DALI Lighting System for Manchester Airport, Terminal 2

LOYTEC Technology saves money and protects the environment

In terminal 2 of Manchester Airport, a new and modern DALI Lighting System was installed. Equipped with LOYTEC components, the highly efficient system allows annual savings of approximately 3,000 MWH.

Responsible for the implementation was the British LOYTEC systems integrator Calon, who integrated the modern DALI lighting system with constant light control and occupancy detection, in cooperation with the company Building Environment Controls.

The lighting system is integrated in the airport’s building management system (BMS) and flight control systems via BACnet. This allows automatic configuration at each gate according to the flight departure and arrival schedules, time of day, and ambient light level.

The integral solution includes the following features:

- Daylight and occupancy based lighting control
- Connection to the airport’s “Flight Information System”: The information regarding occupied gates is sent to the DALI lighting system. The set point is raised for occupied gates whereas it is lowered for currently unused gates.
- “Maintenance-free” due to the use of LED technology

The results in terms of energy savings are impressive. The more efficient luminaires that are used in the new lighting system, allow replacement savings of approximately 2,000 MWh annually. In addition, 1,000 MWh can be saved because of the automatic control functions of the installed system.
Projects for lighting control of the public areas of Terminals 1 & 3 are already in the planning stage.

**Photo Captions:**

**Picture A:** Manchester Airport, Terminal 2
Photo credits: Manchester Airport

**Picture B:** Manchester Airport, Check-in hall
Photo credits: Manchester Airport

**Picture C:** the lighting control of the departure gates
Photo credits: Manchester Airport

**Picture D:** the main menu of the lighting system
Photo credits: Manchester Airport
About LOYTEC:
Founded in 1999, LOYTEC electronics GmbH today ranks among the leading European providers of intelligent network infrastructure products for building automation. There, LOYTEC exclusively relies on open and standardized communication protocols. LOYTEC develops, manufactures, and distributes router and gateway solutions, embedded Automation Servers and I/O Controllers, the room automation system L-ROC, DALI lighting controls, and also graphical user interfaces in the form of touch panels or via PCs or mobile devices. The primary focus is on network solutions for buildings and real estate. Methods provided are a secure remote access through the internet, notification, and of course functions for data acquisition, information visualization, and data storage.

Product development and manufacturing are located at the Austrian headquarters in Vienna. Particular emphasis is laid on careful and top-quality execution. LOYTEC is certified according to ISO 9001 since 2004. In addition, the company has branch offices in France (software development) and Germany, (sales) and subsidiaries in the USA and Asia. LOYTEC supplies to more than 80 countries around the world. The export rate is 98 %. Strong partnerships with leading industrial companies and intensive research work in cooperation with universities result in innovative products for customers all around the world. Numerous national and international awards confirm the run of success of this Austrian high tech provider.

LOYTEC products are found in projects like the California Plaza Parking Garage in California, the City of Chandler in Arizona, the St. Louis Zoo in Missouri, the Sony Corporation (Sony City Osaki) in Tokyo, the Iberdrola Tower in Bilbao, the Uniqa-Tower or the T-Center in Vienna, the main train station and the German parliament (Reichstag) in Berlin, the Esprit Arena Düsseldorf, one of the most modern multifunctional stadiums of Europe, the Rheinhallen/RTL-Studios in Cologne, the biggest cruise ship of the world, the "Oasis of the Seas", the fair center Jaarbeurs Utrecht in the Netherlands, Il sole 24 ore, the headquarters of Italy’s leading financial magazine in Milano, the Governor Rockefeller Empire State Plaza in Albany/New York State, the world’s most spectacular sport arena, the Dallas Cowboys Football Stadium in Arlington/Texas, the Wangjing International Commercial Center, the China Reinsurance in Beijing and many others.
We gladly send you further information and visual materials on request.

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