

THERMOPLASTIC GEOMEMBRANES

WATERPROOFING SOLUTIONS FOR MAXIMUM PROTECTION

BENEFITS:

Superior waterproofing compared to natural materials;

Long-lasting environmental protection, far exceeding the lifespan of the structure;

High chemical compatibility;

Easy installation;

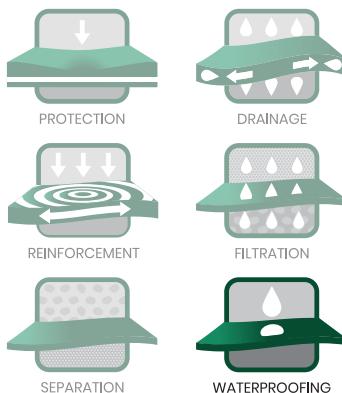
High-level quality control.



The most commonly used thermoplastic geomembranes are made of polyethylene or polyvinyl chloride (PVC). They are specifically designed to meet engineering requirements for waterproofing structures. In addition to providing impermeability, these geomembranes can also address specific needs such as chemical resistance, low-temperature performance, potable water use, and more. Thermoplastic geomembranes are available in a wide range of types, thicknesses, and sizes.

- **TM200 Series:** Polyvinyl Chloride (PVC)
- **TM400 Series:** High-Density Polyethylene (HDPE)
- **TM500 Series:** Specialty Geomembranes
- **TM700 Series:** Reinforced Polyethylene (SR, WR)
- **TM800 Series:** Linear Low-Density Polyethylene (LLDPE)

FUNCTIONS



COFFERDAM



DITCH WATERPROOFING

SECTORS

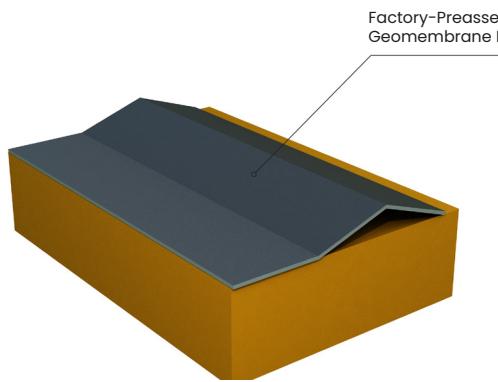
- ✓ Municipal and Architectural
- ✓ Roads and Transportation
- ✓ Natural Resources and Energy
- ✓ Industrial and Waste Management

Thermoplastic geomembranes are used in applications such as:

- Liquid or solid containment;
- Storage platforms;
- Ponds and basins;
- Permanent or temporary covers;
- Lightweight embankments;
- Secondary containment;
- Ditches, cofferdams, and more.

THERMOPLASTIC GEOMEMBRANES

Texel®



Geomembranes thicker than 1.0 mm can be assembled on-site using welding techniques.

Geomembranes of 1.0 mm thickness or less are available as factory-preassembled panels, allowing for quick deployment on-site.

FEATURES OF DIFFERENT TYPES OF THERMOPLASTICS

The main characteristics of Texel's thermoplastic geomembrane types are outlined in the table below.

THERMOPLASTIC GEOMEMBRANE SERIES

	Texel TM200	Texel TM400	Texel TM500	Texel TM700	Texel TM800
Type of Geomembrane	Polyvinyl Chloride (PVC)	High-Density Polyethylene (HDPE) Smooth or Textured	Specialty (EPDM, PP, etc.)	Reinforced Polyethylene (SR, WR)	Low-Density Polyethylene (LDPE) Smooth or Textured
Thickness	20 to 60 mils (0.5 to 1.5 mm)	30 to 100 mils (0.75 to 2.5 mm)	30 to 80 mils (0.75 to 2.0 mm)	6 to 30 mils (0.15 to 0.75 mm)	20 to 80 mils (0.5 to 2.0 mm)
Roll Width	Variable	6.8 or 8.0 meters	Depending on Product	Variable	Variable, 6.8 or 8.0 m
Factory/On-site Assembly (Multiple Panels)	Factory or On-site	On-site	Depending on Product	Factory	Factory \leq 1 mm (40 mils) On-site \geq 1 mm (40 mils)
On-site Assembly Method	Thermal Fusion Extrusion Welding Adhesive Bonding	Thermofusion Extrusion	Depending on Product	Adhesive Tape*	Adhesive Tape \geq 1 mm (40 mils) Thermal Fusion Extrusion
Permeability	$<10^{-10}$ cm/sec	$<10^{-10}$ cm/sec	Depending on Product	10^{-10} cm/sec	$<10^{-10}$ cm/sec
Covered / Exposed	Covered If particles $>$ 5 mm diameter, include a geotextile layer.	Can be exposed If particles $>$ 5 mm diameter, include a geotextile layer.	Depending on the product If particles ϕ $>$ 5 mm provide a geotextile	Can be exposed for temporary use	Can be exposed If particles $>$ 5 mm diameter, include a geotextile layer.
Special Feature	<ul style="list-style-type: none"> Large panels Very flexible Density higher than water 	<ul style="list-style-type: none"> Good chemical resistance Standardized product for landfill sites 	<ul style="list-style-type: none"> Specific properties tailored to your needs 	<ul style="list-style-type: none"> Large panels Good mechanical resistance for its thickness 	<ul style="list-style-type: none"> Large panels High elongation, no fatigue cracking
Nomenclature	TM200 Series Example: TM220 TM220 = PVC TM220 = 20 mils Suffixes: P = Factory preassembled panel PG = Potable water grade FG = Fish-grade	TM400 Series Example: TM440 TM440 = HDPE TM440 = 40 mils Suffixes: ST = 1 textured side T = 2 textured sides	TM500 Series Example: TM530-XR5 TM530-XR5 = HDPE TM530-XR5 = 30 mils thickness TM530-XR5 = Model designation	TM700 Series Example: TM706P SR TM706P SR = Reinforced PE TM706P SR = 6 mils Suffixes: P = Factory-preassembled panel SR = Reinforcement mesh WR = Woven geotextile	TM800 Series Example: TM840 TM840 = LDPE TM840 = 40 mils Suffixes: P = Factory-preassembled panel ST = 1 textured side T = 2 textured sides

WANT TO LEARN MORE?

Feel free to contact one of our representatives to discuss your project. **1800 463-8929 | texel.ca**

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