

# Protection You Can Wear

*GORE® Fabric for Chemical Splash Protection*

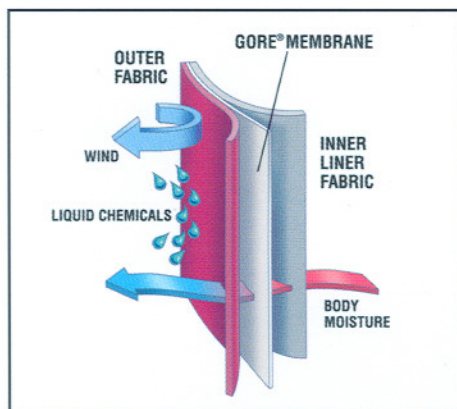


## Protection You Can Wear

*GORE® Fabric for Chemical Splash Protection provides liquid splash protection while maintaining comfort. Clothing made from this fabric allows your body to "breathe", so your sweat can evaporate through the GORE® membrane, providing you with some relief from heat stress. Because it is light and comfortable, it generally can be worn for a full shift without excessive overheating.*

*Vinyl or rubber suits, on the other hand, made from heavily coated materials, are hot, heavy and cumbersome, and they have only one function – protection against accidental contact with liquid chemicals. Workers are uncomfortable in this clothing, and, with prolonged wear, they often become sweaty, sticky, exhausted, and perhaps even disoriented.*

*When you need chemical penetration resistance and comfort, choose clothing made with GORE® Fabric for Chemical Splash Protection for remarkable comfort and all-day protection. Protective clothing made from this unique fabric gives you the time necessary to exit the area and get to an emergency shower in case of an accidental splash with a dangerous chemical.*



## The Technology Behind the Protection

The key to the superior performance of GORE® Fabric for Chemical Splash Protection is the expanded PTFE-based GORE® membrane, which provides liquid chemical penetration resistance and moisture vapor permeability at the same time.

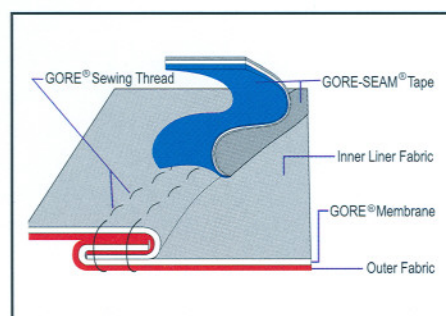
GORE® Fabric for Chemical Splash Protection is a durable 3-layer fabric laminate consisting of an outer fabric, a GORE® membrane, and an inner fabric liner. The outer and inner fabrics protect the GORE® membrane while providing durability, tear- and snag-resistance, water- and stain-repellency, as well as washability and

visibility, important features for working in a chemical environment.

## Sewn and Seam-sealed for Additional Performance

Seams are vulnerable areas prone to chemical penetration. Garments made with GORE® Fabric for Chemical Splash Protection are sewn with GORE® sewing thread, a specially designed thread that is highly thermally stable and chemically inert, which prevents seams from failing during chemical splash incidents.

In addition, garments made with GORE® Fabric for Chemical Splash Protection are seam-sealed with GORE-SEAM® tape to provide uniform performance against liquid penetration.

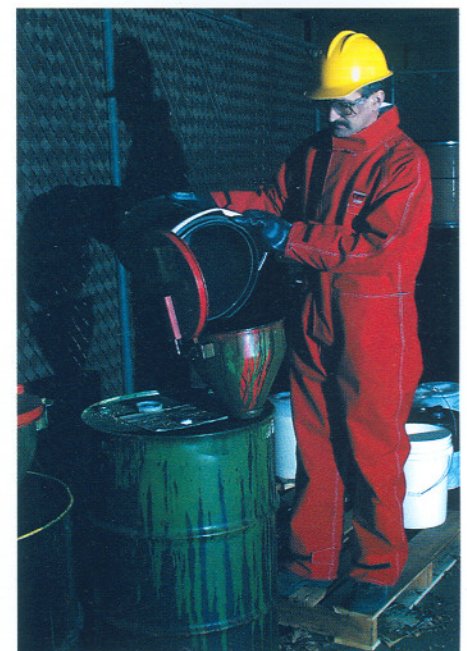


## GORE® Fabric for Chemical Splash Protection Features and Benefits

- Resists penetration of many liquid chemicals. (Refer to the *GORE® Fabric for Chemical Splash Protection – Technical Data and Application Guide*.)
- Breathability reduces heat stress and improves productivity.
- Tough, durable 3-layer laminate provides long-lasting garment life.
- Seams sewn and sealed with GORE™ products provide overall penetration resistance.
- NFPA 1992 compliance assures quality and performance.
- Washability and reuseability decrease costs over time.
- Light weight, comfort and breathability improve usage and worker safety.

## Available in Two Styles

The one-piece coverall and the two-piece jacket and bib overall are available in both

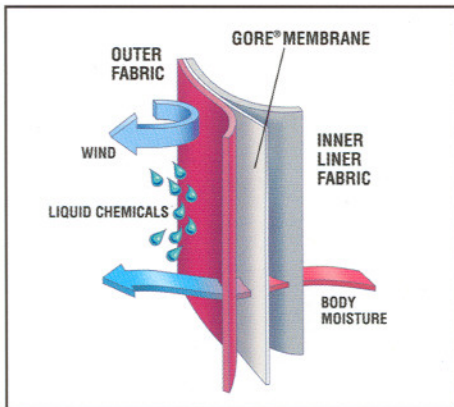


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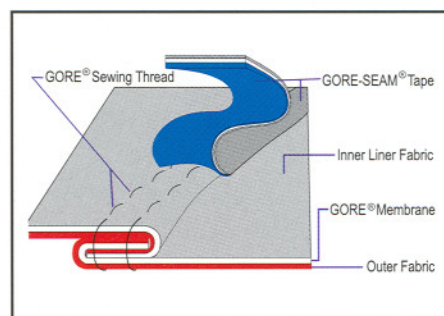
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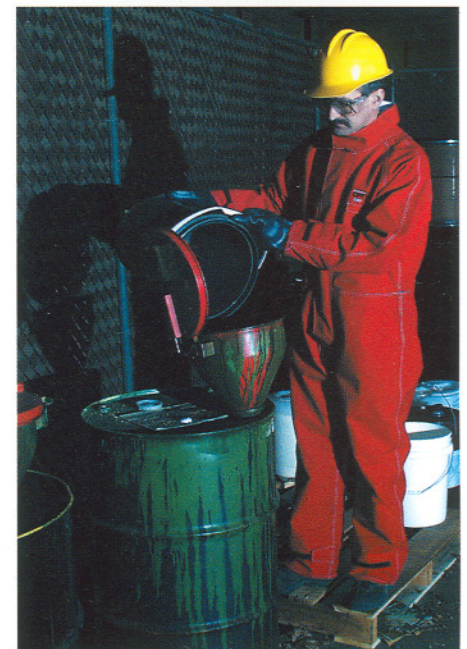


## GORE® Fabric for Chemical Splash Protection Features and Benefits

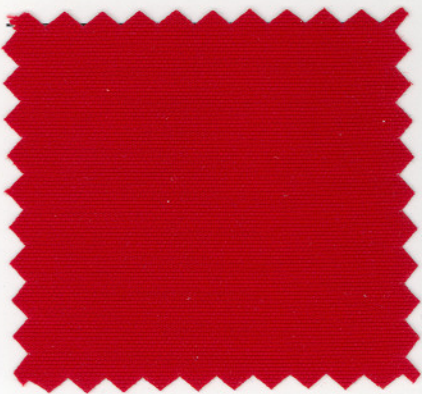
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## Fabric Choices

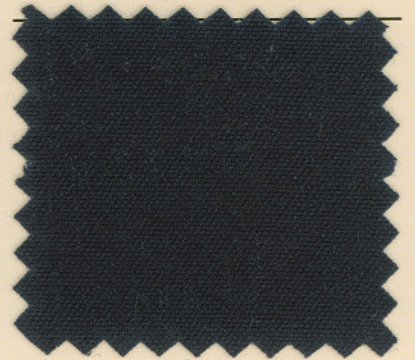


A specially selected red textured polyester oxford outer fabric with a polyester tricot inner liner. Garments weigh approximately 2 lbs, depending on style and size.



For nonflammable performance, a blue Nomex<sup>®</sup> ripstop outer fabric with a Nomex<sup>®</sup> jersey knit inner liner. Garments weigh approximately 2 lbs, depending on style and size.

## Heat Transfer Fluid Option



For heat transfer fluid protection, a heavier weight navy blue Nomex<sup>®</sup> laminate provides the same protection as the other fabrics, plus greater insulation and durability for these high-temperature exposures. Gloves (shown) and companion hoods are also available for heat transfer fluid option garments. Data for this specialized application is available upon request.

the textured polyester oxford and the Nomex<sup>®</sup> ripstop nonflammable fabric.

Available styles, sizes, features, and options will vary with each manufacturer. Please contact Gore for a list of garment manufacturers.



## Meets Material Requirements of NFPA 1992

The National Fire Protection Association publishes standards for chemical protective clothing. One of them is NFPA 1992 (2000 edition) – *Liquid Splash Protective Ensembles and Clothing for Hazardous Materials Emergencies*. GORE<sup>®</sup> Fabric for Chemical Splash Protection meets the garment material requirements of NFPA 1992, and garments made from these laminates have been independently certified to be compliant with this important standard.

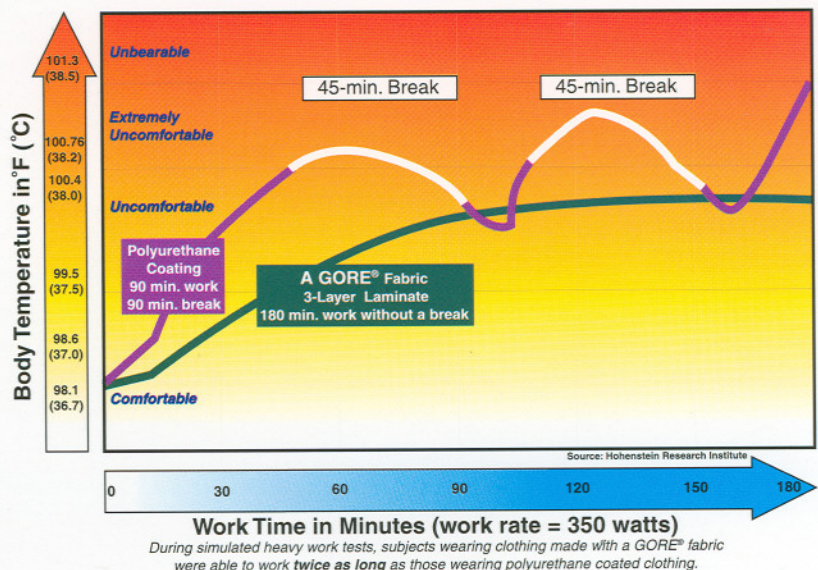
## Increased Productivity

Testing by the independent Hohenstein Institute, as shown below, has demonstrated that working in garments made with a GORE<sup>®</sup> fabric increases productivity dramatically. During the test period, workers wearing conventional non-breathable clothing became so uncomfortable that they needed to take a 45-minute break after 45 minutes of demanding work at 68°F (20°C) and 85% relative humidity.

Since perspiration vapor can't pass through a non-breathable coating, physiological cooling was impeded and, due to retained body heat, the workers' temperatures reached extremely uncomfortable levels. Over the course of the test, the need for breaks became increasingly frequent for workers in the non-breathable garments,



resulting in only 1-1/2 hours of productive work out of 3 hours. Workers wearing garments made with a GORE<sup>®</sup> fabric were able to perform the same type of work nonstop without ever reaching the critical body temperature of 100.76°F (38.2°C). A worker productivity increase of 100% resulted.



## Applications

The primary function of a splash suit is to prevent incidental skin contact with liquid chemicals. Because GORE® Fabric for Chemical Splash Protection is vapor-permeable, it should not be used for protection against any hazardous vapor exposures, or exposures to carcinogens or other health-threatening materials.

Garments made with GORE® Fabric for Chemical Splash Protection are currently used in the following applications:

- Battery manufacturing
- Chemical handling, packaging and distribution
- Dust exposures such as lime, lead, and sand blasting
- Explosives manufacturing
- Food and beverage production
- Hazmat response
- Hazwaste cleanup
- Inorganic chemical manufacturing and distribution
- Metalworking and plating operations
- Mining/leaching operations
- Petrochemical manufacturing
- Potash and phosphate fertilizer application/production
- Pulp and paper processing/production
- Soap and detergent manufacturing
- Tanning

If you have a question about a possible application not listed here, please contact a representative from Gore's Industrial Fabrics team and ask for our *GORE® Fabric for Chemical Splash Protection – Technical Data and Application Guide*.



W. L. Gore & Associates, Inc., *Industrial Fabrics Division*, 297 Blue Ball Road, Elkton, MD 21921

Phone: (410) 392-3700 or 800-431-GORE (4673) Fax: 410-392-4452 [www.gore.com](http://www.gore.com)

*Warning:* No products made with GORE® Fabric for Chemical Splash Protection, including garments, hoods or gloves, can offer absolute protection, even when new, and their protective performance will decline with wear, tear, abrasion, and other damage associated with use. Conditions of use are outside of our control. W. L. Gore & Associates, Inc. makes no guarantee of how the products will perform in actual use.