

# How Lighting Upgrades Can Benefit Your Healthcare Facility

**WESCO®**  
LIGHTING SOLUTIONS

*On average, lighting accounts for 16% of a hospital's total energy consumption and over 40% of its total electricity usage. Areas like waiting rooms and hallways are often active 24/7, making lighting a key priority for every healthcare facility. In spite of this information, a lighting upgrade can often seem like a daunting, expensive undertaking leaving decision makers perplexed.*

*In many instances, a lighting upgrade or retrofit project can be tackled quickly, showing rapid ROI due to provincial rebates, financing opportunities and efficient lighting design. In addition to improving energy consumption, taking advantage of opportunities for improvements on a large or small scale also go a long way in improving dedicated labor time, sustainability goals, patient wellness and worker productivity.*

## **Improvements and Savings in Energy Consumption**

New lighting fixtures and lamps, such as advanced LED offerings, allow facilities to operate with less wattage while achieving the same level of brightness. In healthcare facility common spaces that operate around the clock, retrofits provide key opportunities for energy savings. Facilities using fluorescent lighting can see 50% or more savings in wattage usage by switching to LED and an 80% reduction when using controls. By utilizing a range of solutions and technologies, such as T5/T8 fluorescent, LEDs, induction, controls and intelligent lighting, facilities create strategic opportunities to reinvest the resulting short and long-term savings and maintenance time.

## **Decreased Labor and Downtime**

Each time a lamp burns out or scheduled re-lamping occurs a labor cost is incurred. While some organizations may have in-house electricians, many healthcare facilities need to call upon subcontractors to complete this work. In critical areas like operating rooms, changing lamps requires additional labor time to complete full sanitation after the maintenance portion is complete. While the initial cost of acquisition might seem like an obstacle, upgrading to higher quality fixtures and lamps with longer lifespans like LEDs from reputable brands can create a dramatic decrease in overall labor and downtime in facilities.

## **Demonstrated Leadership with Sustainability Practices**

Facilities that opt to use innovative, energy-saving lighting can help meet legislative mandates and demonstrate environmental leadership in their communities. They also directly impact their stakeholders by making cleaner, more responsible energy choices. For healthcare facilities

in particular, recognizing the need for resource conservation and climate protection are key.

RoHS compliant recycling programs can be used to help safely dispose of lighting products in instances where the lamps or fixtures contain mercury. LEDs are mercury-free and create less waste due to their longer lifespan.

## **A Better Patient and Staff Environment**

Several studies have shown that optimized lighting has multiple benefits in healthcare facilities, including:

- Accelerated patient recovery time
- Decreased anxiety in patients and employees
- Increased productivity

For many people, visiting a healthcare facility can be stressful. Lighting can make a positive difference across the board, whether for family members sitting in the waiting rooms for hours, or for patients confined to their beds for weeks on end, or more.

A skilled lighting designer can work with stakeholders on your team to determine the right level of light for each unique space in your facility. Eyestrain and increased stress levels can result from lighting that is too bright, while stimulation of hormones that cause sadness, fatigue and even depression can result from lighting that is too dim. In addition, inadequate or faulty lighting such as flickering fluorescents can distract worker's attention, or disturb patient's recovery due to bulb outages and maintenance interruptions.

A lighting strategy planned around providing sufficient ambient and natural lighting create a calming, welcoming environment that encourages a healthy sleep-wake cycle, improves moods and lowers fatigue.

*Considering there are thousands of fixtures and lamps within a hospital environment, the opportunity exists for a lighting strategy that provides benefits beyond technical improvements and energy savings. An incremental upgrade or retrofit strategy can tie in solutions for key concerns facing healthcare facilities managers and directors alike— economics, sustainability and technology advancement.*

*While there typically isn't a single factor that measures the success of a lighting renovation, an analysis of improvement spanning multiple solutions for each project allows stakeholders to show value in many areas. While energy reduction and savings are a great place to start, overall advancement of the facility and improvement of the quality of lives spent within it is even better.*