

A photograph of a large-scale construction project. The image shows multiple levels of a building under construction, completely encased in a dense network of metal scaffolding. Two tall tower cranes are visible against a clear blue sky. In the foreground, there are green trees and bushes. The overall scene is bright and clear, suggesting a sunny day.

**Superior Chemical
Resistance Over Any
Vapor Barrier On The
Market Today**

Terra Shield™
Aluminum Nitrile
Vapor Barrier



Key Benefits



Eliminates
Risk



Excellent
Constructability



Highest Chemical
Resistance on
the Market



Competitively
Priced



The Technology at a Glance

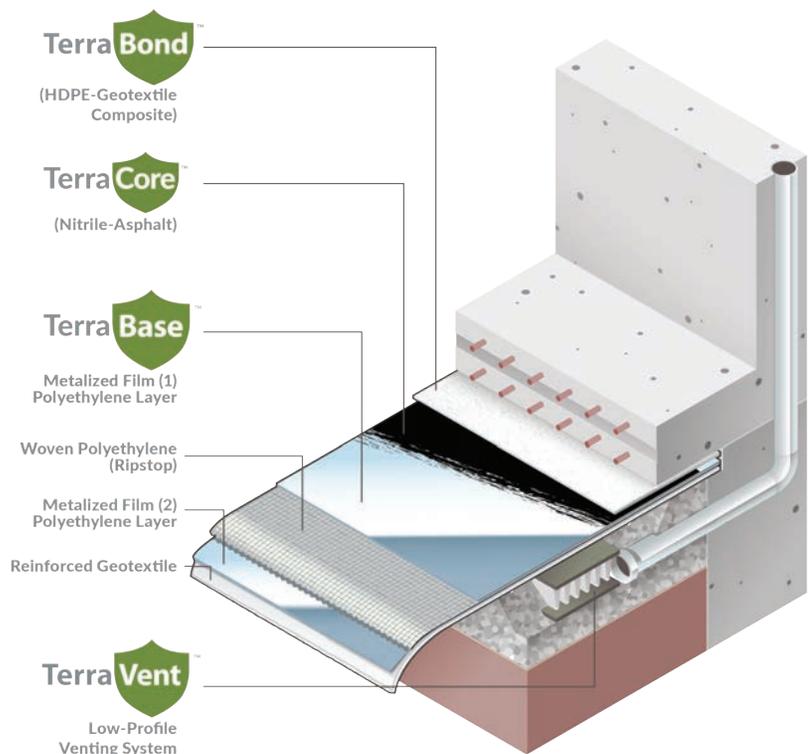
TerraShield is a significant step forward for vapor intrusion barriers. Employing an innovative dual-metalized film technology, TerraShield provides superior chemical resistance over any existing vapor barrier currently on the market. It is the ideal vapor mitigation solution for residential, industrial, and commercial developments with volatile contaminant impacts that represent significant health hazards and economic liabilities.



A Vapor Barrier with
Unparalleled Chemical Resistance

The Difference is a Multi-Layer Base with Dual-Metalized Film Technology

The Land Science research and development team of scientists have invested years in developing the TerraShield vapor barrier system, which delivers orders of magnitude higher vapor intrusion protection as compared to the leading vapor barrier system. The innovative dual-metalized material and multiple layers of protection are key to the increased performance. The R&D team also improved the spray-applied core component by incorporating nitrile into the formulation, a material known for its superior chemical resistance properties. Laboratory results indicate TerraBase offers 100x more protection as compared to a high-density polyethylene (HDPE) base layer.



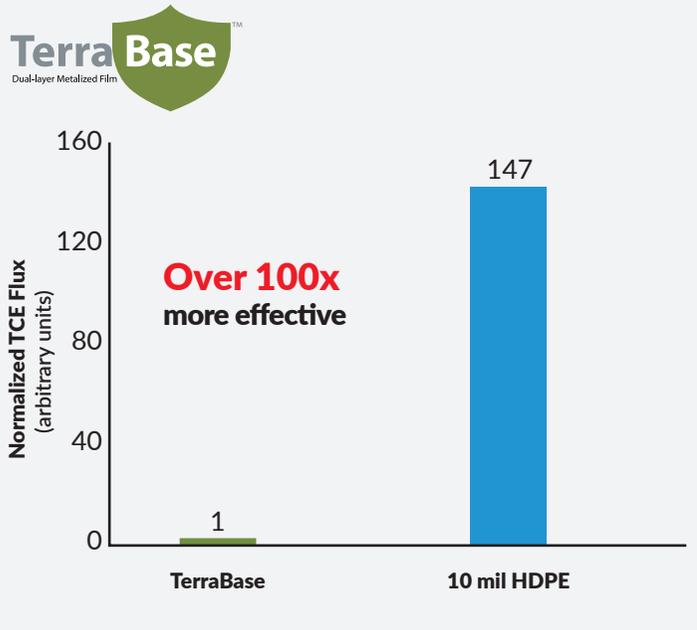
Reduce Your Liability

When developing properties on sites with known environmental impacts, one of the biggest issues is the risk to human health. Failure to address these issues can result in adverse health effects and millions of dollars in legal exposure. TerraShield was designed specifically to eliminate risk of exposure by employing innovative technologies to provide best-in-class chemical resistance and durability. Backed by a robust warranty and installed by Land Science-certified applicators, each TerraShield installation is rigorously tested to ensure the quality of every seal and ultimately the complete vapor barrier system installed.

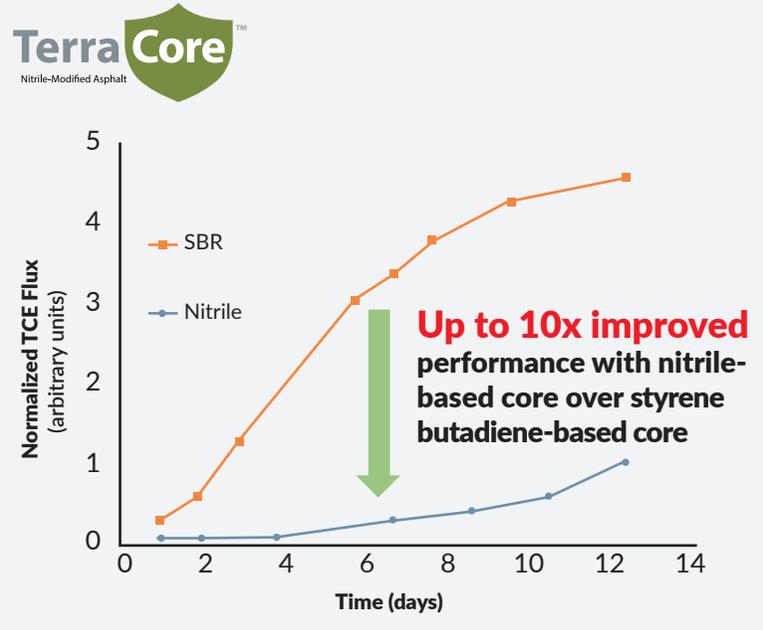
- ✓ TerraBase: lab-tested to be 100x more effective than 10 mil HDPE sheets
- ✓ TerraCore nitrile-modified core lab-tested to be up to 10x more effective than spray-applied asphalt latex core material
- ✓ Highest level of protection available in a vapor barrier system
- ✓ Land Science Certified Applicators ensure barriers are properly installed, reducing risk



Orders of Magnitude More Effective Overall



Accelerated comparison showing the relative TCE flux through the vapor barrier base components: TerraBase, a dual-metalized geomembrane film, versus 10 mil HDPE.



Accelerated comparison showing relative TCE flux through the two polymer-modified spray-applied asphalt layers tested over time. SBR = styrene butadiene modified-asphalt, nitrile = acrylonitrile butadiene-modified asphalt. Both layers were sprayed to an identical thickness (20 mil) for the test.



TerraBond is comprised of HDPE thermally bonded to a geotextile fabric. The bond layer is placed over TerraCore. Benefits include increased puncture resistance, the ability to bond the vapor barrier directly to the underside of the concrete slab, and offers a protection course for the next phase of construction.



TerraCore is a nitrile core that is applied at 40 mils. It is sprayed to the TerraShield base layer and seals the seams of the base layer, as well as around penetrations and perimeter terminations. TerraCore technology is patent pending.



TerraBase is a patent-pending 25-mil thick composite geomembrane comprised of double layers of flexible chemically resistant HDPE and metalized films PET/MET, laminated to a tear resistant woven polyethylene and a high puncture reinforcement geotextile.



TerraVent is a low-profile, trenchless, flexible, sub-slab vapor collection system used in lieu of perforated piping. It consists of a heavy duty 3D, high flow, polypropylene dimpled core which is then wrapped and bonded with a non-woven geotextile to prevent penetration; and made from 100% Post-Industrial/Pre-Consumer polypropylene regrind material.



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