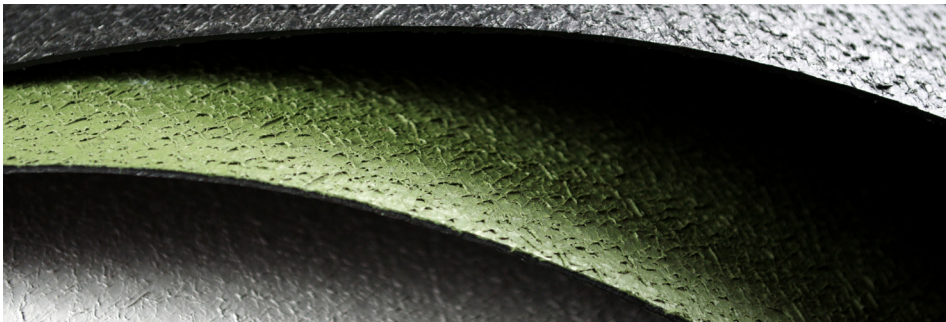


Linear Low Density Polyethylene Geomembranes

GSE UltraFlex geomembranes are produced from high quality linear low density polyethylene (LLDPE) and are designed to meet or exceed the specifications published by GRI for LLDPE geomembranes (GRI GM 17)¹.

GSE UltraFlex products are available in a variety of colors such as green for more aesthetic landfill caps² and white for a solar reflective upper surface³. The upper surface, lower surface, or both surfaces can be textured for use in applications where increased frictional resistance is required. The bottom surface can be comprised of a patented conductive layer to enable liner integrity surveys to be performed following installation of the liner⁴.



[GSE Linear Low Density Geomembranes]

PREMIUM RAW MATERIALS

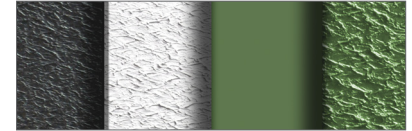
GSE UltraFlex products are manufactured using high quality linear low density polyethylene resins. Carbon black, antioxidants, and UV stabilizers are added to the polymer to ensure long term performance and durability.

BENEFITS OF LINEAR LOW DENSITY POLYETHYLENE

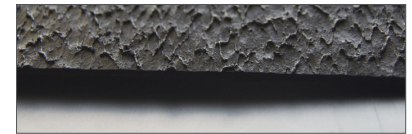
Linear low density polyethylene (LLDPE) is specifically designed to provide superior flexibility. The break elongation and multi-axial break resistance of GSE UltraFlex exceeds that of HDPE geomembranes. The geomembrane's ability deform multi-directionally to relieve stresses in the material enables this product to be ideal for applications where differential settlement is expected such as landfill caps, other closures, and bioreactors.

BENEFITS OF A ROUGHENED SURFACE

A textured geomembrane provides increased frictional resistance that improves the stability of slopes. The ability to use a steeper slope provides cost savings by increasing the capacity of the project. GSE products can be manufactured with a black, green², or white³ textured surface on one or both sides of the geomembrane.



GSE UltraFlex Products



GSE Linear Low Density Geomembranes

LINEAR LOW DENSITY POLYETHYLENE GEOMEMBRANES

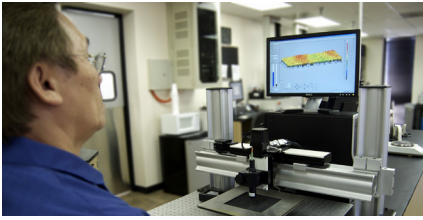
A geomembrane designed for projects requiring increased flexibility and elongation properties.

FEATURES:

- Excellent multi-axial break elongation
- Exceptional flexibility
- Superior geomembrane lifetime
- Superb UV resistance

COMMON APPLICATIONS:

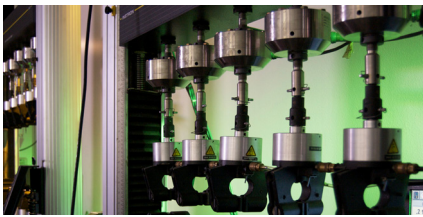
- Additional Flexibility is Required
- Solid and Liquid Waste Containment
- Secondary Containment
- Mining
- Pond Lining
- Closure Applications
- Bioreactors



[Engineered for Durability]

IN-LINE TEXTURING

GSE UltraFlex Textured is manufactured using coextrusion technology – the same technology used by GSE for over thirty years to produce GSE HD, GSE Leak Location and GSE White geomembranes. GSE UltraFlex Textured meets the increasing need for textured LLDPE geomembranes because it is an in-line texturing process. Availability to GSE customers is increased and lead times are minimized.



[Tested for Quality and Durability]

PROVEN RELIABILITY

GSE UltraFlex geomembranes have a long history of reliability and proven performance. In addition to their exceptional flexibility, GSE UltraFlex geomembranes have excellent weldability under a variety of conditions; extrusion and fusion welding can be performed with ease and confidence.

ENGINEERING SUPPORT

The GSE engineering support staff is available to help solve any issues you have with your project. It is comprised of a multidisciplinary group of professionals with knowledge

across a wide range of products and their applications. This includes geomembranes, geosynthetic clay liners, geonets, geocomposites, and woven and nonwoven geotextiles.

CUSTOM FABRICATION

The GSE Custom Fabrication Group builds products to your exact specifications to fulfill any of your project requirements. We have extensive experience in prefabricated polyethylene products and components. A few examples of our custom fabricated products are Aqua Tanks, Quick Containment, concrete protection liners, boots, sumps, pads, pipes, daily covers, temporary containment, and containment booms.

INSTALLER NETWORK

The GSE Installer Network leads the industry with the most experienced, the largest, and the most flexible crews available around the world to meet your installation requirements. Each installer is equipped with state-of-the-art welding and testing equipment to ensure a successful installation. Selecting a qualified installer with the right product knowledge is critical to your success. Let GSE connect you to the right installer to handle your installation project of any size from start to finish.



[Tunnel Application, Germany]

HIGH PERFORMANCE GEOMEMBRANES

For more demanding projects GSE offers High Performance geomembrane products⁵. Contact your GSE representative for more information.

¹GRI GM 17 Specifications can be found on the web: <http://www.geosynthetic-institute.org/grispecs/gm17.pdf>

²Refer to the application sheet for GSE Green Surfaced Geomembranes for more information.

³Refer to the application sheet for GSE White Surfaced Geomembranes for more information.

⁴Refer to the application sheet for Electrically Conductive Geomembranes for more information.

⁵Refer to the application sheets for High Performance GSE Geomembranes for more information.

GSE is a leading manufacturer and marketer of geosynthetic lining products and services. We've built a reputation of reliability through our dedication to providing consistency of product, price and protection to our global customers.

Our commitment to innovation, our focus on quality and our industry expertise allow us the flexibility to collaborate with our clients to develop a custom, purpose-fit solution.

[DURABILITY RUNS DEEP] For more information on this product and others, please visit us at GSEworld.com, call 800.435.2008 or contact your local sales office.

