



V-SEAL® 102 Penetrating Sealer

Concrete Cure+Sealer Commercial Grade

PRODUCT INFORMATION

Revised 08.09

PRODUCT DESCRIPTION	RECOMMENDED USES
<p>V-SEAL 102® is a High-tech specially formulated concrete sealer and curing agent that contains an enhanced penetrating, inorganic, potassium silicate modified material which forms a molecular bond with concrete. Substrates sealed with V-SEAL® 102 become stronger, moisture repellent and resistant to stains from oil, gas, grease, salts and other damaging fluids. While blocking liquids, V-SEAL®102 allows entrapped water vapors to escape at an optimum rate which facilitates a more productive curing cycle and fortifies the substrate against repeated freeze/thaw cycles. V-SEAL® 102 will wear out only when the substrate itself wears away to the lowest penetration of the sealer. V-SEAL® 102 meets most D.O.T specs in the U.S. as well as ASTM 309 and 1315 for curing concrete. V-SEAL® 102 contains film forming polymers for enhanced salt and freeze/thaw protection.</p> <p>Company Statement: V-SEAL Concrete Sealers, LLC is a trusted international supplier of superior products for cleaning and sealing concrete, brick and stone. Additionally, the company's affiliate, the TARA Group, conducts research, testing and product development for cementitious materials.</p>	<p>For use on most cementitious applications including:</p> <ul style="list-style-type: none"> • <u>New construction</u> – Excellent as cure & seal • <u>Existing concrete</u> – Hi-performance sealer <p>Ideal for: Driveways /Walkways / Basements Concrete Pavers / Split face Masonry products / Mortar Pool decking / Marcite / Gunite / Stucco Bridges / Tunnels / Foundations Parking garages / Warehouse floors</p> <p><u>Below grade / pre-cast / tilt-up / forms / bridge decks</u></p> <ul style="list-style-type: none"> • Commercial Concrete Applications • Decorative Concrete Application Preservation • Historical Preservation
PRODUCT CHARACTERISTICS	PERFORMANCE CHARACTERISTICS
<p>Finish: Flat Color: Milky/opaque (dries clear / flat) Average Spread Rate: Existing Concrete 150-250 sq. ft. per gal., Curing New Concrete 200-300 sq. ft. per gal. broom finish, 200-400 sq. ft. per gal. machine trowel Drying Time: 3-5 hours per application Shelf Life: 2 years, stored unopened above freezing temperature (DO NOT FREEZE) Clean Up: Soap and water (avoid contact with glass & plastic windows & lenses)</p> <p>MSDS Information/ Physical Data:</p> <p>Boiling Point: 212 F (same as water) Vapor Pressure: /20C/68F water Solubility in Water: Excellent Evaporation Rate: Same as water Appearance and Odor: Clear – slightly amine Specific Gravity: (H2O-1):1.1 to 1.3 @ 20C % Volatile by Volume: N/A PH: 11.5 Flashpoint: N/A Flammable Limits: N/A</p>	<p>ASTMD 2939: Resistance to water solubility, flexibility, no cracking. ASTMD 466: Resistance to water flow and action. Excellent adhesion. No remulsification. ASTME 96: Water vapor transmission 04 grains/sq/ft./hr. Water permeability – 0102 perms ASTM 836: Film thickness on a vertical scale. SS-W-110C: Water repellence on masonry test:1.925% avg. ASTMC672: Freeze/thaw cycle – 100 day cycle. ASTMC-156: Water retention 0.47 kg/m2, Specification – 0.55 kg/m2 ASTM C309-98a: Moisture loss – .25 kg/m2 ASTM C1315-00: Moisture loss – 0.31 kg/m2 90 Day Ponding: Passed. UV-Testing (modified)- No Change – Excellent Results ASTM C 1315 6.6.4: 1000 megajoules/235 nM Uv light Adhesion ASTM- Elcometer Pull: 280 lbs/ Concrete failed 1st/no delamination ASTM C642 Absorption: Phase 1;48 hr: 0.64%-phase 2; 50 day: 1.32% ASTM Scaling Resistance: No Scaling NCHRP 244, Series IV – 4.1 Southern Exposure Absorbed Chloride: Less than 8% NCHRP 244 Series –11 Cube Test: 3.1 less than 14% Weight Gain 3.2 less than 11% Absorbed Chloride</p>



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RECOMMENDED SYSTEMS	SURFACE PREPARATION
<p><u>New Concrete: Use as the Cure & the Sealer</u></p> <p>For curing and sealing new concrete the optimum time to apply V-SEAL® 102 is when bleed water is gone and concrete will withstand the weight of a man. It is beneficial to apply anytime after placement. Avoid rain or freezing for 5 hours. Apply by low pressure spray with medium saturation, being careful not to over apply.</p> <p><u>Old Concrete: Use as a Penetrating Sealer</u></p> <p>Always clean and rinse thoroughly (especially when using oil/citrus base cleaners) flush entire area well, let dry and apply V-SEAL® 102 by low pressure spray. For superior results, broom or back-roll to increase penetration and avoid streaks or puddles. Avoid rain or freezing for 5 hours.</p> <ul style="list-style-type: none"> • <i>Always test substrate for porosity.</i> • <i>Avoid vehicle traffic for a minimum of 8 hours and foot traffic while sealer remains wet.</i> 	<p>Since V-SEAL® 102 is a deep-penetrating sealer, the surface it is to be applied to must be clean and porous enough to allow penetration into the substrate. Surfaces should be clean and free of dirt, debris, mildew, oil, grease and other contaminants. If concrete is heavily troweled (smooth/tight) it may require acid etch to increase porosity.</p> <p style="text-align: center;">COLOR / TINT</p> <p>V-SEAL® 102 DPS has a light milky appearance (similar to skim milk) but dries clear & flat. May occasionally slightly darken concrete or pavers.</p> <p style="text-align: center;">APPLICATION CONDITIONS</p> <p>New Concrete – when bleed water is gone and will withstand the weight of a man. Existing Concrete - apply to dry surface (may be damp but not wet). Surface/outside temperature should be 40 degrees F or above. V-SEAL 102 is rendered ineffective if frozen.</p> <p style="text-align: center;">* DO NOT FREEZE *</p> <p>Apply by low-pressure spray – low delivery / light to medium saturation. Do not atomize. Apply an even mist to wet – not soak – substrate surface. If over applied, a light white, chalky deposit on the surface may occur. This does not affect function and normally dissipates with normal wear.</p> <p style="text-align: center;">ORDERING/SHIPPING INFORMATION</p> <p>Packaging: 1 gal. jugs 5 gal. pails 55 gal. drums and concentrate kits</p> <p>Shipping: Normal package delivery and trucking</p>
LIMITATIONS / REGULATORY	SAFETY / FIRST AID PRECAUTIONS
<p>V-SEAL® 102 works best on porous concrete substrates and will not work with any other product with an oil base, such as asphalt, paints, vinyl, etc. V-SEAL® 102 may not perform when applied over other sealer products, paints or stains.</p> <p>This product is considered a non-hazardous chemical under the OSHA Hazard Communication Standard (29CFR 1910.1200). Transportation Classification: 55. US DOT Hazard Class – Non Regulated.</p> <p><i>*Member of the ICRI (International Concrete Repair Institute)</i></p>	<p><u>Avoid contact with skin & eyes.</u></p> <p>EPA/OSHA Compliant – contains no solvents/0% VOC (Volatile Organic Compounds) Non-Hazardous to plants and animals Wash application materials with water.</p> <p><u>First Aid:</u></p> <p>Eyes: Flush with water for at least 15 minutes Skin: Wash thoroughly with soap and water. Inhalation: No TVL established. Move subject to fresh air. Digestion: If consumed consult physician.</p>