# The Real Cost of Ownership for Infection Prevention Technology

The COVID-19 pandemic put infection prevention on the forefront of everyone's mind. As a result, hospital leaders drew a lot of attention to technologies to support cleaning processes. However, infection prevention practitioners would echo that technology itself is not the answer. While the latest in cleaning technology is an excellent consideration for specialized situations, there are many implications for labour, efficacy, and finances. We'll review some of those considerations in the article below, and provide helpful questions to ask as your hospital reviews new technology purchases.



#### **Before You Purchase**

In hospitals, cleaning technology complements the outcomes of manual cleaning and adds a layer of reliability, especially in hard-to-reach crevices or for critical areas. One study showed that after four rounds of manual cleaning and disinfection with a bleach solution, 25% of rooms were still contaminated with pathogens.

Protecta®, an environmental services (EVS) program from Sodexo Healthcare, has proven to be an effective foundational program to combat hospital-acquired infections (HAIs). In one year, North American hospitals experienced a 53% reduction of *C. diff* infections and a 70% reduction

of MRSA infections. Cleaning technologies such as UV-C disinfection or hydrogen peroxide vapor can be included in your hospital's EVS program to help fight HAIs.

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Results After One Year of



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#### Cost

Cost is one aspect of a technology purchase to consider, but there is much more to evaluate than the price of the equipment itself. Taking into consideration the full spectrum of infection prevention nuances, time, productivity, and training will help your hospital understand the full price of owning the technology and make better informed decisions on whether it's right for you.

Since UV-C light isn't able to break through biofilm, your EVS program still needs to include diligent manual cleaning with chemical disinfectants that can break through and eliminate pathogens.

Otherwise, UV-C light will simply bounce over the pathogens within biofilm.

Areas that are obstructed cannot be reached by the light, so the UV-C machine will require movement and several cycles to completely irradiate the room. It takes time to set up the room with technology, so compute the time needed to ensure hard-to-see areas are visible to be effectively cleaned.

One small outbreak with a total of **40 cases** cost one hospital over \$1 million



## What Types of Technology are Available?

When your hospital is considering a technology purchase, there are many options available, but identifying your hospital's goals will help you find the solution that you really need. In addition to decreasing costs by reducing HAI rates, the technological advancements can also improve productivity for EVS and clinical staff members. Disinfection adds a layer of reliability to manual cleaning, especially in areas such as ICUs, burn units and ambulances. Some of these solutions include:

#### **Hydrogen Peroxide Vapor:**

Sterilant **eliminates** viruses, spores, fungi, and bacteria in **enclosed spaces** including operating rooms, burn units and ICUs.



## **UV-C Technology:**

UV-C technology is a **chemical-free option** proven to be **20X more effective** than manual cleaning alone.



## What to Ask When Considering IP Technology Purchases

As you get closer to making your technology purchase decision, work with your infection prevention practitioners to determine the needs of your specific hospital by asking:

- What additional labour will be required to use and maintain the equipment?
- How many pieces of the equipment will we need to make an impact?
- What goals can be reached through this purchase?
- How will this purchase help transition some of our cleaning practices to be more environmentally friendly?
- In which units of the hospital is this technology needed most?
- What staff will need to be trained on using this technology?

Successful infection prevention practitioners are boldly choosing innovative EVS components, processes and solutions to arm their hospitals with solutions to keep HAIs at bay and improve their ability to care for patients. Technology is one component of a comprehensive approach to infection prevention that requires a diligent decision-making process.

