



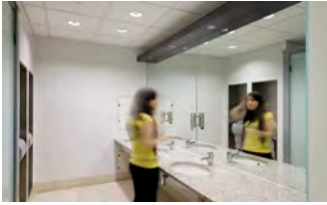
Case Study

Tower 42

Location
Philips Lighting

London, UK
LED Lighting

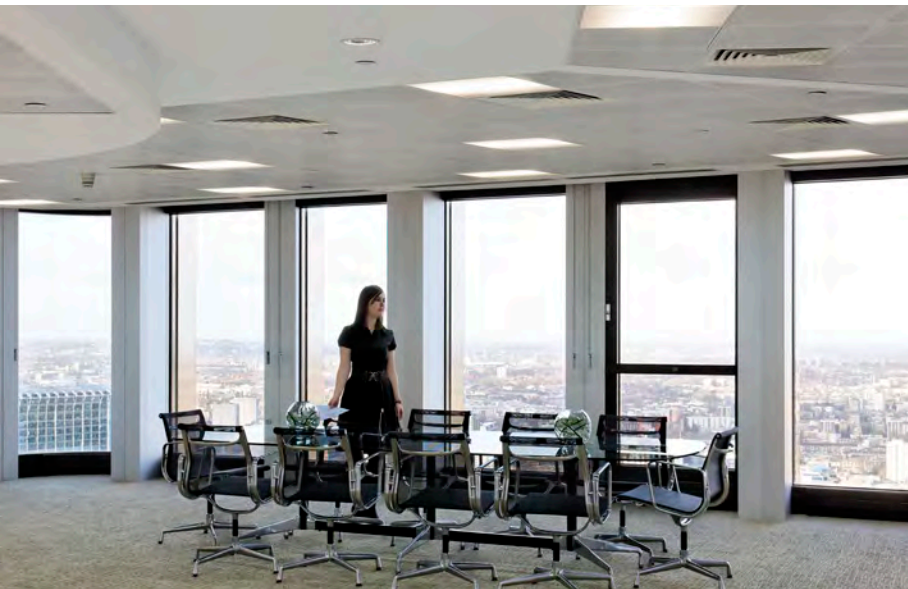
PHILIPS



Tower 42 has taken the opportunity to introduce energy performance features and reduce its carbon footprint through extensive investment on Level 12, relating to c. 9,000sq ft of office space



Philips Lighting and London's Tower 42 celebrate a LED first for UK office building



Fast Facts

Location

London - UK

Installed Lighting System

Savio remote phosphor LED light fittings

LuxSpace Mini

Light Master Modular (LMM)

Project in Partnership with

Tower 42

BNP Paribas Real Estate

Philips Lighting

Background

The occupants of one of London's most prestigious office buildings, Tower 42, are to benefit from significantly lower energy consumption thanks to the application of the latest energy-efficient LED lighting solutions from Philips. As a result, Tower 42 now features the UK's first office space to be entirely illuminated by LED lighting - achieving a significant energy saving of around 40% over more conventional technologies.

Tower 42 is the tallest building in the City of London, the financial heart of Britain's capital city, and has called upon Philips' expertise to provide an impressive example of sustainability and the highest quality lighting solution, perfectly aligned with the ethos of Tower 42 itself, in offering tenants an attractive and comfortable place to work. The Philips installation, on Level 12 of Tower 42, is the result of the building owners' own determination to offer tenants the very best commercial premises, while ensuring environmental responsibilities were upheld. In addition, being situated in the heart of London.

Solution

The latest Philips advances in LED lighting solutions can address these needs, delivering a 'triple win' for the environment, the building's occupants and its owner. Tower 42 took all these aspects into consideration, employing Philips customized Savio remote-phosphor LED luminaires and Philips' Light Master Modular lighting controls – both contributing to reducing the energy consumed in lighting an office space spanning more than 800 square meters (approximately 9,000sq ft).

"We are committed to minimising our environmental impact, while maintaining the quality and high standard of the office facilities we provide. Prospective customers are also looking at energy performance more closely," explained Tower 42's Building Services Manager John Gentry. "Consequently, we evaluated a number of options for the lighting on Level 12 and the combination of LED lighting and controls proposed by Philips offered the best overall energy performance and life cycle costs," he added.

In tailoring the lighting solution to the space, Philips worked closely with Tower 42 and managing agents BNP Paribas Real Estate to arrive at a solution that would address commercial, aesthetic and environmental imperatives.

"Philips created a mock-up of the proposed fittings in the space and we invited comment from a number of stakeholders. They proved to be very adaptable and responsive to the feedback and this led to the production of a customised version of the Savio fitting," John Gentry recalled.

The popular 600mm x 600mm Philips Savio fittings, originally developed for use with fluorescent light sources, were adapted and optimized for use with 3 x 18W Fortimo LED light sources to create an edge-to-edge lighting appearance with a uniform and comfortable 'surface of light'.

Savio luminaires feature a patented micro-lens optic to ensure optimum light distribution and full glare control, compliant with the highest standards for office lighting. The evenness of the lighting is further enhanced by the innovative design of the Fortimo light source, which uses a combination of high efficiency blue LEDs with a separate phosphor plate to generate a bright white light with an efficiency of 62 lm/W. The Savio fittings are complemented by LuxSpace mini LED downlights in circulation areas and deliver a light output equivalent to 2 x 18W compact fluorescent lamps with a 50% energy saving.

All of the lighting is controlled through a Philips Light Master Modular (LMM) lighting management system using DALI (digital addressable lighting interface) protocol so that all luminaires are individually addressable. Multi-sensors are used in the spaces to provide both dimming in relation to daylight levels and occupancy detection with corridor linking. Occupants will also have the ability to control their own lighting using infra-red remote control units.

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"We are delighted with the end result. The lighting has helped to transform Level 12 whilst making significant energy savings and reducing our maintenance costs through greatly extended lamp life. We will certainly be considering the same solution, when the opportunity arises, for any further office refurbishment and investment planned at Tower 42." John Gentry concluded.



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