

# **Breathable Viral Barrier**

Where protection and efficiency come together

## SAXON SHIELD

### **Breathable Viral Barrier**

### Protection. Comfort. Performance. It all starts with Cotswold

**ViroSēl™** is Cotswold's next generation **Breathable Viral Barrier fabric** that leverages our decades of experience making innovative fabrics that keep medical professionals protected and comfortable.

## Comfortable, breathable, and impervious protection.

ViroSēl™ passes rigorous industry standards protecting you in the most critical surgical environments.

These standards include ASTM 1671\* and ISO 16604\*\* which are used to measure the ability of the fabric to protect against bloodborne pathogens.

Additionally, **ViroSēl™** has a high moisture vapor transmission rate (MVTR) allowing the wearer to remain comfortable and dry during long surgeries.

#### Breathable and impervious. How we do it.

The darker inner layer reduces shadowing and is soft to the touch making it comfortable to wear for long periods of time.



The barrier layer is a breathable monolithic film membrane making it impervious to liquids, viruses, and bacteria. The chemical composition of the film itself allows moisture vapor to pass through it, keeping surgical staff cool and dry.

The outer layer is fluid-repellent and durable.

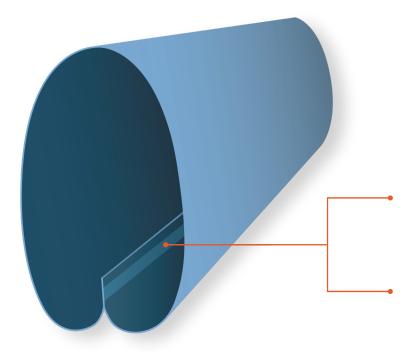
\* American Society for Testing and Materials or ASTM sets international technical standards for a wide range of materials, products, systems, and services. Specifically, the ASTM 1671 test method measures the resistance of materials used in protective clothing to penetration by blood-borne pathogens.

\*\* International Organization for Standardization or ISO creates documents that provide requirements, specifications, guidelines or characteristics that can be used consistently to ensure that materials, products, processes and services are fit for their purpose. ISO 16604 is a test method for measuring the resistance of materials used in protective clothing to penetration by blood-borne pathogens.

## Protection. Comfort. Performance.

## Viruses. Bacteria. Fluids. Cotswold has you covered

ViroSēl<sup>™</sup>, has a specially formulated design that provides the opportunity to create a robust seam seal for highly critical areas. ViroSēl<sup>™</sup> provides the utmost protection and comfort for medical professionals allowing them to focus on what matters the most, the patient.



Our ViroSēI™ technology provides additional protection against liquids and viruses that cause infectious diseases, which ensures the safety of both the surgical staff and their patients.

This fabric can be used to construct an AAMI Level 4\* gown.

Converters will now have the opportunity to seal at a lower temperature which allows for enhanced productivity.

#### ViroSēl™. A high-performing product for everyone.

- Excellent protection against liquids and viruses that cause infectious diseases
- Lightweight, low-noise, and breathable, ViroSēl™ keeps surgical staff comfortable, cool, and dry during long procedures
- Withstands hydrostatic pressures (AATCC 127\*\*) in excess of 100 cm
- Opacity reduces potential for shadowing from fluid spilled on the gown
- Opportunity for a better seam seal for converters

## Protection. Comfort. Performance.

\* The Association for the Advancement of Medical Instrumentation or AAMI Level 4 is the highest level protection for surgical gowns. To be qualified as AAMI Level 4, the surgical gown must have ASTM 1671 level protection in 4 critical zones: front chest, sleeve seam, sleeve, and front belt attachment point. \*\* AATCC 127 Hydrostatic Pressure Test measures the resistance of a fabric to the penetration of water under hydrostatic pressure.

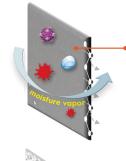
## Monolithic Film vs. Microporous Film

#### **Monolithic Film**

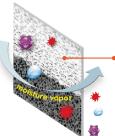
- Non-porous
- Chemical structure of film allows moisture vapor to pass through
- Durable, maintains form under pressure ensuring no compromise in protection

#### **Microporous Film**

- A physical process (stretching) is used in the film to create breathability
- Risk of penetration as the pores get larger creating space, less durable



Complete barrier to liquids, bacteria and viruses



Various degrees of barrier protection against liquids, bacteria and viruses



HIV (120nm)

Phi-X174\* (31nm)



Parvovirus B19 (20nm)

\*Phi-X174 (31nm) is used as the test system for ASTM 1671. Pores must be smaller than 31nm to pass.



These components are not NIOSH or FDA approved. Recommended only for non-critical medical and non-surgical environments. Cotswold takes no responsibility for any critical or non-intended medical use.

For more information please contact:

P: 212-689-3432 info@cotswoldindustries.com

www.cotswoldindustries.com