

Applied Silver is a company dedicated to using the power of silver to develop commercial applications for a cleaner, healthier world.

Applied Silver provides solutions to mitigate the rising risk from contaminated soft surfaces to help maintain the cleanest possible environment. The Silicon Valley based team of nationally acclaimed engineers, scientists and business leaders pioneered a breakthrough technology called SilvaClean® – the new standard for textile care that is patented, EPA-approved, and eco-friendly.

SilvaClean is a transformative antimicrobial textile treatment and the first ever residual antimicrobial laundry additive for reducing post-laundry contamination. As a unique, inexpensive intervention for soft surfaces, SilvaClean textile treatment can be recommended as a helpful addition to hospitals and sports infection control programs. SilvaClean treatment augments existing laundry processes with active antimicrobial properties effective anytime a microbe touches the textile: in storage, during handling and in use.

In a world filled with soft surfaces (textiles) the application possibilities of SilvaClean technology are limitless. Virtually any soft surface can be made cleaner and more hygienic – and can stay that way for longer – because of SilvaClean's residual antimicrobial capabilities.

# The problem

More than 45 published articles demonstrate that:

- Linens harbor bacteria, mildew and mold for months – prior to, during and after use.
- Contaminated linens have been shown to spread bacteria, mold and mildew throughout the hospital environment.
- Infection control practices are expensive to implement.

# The SilvaClean solution

- Inexpensive addition to infection control.
- SilvaClean® remaining in linens will reduce levels of *Staphylococcus aureus*, *Candida albicans*, *Klebsiella pneumoniae*, Vancomycinresistant *Enterococcus faecalis*, Extendedspectrum beta-lactamase positive *Eschericia coli*, *Acinetobacter baumannii* Methicillin-Resistant *Staphylococcus aureus*.
- Works on all existing textile inventory.
  Automated, passive intervention that does not require a change to existing linen management workflows



# Reduce Post-Laundry Contamination with SilvaClean® Antimicrobial Laundry Additive

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# Residual protection

Current laundering processes are only designed to clean soil and contamination on textiles at the point of laundering. When linens are being used, SilvaClean® remaining in linens will reduce levels of *S. aureus* and *C. albicans* by 99.9% after 6 hours of contact; *K. pneumoniae*, Vancomycin resistant *Enterococcus faecalis*, Extended-spectrum beta-lactamase positive *E. coli*, and *A. baumannii* by 99.9% after 3 hours of contact; and Methicillin-Resistant *S. aureus* by 99.9% after 9 hours of contact.

1. Nursing and physician attire as possible source of nosocomial infections, Wiener-Well, Yonit et al., American Journal of Infection Control, Volume 39. 2. Microbiological contamination of bed linen and staff uniforms in a hospital, A. Pinon, J. Gachet, V. Alexandre, S. Decherf and M. Vialette, Advances in Microbiology, Vol. 3, 2013. 3. Trillis F., 3rd, Eckstein E., Budavich R., Pultz M., Donskey C. (2008) Contamination of hospital curtains with healthcare-associated pathogens. Infect Control Hosp Epidemiol 29: 1074–1076.



# Tough protection for soft surfaces<sup>™</sup>.

### What is SilvaClean?

- A water-based ionic silver residual laundry additive for reducing post-laundry contamination
- Invisible and odorless, creating no perceptible difference in the look or feel of textiles
- Effective for use on a wide range of textiles
- EPA-approved and patented
- A helpful addition to Infection Control programs

Innovative hospitals using SilvaClean may see:

- ✓ Cost savings
- ✓ Aids infection control
- ✓ Improved patient experience
- ✓ Reduced waste
- ✓ Improved HCAHPS scores
- ✓ Industry leadership

### Proven to protect against post-laundry contamination

Many surfaces in the patient environment are contaminated with bacteria, mold, and mildew

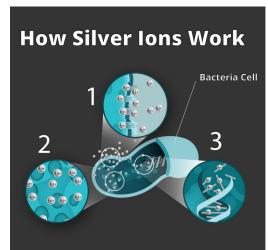
- Linens harbor bacteria, mildew and mold for months prior to, during and after patient use
- Contaminated linens have been shown to contaminate the hands of Healthcare Workers
- Contaminated sheets are proven to spread microbes all throughout the hospital environment

SilvaClean® remaining in linens will reduce levels of *S. aureus* and *C. albicans* by 99.9% after 6 hours of contact; *K. pneumoniae, Vancomycinresistant E. faecalis*, Extended-spectrum betalactamase positive *E. coli*, and *A. baumannii* by 99.9% after 3 hours of contact; and Methicillin-Resistant *S. aureus* by 99.9% after 9 hours of contact.

### How does it work?

SilvaClean uses positively charged silver ions – the most effective form of silver – to create an antimicrobial effect.

The result? SilvaClean enables highly effective antimicrobial textiles to reduce the overall bioburden to protect the patient environment.



- 1. Silver ions bind to suface proteins in bacterial cell wall casuing it to rupture.
- 2. Once inside the cell, silver ions attach to metabolic enzymes, suffocating the cell.
- **3.** Silver ions bind to the DNA and RNA strands, preventing cell replication

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Call today to implement SilvaClean as part of your Infection Control strategy



# **Fact Sheet**

### QUICK FACTS

Founded: 2012

■ Headquarters: Silicon Valley, CA

### INNOVATION

 Industrial silver treatment process, hardware, and consumer products in development

### REULATORY

- EPA registered since July 2014
- First ever residual antimicrobial laundry additive for reducing postlaundry contamination.

### **APPLICATIONS**

- Healthcare
- Sports

### **FUTURE MARKETS**

- Hospitality
- Consumer Goods

"Medical textiles pose a unique cleanliness problem that requires an equally unique solution."

- Dr John Openshaw, M.D. Stanford Medicine Department of Infectious Diseases

#### Mission

Applied Silver is a company dedicated to using the power of silver to develop commercial applications for a cleaner, healthier world.

#### What we do

Applied Silver is the leading provider of innovative solutions using silver. The company pioneered SilvaClean® – the new standard for textile care that is patented and EPA-approved.

- Inexpensive addition to infection control programs.
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- Works on all existing textile inventory.
- Automated, passive intervention that does not require a change to existing linen management workflows.

### The Challenge

Textiles, when contaminated, are implicated in infections. As part of a diligent infection control program, experts recommend that a hospital should seek to reduce or eliminate exposure to pathogens to the greatest extent practical.

### The SilvaClean® solution

SilvaClean is a unique, inexpensive intervention for soft surfaces and can be recommended as a helpful addition to hospitals and sports infection control programs. SilvaClean treatment augments existing laundry processes with active antimicrobial properties effective anytime a microbe touches the textile: in storage, during handling and in use.