DESCRIPTION
ToughTimber is a concentrated silane/siloxane water based emulsion designed to preserve wood by repelling water and reduce swelling. ToughTimber imparts water repellency to clean, uncoated wood such as shake shingles, fencing and decking materials as well as a variety of interior and exterior wood surfaces.

ToughTimber seals and enhances wood surfaces by creating a chemically bonded hydrophobic barrier that sheds water from the applied surface; however, it is considered breathable as ToughTimber allows some water to enter and exit passing through the substrate.

ToughTimber is made in the USA and is made from the highest quality materials which allows it to have long lasting results.

PREPARATION
Protect all adjacent surfaces not intended for treatment; including people, vehicles, property, plants, and windows from potential product application, overspray, splash, and residue. Use a protective covering material, such as polyethylene, to protect these surfaces. Divert pedestrian and auto traffic from applied surfaces. Ensure fresh air entry and cross ventilation during the application and drying. All applied surfaces should be clean, dry, and prepped before application. Sealing and caulking compounds should be in place and cured. Powerwashing and stain removal should be done prior to ToughTimber’s application. If substrate has been power washed, allow 72 hours of drying at 70F prior to application of ToughTimber. When applying to the exterior of occupied buildings, make sure all windows, exterior intakes, and air conditioning vents are covered, and air handling equipment is shut down during application and until odor has dissipated.

ADVANTAGES
- Easy to use.
- Keeps water at surface.
- Water repellency - but breathable.
- Water based emulsion - water clean up.
- Dilutable and dilution stable.
- Effective at concentration as low as 3% active.
- No SiH - easy to store, handle, and ship no vented containers required.
- Long lasting performance.
- Minimal color change to treated surfaces, if any.
- No gloss and non-slippery.

LIMITATIONS
- Product is not suitable for low-porosity species, such as hard woods.
- Surface must be clean and dry prior to application.
- Product is not tested nor represented as suitable for medical or pharmaceutical.
- Slight darkened of substrate - if any.

PACKAGING
- 1 Gallon Jugs
- 5 Gallon Pails

DRYING TIME
Treated surfaces will dry to touch within 1 hour. Protect surfaces from rainfall for a min of 4 hrs following treatment. Protect from foot traffic until visibly dry. Surfaces may require as many as 72 hours to gain their water repellency properties depending on temperature. Water beading, or lack thereof, is not an indication of product performance.

STORAGE
When stored between 33 and 77F (0 and 25C), has a shelf life of 48 months from the date of manufacture. Store in a cool, dry place away from potential ignition sources. Keep tightly sealed when not dispensing. Do not alter or mix with other chemicals.

SURFACE/AIR TEMPS
Surface and air temps must be at least 40F (4C) during application and for 8 hours following. If freezing conditions exist before application, let wood thaw and dry. Subfreezing temperatures will cause product to freeze or crystalize, which inhibits penetration and impairs results.
APPLICATION

READ “PREPARATION” AND THE SAFETY DATA SHEET BEFORE USE!
Always test a small area of each surface to confirm suitability, coverage rates, and desired results before starting overall application. Prepare surface and design application procedures before for project application.

DILUTION AND MIXING
Dilute and mix with clean, potable water only. Tough Timber can be mixed and diluted in any vessel of appropriate size including a yard sprayer or a plastic bucket. Mixing vessels must be clean, dry, and free of contaminants.

Coverage rates depend on the porosity of the substrate and surface area. Highly porous substrate with high surface area (rough sawn) will absorb more Tough Timber than a less porous, smooth finished substrate. In general, 1 Gallon of diluted Tough Timber will treat 100 square feet of substrate. Coverage rates will vary.

RECOMMENDED MIX AND PERFORMANCE RATIOS:
- 1 part Tough Timber to 1 part water for 20 year performance
- 1 part Tough Timber to 2 parts water for 10 year performance
- 1 part Tough Timber to 3 parts water for 5 year performance

INSTRUCTIONS

Apply to a clean, visibly dry and absorbent surfaces only.

Small Vertical or Horizontal Surface

Brush/Roller Application
Recommended for small scale application only or when spray application is not appropriate: Apply uniformly using a 1/2” nap roller suitable for water based products. Apply enough material to saturate the surface. Allow Tough Timber to penetrate the surface for 5 minutes, then brush or roll out heavy runs and drips that do not penetrate. Wet on Wet re-coat is recommended with 20 minutes. Dry time to touch is 4 hours and service cure time is 24 hours at 75°F.

Large Horizontal Surfaces

Yard Sprayer/Other Broadcast Spraying Equipment
Using a yard sprayer, apply Tough Timber in a single saturating application. Apply Tough Timber so that a white/milky coating is seen on the surface. Apply enough Tough Timber to keep the surface visibly wet for 5 minutes. Using a broom, a brush or a 1/2” nap roller, spread out all puddles until they penetrate the surface. Dry Time is 4 hours and service cure is 24 hours at 75°F.

Dense, Smooth Horizontal Surface

Yard Sprayer/Other Broadcast Spraying Equipment
Apply in a single coat using enough to completely wet the surface without creating drips, puddles, or rundown. Using a Broom, a brush, or 1/2” nap roller, brush out or back roll all runs and drips for uniform appearance. DO NOT OVER APPLY. Over application may cause unacceptable color change. One application is normally enough to produce results.

Small Vertical or Horizontal Surface

Treated surfaces may be coated with most silicone emulsions and many oil based paints after Tough Timber has been applied. Always test a small area to ensure coating adhesion. Adhesion may be improved if surface is pressure rinsed and allowed to dry before application, or sanded.

Limited Warranty

The information contained in this document is offered in good faith and is believed to be accurate. However, because conditions and methods of use are beyond our control, this information should not be used in substitution for customer's tests to ensure that this product is safe, effective and fully satisfactory for the intended end use.