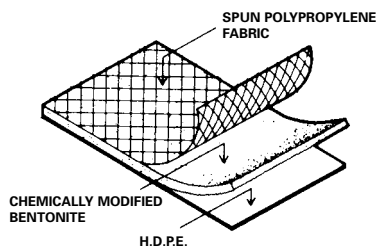


## Paraseal® LG

### Multiple Component Sheet Membrane Waterproofing System

#### Product Description

Paraseal LG is a multi-layer sheet membrane waterproofing system. It consists of a self-sealing, expandable layer of granular bentonite. This bentonite layer is laminated at the rate of up to one pound per square foot to an impermeable, high density polyethylene (HDPE). The third component is a protective layer of spun polypropylene. Together, these three components form a tough, high performance waterproofing membrane manufactured in controlled thicknesses of 170 mils to 200 mils, specially designed for blindside installations such as lagging, under floor slabs and elevator pits. Paraseal LG also withstands applications where shotcrete is blown directly into the face of the membrane.



#### Basic Uses

Paraseal LG is especially effective when waterproofing from the blindside (lagging, etc.) where the waterproofing membrane is applied before the walls or floor are poured. It is designed to resist damage from multiple exposures to inclement weather, extremely abrasive concrete pours or direct installation of shotcrete. Paraseal LG will also exhibit outstanding protection against water intrusion in areas of high water heads.

#### Packaging

4' x 24' (1.2m x 7.3m) standard rolls.

Also Available by SPECIAL ORDER:

- Larger size rolls may be customized for a nominal cutting charge.

NOTE: This specification data is not complete. Use installation guidelines from specification manual for detailed information.

#### INSTALLATION

For complete details, refer to our website. All blindside installations have bentonite side facing installer.

#### Preparatory Work

Examine all surfaces prior to starting application. All spaces between lagging larger than 1" (2.5cm) shall be covered with 3/4" (6.4mm) treated plywood prior to installation.

#### Lagging

Paraseal LG may be installed in a vertical or horizontal direction. Lap joints 3" (7.6cm) shingle fashion (top over bottom) when pouring against, 4" (10.2cm) shingle fashion (bottom over top) when shotcreting against. Fasten all seams at 4" (10.2cm) over center. Trowel Paramastic, TREMproof 201/60T or TREMproof 250GC-T around all tiebacks and penetrations. Protect from flooding prior to concrete pour.

#### Earth

Paraseal LG may be used to cover earth design cuts which are to serve as the external side of a vertical wall form. Overlap joints 4" (10.2cm) to 6" (15.2cm) depending on regularity of soil cut (soil proctor min 85).

#### Buried Forms

Paraseal LG may be directly attached to forms which are to be left in the earth after the concrete is poured (i.e. elevator pits, sumps, etc.). Overlap joints min 3" (7.6cm).

#### Under Floor

Paraseal LG is installed whenever direct contact of the bentonite and floor slab are desired. Paraseal LG will form an instant seal to floor area. Overlap joints 3" (7.6cm). May be installed over consolidated earth at 85 proctor or mud slab.

To establish a moisture vapor protective barrier beneath the floor, all seams are sealed with Permanent Seam Tape. Deckseal may be recommended.

#### Penetration

Tiebacks, tie bolts, misaligned soldier piles, whalers and bracking may all penetrate the Paraseal LG membrane and must be detailed properly. Should this occur, contact your Tremco representative.

#### Protection

The Paraseal LG dual waterproofing system has a PUNCTURE RESISTANCE OF 169-lb point load (76.6 kg) and does not require an additional protection course for most applications. For special applications, contact your Tremco Representative for details.

#### Storage

Protect from moisture. Store on skid or pallet, cover with polyethylene or tarp. Do not double stack pallets.

#### Availability

Immediately available from distributors worldwide.

## Limitations

If groundwater is brackish, consult Tremco. Do not apply in standing water or over snow. Paraseal products require compaction/confinement to be effective. A minimum confinement of 24 psf is required. Contact your local representative or technical services for more information.

## Warranty

Tremco warrants its Paraseal Membranes to be free of defects in materials, but makes no warranty as to appearance or color. Since methods of application can affect performance, Tremco makes no other warranty, expressed or implied, including warranties of MERCHANTABILITY and FITNESS FOR A PARTICULAR PURPOSE, with respect to Paraseal Membranes. Tremco's sole obligation shall be, at its option, to replace or to refund the purchase price of the quantity of Paraseal membrane proved to be defective and Tremco shall not be liable for any loss or damage including incidental or consequential damages arising from the use of Paraseal Membranes.

## TYPICAL PHYSICAL PROPERTIES

Physical Properties	Value	Test Method
Tensile Strength: Membrane (PSI)	4,000 PSI (27.6MPa)	ASTM-D412
Resistance to microorganisms (bacteria, fungi, mold, yeast)	unaffected	
Elongation-ultimate failure of membrane:	700%	D412 Dumbbell
Puncture Resistance:	169 Lbs (76.6kg)	FTMS 101B
Resistance to hydrostatic head (Ft. (m) of water):	150 Ft (45.6m)	ASTMD751 Method A Footnote #1
Resistance to water migration under membrane: zero leakage	150 Ft (45.6m)/Head	Footnote #2
Permeance	2.7x10 <sup>-13</sup> cm/sec or 1.7ng/Pa.S.m <sup>2</sup> or .031 grain/hr ft <sup>2</sup> in Hg	
Installation Temperatures:	-25°F to 130°F (-31.7°C to 54.4°C)	
Non-toxic:	Do not ingest	
Freeze/thaw cycles:	No effect before or after installation.	
Non-staining:		
Resistance to chemicals & gasses:	Extremely high resistance - contact manufacturer for specific information.	
Life Expectancy:	Both high density polyethylene and bentonite have life expectancy measurable in the thousands-of-years.	

### FOOTNOTES FOR TECHNICAL DATA:

1. A 1" (2.5cm) diameter hole was cut in the middle of a 3 1/2" (8.9cm) diameter sample of Paraseal LG. Sample clamped in 3" (7.6cm) diameter permeameter, 150' (45.6m) waterhead applied.
2. Membrane applied to porous stone and placed in permeameter. Pressure increased to equivalent of 150 ft. (45.6m) water head.



### Tremco Commercial Sealants & Waterproofing

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