



Poly-Shell™ 1000

100% SOLIDS

PRODUCT DESCRIPTION

SEAL-KRETE® Poly-Shell™ 1000 utilizes the latest development in Polyaspartic coating technology and is the most durable coating available. Poly-Shell 1000 contains nanotechnology for excellent flow and levelling. It is extremely resistance to heat (temps up to 350°F), UV rays, and a variety of harsh chemicals, including salt, motor oil, gasoline, mek, and Acetone. It has outstanding scratch and mar resistance. Poly Shell is also flexible and allows for natural concrete movement without cracking or peeling, making this the ideal system for either indoor or outdoor applications.

FEATURES AND BENEFITS:

- VOC < 50, SCAQMD Approved, No Odor
- Premium wet edge giving applicators adequate time to install
- Versatile – Broadcast Floors, Chip Floors and Slurry/Broadcast Systems
- Outstanding Gloss Retention
- Highly Chemical Resistant
- Outstanding Scratch and Mar Resistance
- Available in:
 - Clear Small Kit: 1 Gallon, Gloss Item #241002

RECOMMENDED USES:

- Restaurants
- Stadiums
- Hospital and care facilities
- Residential garage floors, driveways, patios
- Manufacturing plants
- Kennels
- Universities
- Veterinarian hospitals

Important: Read all directions thoroughly. Recommended: Wear gloves, safety glasses and protective clothing or apron.

SURFACE PREP*

New concrete should be allowed to cure for a minimum of 28 days. The concrete must be structurally sound, dry, and free of grease, oils, coatings, dust, curing compounds and other coatings or contaminants. Surface laitance must be removed. Rising moisture vapor emission rate must not exceed 3 lbs per 1000 sq. ft. over a 24 hour period as measured by calcium chloride test method ASTM F-1869. The preferred method of surface preparation is abrasive blasting or scarification using diamond heads to achieve a final 80–120 grit finish, reference Profile SP-2 ICRI Technical Guideline No. 03732. If patching is required, use SEAL-KRETE Fast Cure High Strength Concrete Repair.

APPLICATION

MIXING INSTRUCTIONS:

Combine 7 parts by volume of Part A to 5 parts by volume of Part B

Mix Part A 2 minutes before using. Mix Part A with Part B. Mix thoroughly using a low speed drill with mixing attachment for 3 minutes. Do not aerate the mix. SEAL-KRETE Poly Shell 1000 can be applied using a flat squeegee or short nap lint-free mohair roller. Refer to Application Guide or visit hp.seal-kerete.com for detailed application instructions.

CLEAN-UP, STORAGE AND DISPOSAL

CLEAN-UP: Clean tools and application equipment immediately after use with an active solvent like Xylene (in SCAQMD use Acetone only). Clean spills or drips while still wet with solvent. Dried SEAL-KRETE Poly Shell 1000 will require mechanical abrasion for removal. Do not use any cleaner that contains alcohol, such as IPA or Lacquer thinner blends, to clean equipment or tools.

HANDLING: Before beginning to paint, put on the appropriate PPE. Do not breathe mixed product vapors or dusts. Use adequate ventilation to keep airborne isocyanate levels below the exposure limits. Individuals with lung or breathing problems or prior allergic reactions to isocyanates must not be exposed to vapors or dust.

KEEP FROM FREEZING: Store in a cool, well ventilated area above freezing.

DISPOSAL: Collect with absorbent material. Dispose of in accordance with current local, state and federal regulations.

LIMITATIONS

Do not aerate during mixing. Apply when temperature is -20° to 130°F. Do not apply if water or ice is present. Lower temperatures will slow cure time. Do not store SEAL-KRETE Poly-Shell at temperatures below 40°F. Cure new concrete 28 days before application. If slab is on grade and does not have an uninterrupted vapor barrier, use Seal-crete Vapor-Shell. Do not apply SEAL-KRETE Poly-Shell 1000 if the floor Moisture Vapor Rating is higher than 3 lbs. per 1000 sq. ft. without the use of Seal-Krete Vapor-Shell.

MAINTENANCE AND CARE

SEAL-KRETE Industrial Flooring Systems are monolithic, making them easier to clean because dirt and contaminants remain on the surface. For maintenance / care recommendations, refer to application guide or visit hp.seal-kerete.com.

CAUTION: KEEP OUT OF REACH OF CHILDREN. Avoid contact with skin. If splashed in the eyes remove contact lenses if worn. Flush eyes with clean water. If irritation occurs get medical attention. If swallowed, DO NOT induce vomiting. Take immediately to hospital or physician. **For more information refer to Material Safety Data Sheet.**

*Sanding or removing paint containing lead may be hazardous. For information contact the National Lead Information Center at 1-800-424-LEAD or www.epa.gov/lead.



Poly-Shell™ 1000

MATERIAL PROPERTIES AT 75°F

| | |
|---|--------------------|
| Mixed VOC Content | < 50 g/L* |
| Mix Ratio (by volume) | 7:5 |
| Mixed Viscosity (CPS) | 830cps @ 50 RPM |
| Gel Time | 363 minutes |
| Tack Free Time | 8-10 hours |
| Recoat Time (min/max) | 10-12 hrs / 24 hrs |
| Light Foot Traffic | 24 hours |
| Vehicular Traffic (hours) | 72 hours |
| ASTM D-570 – Water Absorption (24 hrs.) | < 0.5% |
| ASTM D-635 – Flammability | Self-extinguishing |
| ASTM D-638 – Tensile Strength psi | 4,500–5,200 psi |
| ASTM D-638 – Tensile Elongation % | 25%–30% |
| ASTM D-695 – Compressive Strength: | |
| @ 24 hours | 6,700 |
| @ 7 days | 7,950 |
| ASTM C-722 – Monolithic Surfacing | Pass |
| ASTM D-522 – Mandrel Bend | Pass |
| ASTM D-4060 – Abrasion Resistance (CS-17) | 0.6 mg |
| ASTM D-4366 – König Hardness | 132 |
| ASTM D-4541 – Adhesion Strength | 600 psi |
| *EPA Method 24 – Floor Category | |

USDA and FDA certified food safe for incidental food contact.

CHEMICAL RESISTANCE

| | | | |
|---------------------------------|---|-------------------------------------|---|
| Acetic Acid | Y | Methylene Chloride | Y |
| Acetone | Y | Mineral Spirits | Y |
| Ammonia 30% | Y | Motor Oil | Y |
| Ammonium Hydroxide 30% | Y | Mustard | S |
| Animal Urine | Y | Nitric Acid 20% | Y |
| Antifreeze | Y | Nitric Acid 40% | Y |
| Benzyl Alcohol | Y | Orange Juice | Y |
| Brake Fluid | Y | Phosphoric Acid 10% | Y |
| Calcium Hypochlorite (Chlorine) | Y | Phosphoric Acid 30% | Y |
| Chromic Acid 10% | Y | Phosphoric Acid 50% | Y |
| Citric Acid 10% | Y | PM Solvent | Y |
| Clorox | Y | Silver Nitrate 20% | Y |
| Ethyl Acetate | Y | Skydrol | Y |
| Gasoline | Y | Sodium Hydroxide 50% (Caustic Soda) | Y |
| Glycol Ether | Y | Sodium Hypochlorite 15% (Bleach) | Y |
| Hydraulic Fluids | Y | Sodium Hypochlorite 50% (Bleach) | Y |
| Hydrochloric Acid 35% | Y | Sulfuric Acid 10% (Battery Acid) | Y |
| Hydrofluoric Acid 40% | S | Sulfuric Acid 50% (Battery Acid) | S |
| Hydrogen Peroxide 30% | Y | Toluene | Y |
| Iodine 2% | Y | Trichloroethylene (1,1,1) | Y |
| MEK | Y | Trichloroethylene | Y |
| Methanol | Y | Windshield Wiper Fluid | Y |
| Methyl Cellosolve | Y | Xylene | Y |

Key: Y = RESISTANT S = SPLASH & SPILL N = NOT RECOMMENDED

COVERAGE GUIDE

Recommended Wet Film Thickness: 4 - 6 mills per coat.

Coverage rates are approximate and for estimating purposes only. Surface temperature, porosity, texture and thickness will determine actual material requirements.

WARRANTY: Seller makes no warranty, either expressed or implied, concerning this product, its quality, performance, merchantability, or fitness for a particular purpose other than expressly designated warranty of this label. Buyer assumes all risk of use and handling of this material.

TECHNICAL SUPPORT: For more information on surface prep or application guidelines, or to obtain a Material Safety Data Sheet, call 1-800-323-7357, M-F (8:00 am–5:00 pm EST) or visit our website at hp.seal-krete.com.

Country of Origin: U.S.A.



11 Hawthorn Pkwy., Vernon Hills, IL 60061
800-323-3584 rustoleum.com/seal-krete

HOW TO TREAT CONCRETE®

hp.seal-krete.com