': Downlights. By showcasing the variety in its downlight portfolio, ERCO highlighted its broad expertise beyond just spotlights. General lighting using recessed luminaires is a crucial component of lighting designs focused on enhancing perception. Using the Iku and Skim downlights, ERCO demonstrated that luminous efficacy greater than 120lm/W combined with a zoned lighting strategy can significantly increase energy efficiency, reducing the consumption of standard-compliant office lighting to as low as 2.99W/m2.

### The best use of light: flexible in the office, responsible outdoors

ERCO showcased eco-friendly and standard-compliant office lighting through its track-mounted downlights as a prime example. This allows for the lighting to be flexibly adjusted to fit office layouts and adapt to changes in use. Similar to accent lighting, ambient lighting should be applied selectively, only where it is necessary. The same applies outdoors: With its Beamer series of projectors, ERCO showcased at the L+B precise outdoor lighting that maintains the integrity of darkness while utilising light in a responsible manner.

#### An example of consistent sustainability

Sustainability comes from durability. 'Lighting Durability' is ERCO's goal which states that all newly developed luminaires are designed for a service life of 20 years. The first product to be designed in accordance with this specification is the advanced version of the Optec spotlight. Durability also served as the guiding theme for the stand design concept. In designing the stand, priority was given to selecting materials that could be repurposed following the Light + Building exhibition. For instance, a specially constructed stand floor was dispensed with and the company utilised road cases for product presentations. These cases have been employed at local trade fairs for years and are poised for their inaugural tour. The framework used was from the 2018 Light + Building stand, and the ERCOplay stations were incorporated into a



Photo: © ERCO GmbH, www.erco.com, photography: Frank Wiegand

rental scaffold, which will be reused beyond the duration of the trade fair. And what will happen to the printed fabrics that were used on the stand? They will be converted into carrier bags and will soon be raffled off among visitors to the stand.

At the fair's conclusion, ERCO Managing Director Oliver Gabriel expressed a highly satisfied assessment: "Engaging hands-on, experimenting with light and fixtures – that's what brings excitement to a trade fair. The enthusiastic feedback from our visitors regarding ERCOplay has strengthened our commitment to making light a tangible fourth dimension of architecture. Continued discussions with planners about efficiency and lighting quality will further propel the development of durable products, enhancing the sustainability and improvement of architecture."

For more information, visit www.erco.com.

# BOMMA presents two new lighting collections, Flare and Stellar Dust at Light + Building 2024

BOMMA has launched the artisanal unique and versatile Flare Collection and the minimalistic Stellar Dust Collection. Both were showcased for the first time at the Light + Building trade fair in Frankfurt.

BOMMA is a progressive Czech glass company, manufacturing handcrafted sculptural lighting. Their products transform interiors, creating a distinct mood in each space – from eyecatching centerpieces and installations to soft ambient light.

#### **FLARE**

#### A glimpse of inner light

The beam inside BOMMA's Flare lights its magical spiral structure inside the crystal rod. This new collection, designed by Kateřina Handlová, pays



Flare collection. Photo credit: BOMMA

homage to traditional glassmaking techniques and allows architects and designers to create distinctive lighting installations for diverse spaces.

The crystal rods are manually pulled, so each piece is original with a unique swirl of light spiraling through its interior. This effect is achieved using a traditional glassmaking technique, where the molten-glass core is covered by small glass shards known as sinter, then dipped back in molten crystal. The glassmakers then pull the piece to a desired length, stretching the fragments across the interior of the glass rod. This creates a magical texture inside the rod, seemingly its own Universe, flaring every time a switch is flipped.

The author of the design, Kateřina Handlová, reveals, "The Flare luminaire is inspired by the phenomenon of light itself, craft and traditional glassmaking techniques, as well as the need to create a luminaire that offers a wide variety of compositions and space solutions. It is based on the form and character of the flare, creating lines of light and glimpses in space."

The collection includes crystal glass rods in three shapes, one perfectly straight and two bent in varying degrees. They can be infinitely combined to create custom installations. Each rod has brushed-silver or brushed-gold mounting on one end, while the other end is mounted with a steel wire to determine its position in space.

The light and its construction are very minimalist in appearance. However, they include sophisticated mountings with the latest COB light source. Václav Mlynář, Creative Director of BOMMA, explains "I'm always surprised by the amount of construction and aesthetic details required for such a simple mounting. The light is designed to provide maximum diversity, and this is why we put great emphasis on the ceiling mounting and its ability to branch the individual pendants."

To him, the design and prototyping are the most interesting aspects of the process. He adds, "It's the moment when we collaborate with the designer and our master glassmakers to turn sketches and visualizations into a real material. My goal is to make as few compromises as possible and create a beautiful light that corresponds with the designer's vision and, at the same time, will be feasible and effective to produce."

Kateřina adds, "Thanks to the



Stellar Dust collection. Photo credit: BOMMA

variability of its shape, Flare is perfect for vertical installations, such as in stairwells, as well as horizontal compositions in rooms with low ceilings. The individual components may be combined into a smaller minimalist lights or impressive, expansive fixtures in more spacious interiors. Flare can be just a line, a detail, or a monumental installation in office buildings or hotel lobbies."

#### STELLAR DUST

Cosmic tapestry carrying light through space

The Stellar Dust lighting is composed of countless speckles that seem to float through space. This collection was originally designed for J&T Bank in Prague by CMC Architects, and designers Václav Mlynář and Jakub Pollág. Consisting of 727 mouth-blown crystal droplets, complemented by 2,476 crystal beads, this impressive installation forms an organic shape that stretches across the bank's entry hall.

Its success resulted in this design being adopted for standard production, as an addition to the BOMMA Constellations. Both optical illusions and the remarkable effects of these crystal components perfectly juxtapose modern interiors. The crystal-clear colour and universal round shape add to its versatility.

Václav Mlynář, the Creative Director of BOMMA, also served as a designer in this case. "Each Stellar Dust pendant is unique," he explained, "It is mouthblown and then refined with precise cuts, using BOMMA's in-house developed glass cutting machines. In my view, this collection perfectly combines the best aspects of expert craftsmanship and modern technologies."

As with all BOMMA Constellations, the magic comes from forming custom clusters of lighting components that are built upon a mathematically precise structure but create a fluid organic effect. It allows both architects and designers to equally uplift small and large spaces with flowing clouds of Stellar Dust.

In addition to two new collections, BOMMA presents extensions to existing collections. Collections Lens, Soap mini, Metamorphosis and Stellar Dust are now available as wall sconces with an elegant brushed gold finish. The Ama, Buoy, Blimp and Pebbles collections can now be installed on multiple canopies in impressive clusters of 3 or 5 pieces.

For more information, visit www.bomma.cz.

# LEDiL releases DALINE-10 - Miniature Dark Light sophistication for architectural brilliance

EDiL indoor portfolio boasts a broad selection of Dark Light solutions known for their exceptional eye comfort and captivating aesthetics. Within this collection lies the company's highly acclaimed DAISY family, available in diverse form factors and colours, offering creative freedom to fashionable luminaires. As the compact counterpart to DAISY, DAISY-MINI has made its mark, and now, pushing the boundaries further, the company introduces DALINE, the newest addition to its Dark Light family. Perfectly suited for miniature architectural lighting designs, DALINE brings forth a solution that combines sophistication with efficiency.

With a width of just 12.5 mm, DALINE-10 is four times smaller than its counterpart DAISY, while delivering the same premium low-glare illumination as other members of LEDiL Dark Light families. Offering a comprehensive range of beams, DALINE-10 emerges as the perfect solution for various architectural lighting requirements, particularly in spaces where compact, elegant, and low-glare lighting is essential. This makes DALINE-10 an ideal choice for trendy applications such as wooden ceilings, acoustic panels, undercabinet displays, cove lights and mini track systems.

DALINE-10 is designed for seamless compatibility with the LINDA-10 platform, offering effortless luminaire customisation. In the example below, the LEDiL microtrack lighting system features linear solutions incorporating DALINE-10 and LINDA-10, along with a pendant luminaire featuring TINA-Y and a track light featuring YASMEEN-35.

#### Shades and compatibility

One DALINE-10 set comprises two lenses and one shade, which need to be ordered separately. Shades are available in black and white with a matt finish. There are two types of shades: SHD1 with a short position pin and SHD2 with a long



DALINE-10. Photo credit: LEDiL

position pin. SHD1 is optimised for 0.8 mm thick profiles, while SHD2 is designed for 1.6 mm thick profiles. Each shade requires its own profile with a suitable-sized PCB slot.

Since mid-power (MP) LEDs are higher than CSP LEDs, it is important to utilise SHD2 with a long position pin and a specific profile to uphold the desired height for the lens focal point.

DALINE-10 is optimised for 1717 CSP LEDs and is compatible with up to 2835 MP LEDs. Supporting 8–10 mm PCBs, DALINE-10 proves to be an effective solution when utilised with suitable aluminum extrusion profiles.

For more information, visit www.ledil.com.



DALINE-10 application photo. Photo credit: LEDiL

#### EBB & FLOW: A classic with new texture and colours

The Classic EBB & FLOW designs, the Rowan and Horizon, refuses to stand still, and is now launched in four new colours, ready to give you the munchies! With an eye on texture and taste, the new colours are produced with a sanded surface that creates a warm and marble-like effect when lit.

The sanded effect evokes a sense of the tactile and led to names that were equally edible, such as marshmallow, candy, latte, and earl grey.

The new Marshmallow colour is a soft, creamy shade reminiscent of the fluffy treat it's named after. It's a gentle, light hue that exudes warmth and tranquility, often used in interior design to create a cozy and inviting atmosphere. The Marshmallow colour can vary slightly, ranging from pale ivory to creamy beige. It pairs well with various other colors, particularly pastels and neutrals.

The Candy colour is a delicate and soft hue that embodies femininity, grace, and sweetness. Pale pink evokes a sense of innocence and romance, making it a popular choice for creating soothing and serene environments. This versatile colour can be used as a main feature in interior design schemes, adding a touch of warmth and elegance to any space.

The Latte colour is warm and creamy inspired by the rich tones of a frothy coffee drink. It embodies sophistication and comfort, reminiscent of the inviting atmosphere of a café. A blend of beige, brown, and cream, with subtle undertones of warmth. It adds depth and warmth to interior spaces, creating a cozy and inviting ambiance.

The Earl Grey colour is timeless inspired by the classic tea blend. It embodies elegance and refinement, evoking images of traditional tea ceremonies and British heritage. Earl Grey colour is a muted and sophisticated shade of gray with subtle hints of blue or lavender undertones, reminiscent of the aromatic bergamot found in the tea blend. It adds a touch of sophistication to interior spaces.

The new colours are available in sizes small and medium, and as pendants, wall and surface lamps from April 2024 through official EBB & FLOW partners.

For more information, visit www.ebbflowgroup.com.



Photo credit: EBB & FLOW Group



Photo credit: EBB & FLOW Group

#### Roger Pradier® - Specialist in Outdoor Lighting

ounded in 1910 by Edouard-F Jean Pradier, Roger Pradier® Company is a major player in the outdoor lighting market. Located in France, in the heart of the Centre Region, the brand is synonymous with quality, creativity, innovation and excellence. Its goal has always been to illuminate the gardens, terraces, public spaces and the exteriors of houses, hotels and restaurants - following the one guiding principle of uncompromising quality.



At Light + Building 2024, Roger Pradier® showcased a number of new outdoor lighting products.

#### **BARK NOMADE**

#### Designer Stéphane Joyeux

Bark Nomade can easily be moved between outdoors and indoors by being rolled on its weighted base or carried thanks to its handle. The distance between the light source and the diffuser ensure an homogeneous and comfortable illumination.

#### **CAREX & RONEX**

#### Designer Stéphane Joyeux Roger Pradier®X Pyrex®

Since childhood and with passion, Stéphane Joyeux, Roger Pradier®'s designer, has been collecting objects and materials to imagine new creations. The Carex & Ronex lighting fixtures draw from this art of repurposingand anchor Roger Pradier®'s environmental commitments

#### **HOGAR**

#### Design by Stéphane Joyeux

Hogarplays with shadows and light to reveal living spaces thanks to a performant illumination. This minimalistic aluminium structure is offered in a wide range of colours. Technical precision of cutting and folding processes, unique proportions and quality of finishes highlight Roger Pradier®'s unique know-how.

#### **LOUIS XIII**

#### Designer Stéphane Joyeux

Authentic design and uniform illumination: Louis XIII enhances both modern and traditional outdoor environments. The brushed and lacquered brass dome is shaped by hand using the metal spinning technique, the head is stamped and then assembled entirely using spot welding.

#### LAMPIOK 4

#### Design by Stéphane Joyeux

Inspired by the emblematic four-sided lantern, the Lampiok family is on the growing with Lampiok 4. This massive bracket-mounted fixture is available in a wide range of colours. Its mighty and open design is delicately made of aluminium. The material is cut, folded and adjusted with precision as in the pure Roger Pradier®'s tradition.





Photos above: Roger Pradier® exhibited its existing and new products at Light + Building 2024 show. Photo credits: Roger Pradier®

#### **HECTOR**

#### Designer Stéphane Joyeux

Hector's robust, slim rectangular design integrates seamlessy in the built environment to illuminate the surrounding areas. It is available in a wide range of heights and outputs, with symmetrical and asymmetrical distributions, and is designed to meet growing requirements in terms of light pollution control.

#### TETRA ASYMMETRIC

#### Design by Stéphane Joyeux

The merging of Roger Pradier® and Sécurlite expertise leads to the creation of a new generation of luminous LED bollards. Specifically designed for urban use Tetra Asymmetric contributes to the security of public areas. Its optimised lighting is respectful of light pollution norms and reveals its full potential with an environmentally friendly approach.

#### COOPER

#### Design by Stéphane Joyeux

Cooper possesses the word and style of a different time, the discreet charm of elegance and the spirit of modern comfort. Its flattering iris, dazzling or deep depending on the material and finish, merges into the mount thus freeing itself from it. This sconce gives relief to plain surfaces and its shining globe highlights the harmony of the setting.

For more information, visit www.roger-pradier.com.

#### SunLED® brings the Sun inside!



Photo credit: Seaborough

CunLED® is a technology developed by Seaborough, a Ocompany that specialises in innovative LED lighting technologies. SunLED® uses near-infrared light to mimic the healthiest aspects of sunlight and bring it indoors. SunLED® has proven health benefits, such as lowering the resting heart rate, boosting the immune system, and improving the mood and well-being of users. SunLED® can be easily integrated into general lighting and other products, such as USB devices, monitors, desk lamps for workplace and home applications. It could also be used in cars to improve the driver state for safety and comfort. SunLED® can be used in various settings to enhance the user experience by providing a comfortable, natural, stimulating, or relaxing LED light source, depending on the needs and preferences of the users. SunLED® is a simple and smart solution that can improve the welfare and satisfaction of drivers, employees, and anyone who is obliged to stay indoors without a proper dose of sunlight outdoors, such as elderly.

The scientific arguments behind SunLED® are based on the effects of near-infrared light on the human body. Near-infrared light is a part of the natural sunlight spectrum that has a wavelength range of 700-1400 nm. Near-infrared light can penetrate deep into the skin and activate cells close to blood vessels, which can have systemic effects on the whole body.

The company's clinical trial have demonstrated the

health benefits of SunLED® for users who were exposed to the technology for three hours a day. The trials showed that SunLED® can lower the resting heart rate by 5-10 beats per minute, which can reduce the risk of cardiovascular diseases and improve the fitness level of users. SunLED® can also boost the immune system by decreasing the levels of TNF-and IFN-, two cytokines that are involved in inflammatory responses and autoimmune diseases. The study demonstrated also that users had also an improved mood and less drowsiness after the initial hours of using SunLED®.

In addition to these proven benefits of SunLED®, photobiomodulation can also have other positive effects that are supported by scientific literature, such as improved cell regeneration, lowered blood pressure, accelerated wound healing, decreased recovery times, and pain reduction.

SunLED® is a technology that can bring the sun inside and provide users with a healthy and pleasant indoor environment. SunLED® is based on scientific evidence and has been clinically tested to ensure its safety and efficacy. SunLED® is a technology that can improve the quality of life of users by providing them with the healthiest aspects of sunlight.

For the company's clinical study, visit https://www.mdpi.com/2079-7737/12/1/60.

For more information, visit https://www.seaborough.com.

### New outdoor "Moony" Moody floor lamp by Marcantonio for Karman

When you're in a bad mood and would like to change it, all you need to do is move Moony, which reflects different moods.

In the garden, on the terrace and in any outdoor space, Marcantonio's Moony floor lamp knows how to show its best face by adapting to emotions thanks to its flexible arm.

It rises to the sky or bends to moments of reflection, directs away from itself or moves closer to see better.

Its movable metal stem covered with a white cloth stocking supports an opaque white PMMA globe that carries the LED source.

The concrete hemisphere base carries two heights for Moony floor lamp.

Materials: Light grey cement

Dimensions: Base diameter cm 24/ H max floor light cm 245 / Low floor light H

max cm 145

Sources: E27, 1x max 18W LED

Karman presented Moony at the Light+Building 2024 fair in Frankfurt from 3 to 8 March 2024.



# ProTools Cylinders: A new family of lighting products from Whitegoods



Inter-lux supplements its wide selection of Whitegoods downlights to include cylinder shapes. Inter-lux is pleased to introduce ProTools Cylinders, a complete family of round and square cylindrical downlights that can be surface, suspended, and wall mounted.

Available in 2.4", 4" and 5.5" sizes, these luminaires are equipped with a wide range of beam angles, lens options, and wall wash to fit a multitude of applications.

A few more notable features of ProTools Cylinders:

- · High lumen output and excellent color rendition.
- UGR < 19 for some configurations to comply with WELL requirements.
- WL Wet Location (IP65) optional on some models.
- 92+ CRI, 2 step MacAdam Ellipse LEDs standard for Static White and Warm Dim (1800K -3000K).
- 95+ CRI optional or Static White.
- Long life L70 55,000 hours based on LM-80 & TM-21 applicable test data.
- Flicker-free constant current drivers.
- 0-10V, Phase, Lutron, DALI, and DMX dimming options.

"Designers need lighting in a variety of shapes and sizes to help them create unique spaces for their clients. Our ProTools Cylinder family provides even more lighting options with the Whitegoods quality and performance they rely on," says Mark DeVries, CEO.

### Elation colour innovation on display with new SIX+ PAR series

A vailable with either 7x or 14x 20W RGBLA+UV LEDs, the SIX+ PAR offers the ultra-wide colour spectrum, outstanding colour rendering and high CRI (93) that exacting designers demand. The carefully engineered optical system guarantees that beautifully homogenized colour distributes evenly and with no colour fringing, from high-fidelity whites to intense primaries and virtually every shade inbetween. Furthermore, they house the same LED engine as Elation's new SIX+ BAR series for a perfect colour match.

At 3200 lumens for the SIX+ PAR S and over 7000 lumens for the SIX+ PAR L, these indoor/outdoor PAR colour changers punch well above their weight. To expand the colour capabilities of the SIX+ PAR further, precise colour temperature control via a dedicated variable CCT control channel has been integrated with adjustments capable from 2400K - 8500K. A CMY Emulation mode plus an integrated library of calibrated colour presets that match the most popular gel filters have also been included.

The SIX+ PAR's durable housing includes a dedicated diffusion lens holder with an optional gel frame holder available that can accommodate industry-standard 7.5" (S)/10" (L) accessories. Beam angle is 12° with a 22° lens included that allows them to match seamlessly with existing SIXPAR fixtures. Other optional lenses are also available. SIX+ PAR luminaires house an electronic dimmer and strobe and are capable of smooth dimming from 0-100 percent with excellent stability throughout the range. A selection of 16-bit dimming modes and curves are also included.

### Seamless integration with original SIXPAR fixtures

To ensure the SIX+ PAR can be integrated seamlessly alongside original SIXPAR fixtures, great care has been taken to ensure that the new LED array colours match the original. A unique DMX mode has been created for SIXPAR emulation, enabling seamless control of the new fixtures using the identical DMX mapping as the original. The colour mixing has also been calibrated to virtually emulate the White LED included in the original SIXPAR array, and an output



limit master setting has been added so the new lights don't overpower any older fixtures in the rig.

#### Versatility

Useful for any production that requires the magic and allure of colour and easily integrated into installation applications, the SIX+ PAR serves as a highly versatile wash light, uplight, wall wash, key/front light, truss warmer and more. A robust IP65 rating makes these compact and rugged LED fixtures go-to workhorse colour-changers for both indoor and outdoor events. Its marine-grade coating makes them safe to use in harsh coastal environments, while the fanless cooling system ensures silent operation for noise-sensitive settings. In addition, remotely variable LED refresh frequency allows them to be easily integrated into any broadcast application.

With a dual yoke design, mount them on the floor or effortlessly rig them to hang using a c-clamp or the included omega bracket receiver. The fixtures also feature proprietary Aria x2 wireless device management for simplified system setup and maintenance.

Harmonizing the latest in LED colour technology with refined design, the SIX+ PAR is set to shine anywhere a high output, small form factor, and easy deployable PAR light is required.

# LED tronics unveils cutting-edge LEDG12 series CFL replacement LED lamps

EDtronics®, Inc. announces the Lexpansion to its family of CFL and halogen replacements with 10 and 15-watt LED lamps that similarly offer omnidirectional illumination, but with much higher luminosity and CRI – all achieved at a considerably lower wattage.

The UL/cUL listed LEDG12 series directly replaces compact fluorescent

lights in fixtures with dual-pin G12 base, with ballast bypass when appropriate. Both lamps are rated for input voltage of 100~277 VAC, and provide a 360-degree omnidirectional, no-shadow illumination of 6000K pure white light.

At the same time, they offer energy savings of up to 70 percent over CFL, incandescent, metal halide and halogen lamps – The 10W LED unit replaces 21W T12CWFL; 17W T8FL; 23W CFL; 75W INC and 75W tungsten quartz. The 15W lamp replaces 50W Pulse Start MH; 18W LPS; 35W HPS; 36W T12CWFL; 17W T8FL; 32W CFL; 100W INC and 100W tungsten quartz.

The LEDtronics series of LED lamps replace CFLs in all applications

product showcase 51

in indoor decorative lighting in globes and lanterns, such as accent and display lighting in showcases, picture lights, cabinet lighting fixtures, desk lamps; street, warehouse and garage lighting; passageways, offices, hotels, restaurants, museums and galleries; security lights; theatrical effects lighting; tubular bulbs for one-sided exit signs, and tubular appliance bulbs, among others.

Depending on their wattage, the lamps provide 1317 or 1960 lumens of light and maximum candela of 142 or 216 cd, with a high colour rendering index greater than 83. This translates to a luminous efficacy of 153 to 155 lumens per watt. In addition, they boast a power factor of 0.99. They weigh only 2.6 ounces and come with a white polycarbonate base; they also offer universal burn position – no burn position restriction.

The solid-state, rugged design of the LEDtronics LEDG12-XPW-101A bulbs renders them impervious to electrical/mechanical shock and vibration, frequent switching and



environmental extremes. They operate in a flexible temperature range of ~-20°F to ~+40°F while producing no UV or RF interference, low IR and minimal heat.

The new UL-listed LEDtronics CFL-replacing LED lamps come with an unconditional three-year U.S. factory warranty, and can be ordered through LEDtronics distributors; quantity discounts are available. Other colour temperatures — 2700K, 3000K, 4000K, higher than 6000K; dimming and other voltage options are also available for qualified volume offers.

### ETC introduces high end systems Ministar

ETC is thrilled to introduce the High End Systems Ministar, a game-changer in its automated lighting product line. Ministar brings exceptional versatility and performance at an affordable price point; with a compact footprint, punchy output, and a professional feature set, Ministar fits the spec and budget for small to medium-sized venues.

Automated Lighting Product Manager Matt Stoner dives into key features that define the Ministar. "What sets this fixture apart are the dual colour wheels that create the VersaColor technology, offering a spectrum of 60 pure and elegant colours that are accessible via a single channel. This empowers users to create beauty with an extensive range of colour options."

Complementing the VersaColor is QuadraTech, an innovation that harnesses the power of four colours within the projection. Matt Stoner elaborates, "QuadraTech revolutionises the creation of stunning visual effects, both in washes and aerials, offering a unique edge that sets the Ministar apart. This technology unlocks a realm of beautiful colour combinations that are easy to use, and provide unique projections and aerials."

Ministar uses a 300 W custom LED to generate an impressive output exceeding 9,700 lumens. Its feature package includes dual pattern wheels for gobo morphing and textural manipulation, variable frost for softening edges and washes, a prism to elevate theatrical applications and create breathtaking aerial effects, and swift pan & tilt functionality for dynamic



movements. Notably, its ingeniously engineered 6.5° - 48° zoom function is housed within a remarkably lightweight 16.2 kg/35.7 lbs design.

Tania Lesage, ETC's Market Manager, outlines the Ministar's position within ETC's lineup, emphasising its outstanding performance and reliability. "The Ministar exemplifies ETC's commitment to industry-leading innovation while remaining cost-effective. It heralds a new era in lighting solutions, empowering professionals with budget constraints to elevate their creativity without compromise."

### DW Windsor announces new range of solar lighting solutions

Leading exterior lighting solutions provider DW Windsor has unveiled a range of sustainable solar lighting solutions designed to support a variety of lighting applications, including car parks, footpaths, cycleways and parks.

The new range includes several off-grid lighting options, from standalone solar bollards and solar lanterns with integrated panels to modular solar systems compatible with the manufacturer's existing luminaire range.

With no need for cabling or connection to the grid, the solar-powered solutions can deliver illumination wherever it's needed. This makes them ideally suited to remote areas with no access to power or anywhere that cable trenching would be financially prohibitive or overly disruptive – such as conservation areas or places of special environmental interest.

The launch comes at a time when local authorities and businesses are under increased pressure to reduce their carbon footprint while also facing rising energy prices. With zero emissions and no ongoing electricity costs, solar lighting offers a commercially feasible alternative to traditional mainspowered lighting.

DW Windsor's solar lighting range has been developed using the latest solar technologies and the highest quality materials and components to ensure exceptional product quality and performance standards.

Monocrystalline photovoltaic panels and lithium iron phosphate (LiFePO4) batteries are used across all products to deliver greater panel efficiency and increased longevity. Advanced lighting controllers are also fitted to optimise



battery life, while motion sensors help manage light levels, providing consistent illumination during hours of darkness. The release also comes after a period of extensive testing to ensure suitability for the UK climate.

Mitch Waite, Senior Product Manager at DW Windsor, said: "Our new solar-powered lighting range perfectly complements our existing luminaire portfolio, helping to bolster our offering of energy-efficientlightingproducts. Solaris a great solution for off-grid applications without access to power or for organisations looking to reduce their annual electrical bills and cut carbon emissions."

Esther Newton, Sales Director at DW Windsor, added: "At DW Windsor, we take a holistic approach to solar lighting projects. Our experienced team is on hand to support customers throughout the product specification and lighting design phase of any scheme to determine if solar is the right solution for your project needs."

# Inventronics unveils industry's first DALI+ certified wireless LED driver



The first DALI+ certified LED driver comes from Inventronics. Source: Inventronics

Inventronics presented the first DALI+ with Thread certified wireless LED drivers at trade fair Light + Building 2024. Harnessing the advantages of the DALI-2 standard for lighting, DALI+ extends its features and benefits to the wireless realm. The DALI+ wireless network is based on the IEC 62386-104 standard and employs the same DALI language, features, and data. This will enable the seamless integration of DALI-2 wired and DALI+ wireless devices in the same installation.

The DALI Alliance, the global industry organisation for DALI, has recently launched its DALI+ certification program, ensuring cross-vendor interoperability. DALI+ represents the standardized wireless protocol of the future, aiming to defragment the wireless landscape dominated by proprietary solutions and thereby opening new horizons for the lighting industry.

Inventronics' newly introduced wireless LED drivers mark the first DALI+ drivers certified by the DALI Alliance. This certification guarantees that the drivers seamlessly integrate and interoperate with other DALI+ products. Key features of Inventronics' wireless LED driver include enhanced connectivity, superior energy efficiency, and individualized control capabilities.

"By pioneering the first DALI+ certified wireless LED driver, we drive innovation and emphasize our dedication to promoting open standards and interoperable products," says Dr. Gernot Steinlesberger, CEO business unit Digital Systems.

For more information, visit www.inventronicsglobal.com.







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