



# Oxford John Radcliffe Hospital Atrium LED Lighting Replacement

## The Challenge

The hospital's Atrium area presented significant challenges with its fluorescent lighting system. One major concern was the maintenance risk, as operatives had to work at height twice a year to replace the lights using a cherry picker, which posed a risk to the delicate underfloor heating system. Additionally, the materials used were becoming obsolete, with fluorescent lamps set to be banned from sale in September 2023. Finally, cost was a factor, as replacing 49 lights in April 2022 amounted to £6,000 in total. These issues highlighted the need for a more sustainable and cost-effective lighting solution.

## Our Solution

Equans UK & Ireland researched a solution with the world's leading LED lighting company to replace 234 lamps in the atrium with LEDs, at a maintenance saving of £12,300/yr (first 3 years). This not only reduced costs but also provided a more energy-efficient, sustainable lighting solution for the hospital, ensuring long-term operational benefits.

## Project Overview

The programme of works spanned over a month, with five stages:

1. Nightly setup: boarding for the cherry picker
2. High level: the removal of current high-level atrium lighting and replacing it with a new LED setup
3. Low level: replacement of lower-level walkway lighting
4. Sign off: handover to all O&Ms
5. Disposal: old lights placed in plant room for the Equans on-site team to dismantle

## Benefits

The delivery of a new lighting solution has delivered several key benefits for both the Trust and Equans, ranging from energy savings to improved safety and visitor experience:

- 50% energy saving for the Trust
- 2.2 year ROI for Equans for the reduced maintenance needed
- Reduction in high-risk maintenance of using a cherry picker

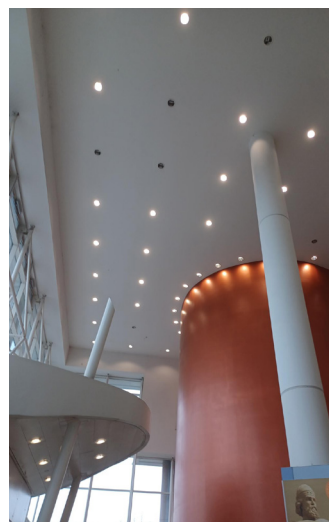
on delicate flooring

- 10,200kg CO2 saved – equivalent to 12 acres of forest sequestering
- Improved visitor experience, with a more welcoming entrance at night

"This project is an important step to help the Trust reduce its energy requirements and supports our long-term sustainability strategy. Equans worked closely with the Trust to ensure the project was delivered very timely and with little disruption to a very highly trafficked atrium." - **Dr Keith McNally, PFI Estates and Projects Director**

- **10,200kg CO2 Saved**
- **234 light fittings converted**
- **50% energy saving for the Trust**

**Before**



**After**

