



## L2 LITHIUM EMPOWERED FORMULATION

### DESIGNED FOR POLISHED CONCRETE HARDENER AND DENSIFIER

Product Code: 1500

WATER-BASED - V.O.C. COMPLIANT – HIGH SOLIDS

*Manufactured and designed exclusively by Chem-Coat Industries, Inc.*

#### PRODUCT DESCRIPTION

L2 LITHIUM is a scientific formulation of an interactive solution of Lithium and Silicone resulting in state of the art performance. L2 LITHIUM Treatment is a unique and proven formulation that works within the Nano-Structure of the concrete, thus increasing its hardness and structural protection. L2 LITHIUM is ideal for hardening concrete surfaces; and for non-polished Architectural Concrete where a low luster finish is desired, along with superior performance as compared with other industry standard products. L2 LITHIUM is more effective than Sodium and Potassium Silicate blends. L2 LITHIUM will also lock in Color Dyes and Reactive Stain Colors applied to the concrete surface.

#### BENEFITS

- One Component • V.O.C. Compliant • Non-Yellowing • U.V. Resistant • Long Lasting • Easier Maintenance • Proven Quality • Easy to Apply • Helps Prevent Dusting • Never Needs Reapplication after Initial Installation

#### SUBSTRATES

Concrete: New & Old; Most Masonry Surfaces; Architectural Concrete; Warehouse/Manufacturing Facilities; Arenas; Vertical Concrete Surfaces, Columns, Monumental Concrete

#### TECHNICAL DATA

Color	Clear to Light Pearlescent
V.O.C.	None
Coverage Rate	250-500 sq.ft./per gallon
Flammability	non-flammable
Application temperature	100F Maximum
Clean up	water
Dry time	1-3 hours
Do not Freeze	

#### AVAILABILITY

1-Gallon Units, 5-Gallon Units, 55-Gallon Drum

**SURFACE PREPARATION** Do a small test in an inconspicuous area before project application to assure compatibility of all products. If you have any questions regarding application of the product please call CCI - 1-800-511-2769. The surface must be clean from all contaminants, oil, sealers, bond breakers, and waxes.

L2 LITHIUM can only react with clean concrete.

**APPLICATION PROCEDURES & INSTRUCTIONS** Application by spray, roller or brush to new or old concrete (Always tests each concrete surface for suitability and desired results. Let surface dry before inspection and approval of desired application.)

**FRESHLY PLACED (NEW) CONCRETE** L2-Lithium may be applied to newly placed concrete immediately after final finish trowels, and can be used as an effective curing compound. It does not however, form a membrane as described in ASTM C 309. Immediately after the finish troweling operation use a low pressure or HVLP sprayer to apply L2-Lithium™ to form an even, consistent, monolithic glistening sheen, and to insure complete saturation of the surface. Apply enough L2-Lithium™ to keep the surface wet for 20 minutes. Let the surface dry. (Usually 1 to 2 hours). If desired, follow with an ASTM C-309 approved curing compound application. If applying to concrete after sawing, curing or bond breaker application, thoroughly clean the substrate so that it is free of all foreign materials such as bond breakers, curing agents, form release oils, dust, construction laitance, drywall residue etc. After cleaning, apply L2-Lithium™ as directed above.

**TILT-UP CONSTRUCTION APPLICATIONS** L2-Lithium™ may be applied immediately after the finishing process is completed; then a wet-cure or bond breaker/curing material may be applied over the application per the curing material or bond breaker manufacturer's instructions. When a curing compound must be applied to freshly placed concrete, use a water dissipating non-resin/ non-membrane forming curing compound. Prior to applying the bond breaker, use the above procedure, then apply bond breaker as the curing agent on top of the L2-Lithium™ treatment.

**EXISTING (OLD) CONCRETE** L2-Lithium™ may be applied to existing, cured concrete of any age (Minimum Cure is 28 Days) All surfaces must be clean and sound. Mechanically remove any surface laitance and patch or fix cracks and damaged areas. Completely remove all membrane forming curing compounds, sealers, coatings, paint, oil, grease, dirt, dust and other containments. It is

recommended to thoroughly clean the surface with a black scrubbing pad (light abrasion) and a neutral pH detergent. Etching of the surface with an acidic solution is NOT recommended, because it requires a thorough rinsing process using a neutral pH cleaner to effectively neutralize the entire surface (if not properly neutralized, the pH condition may cause whitening). For best results, clean the surface by sanding the floor with a 60-100 grit sanding screen or diamond abrasive pad. Remove dust and residue with a riding or walk-behind "scrubber" utilizing water or broom, then water rinse and squeegee surface dry. Use a low pressure or HVLP sprayer to apply L2-Lithium™ so as to form an even, consistent, monolithic glistening sheen and to ensure complete saturation of the surface. Apply enough L2-Lithium™ to keep the surface wet for 20 minutes. Let the surface dry.

**FINAL RESULTS** Floor is ready for traffic and use when dry. Typical drying time is 1-2 hours.

**OPTIONAL TOP COAT** For an increased immediate shine, water repellency, chemical and stain resistance, clean floor thoroughly, apply an additional light top-coat of L2-Top Coat. Allow the L2-Top Coat to dry overnight and then burnish with a high speed propane buffer equipped with black pad, followed by a red pad. Burnishing with a white or red pad followed by a red pad will increase reflectivity on smooth surfaces more quickly. Second applications are rarely needed; however, if the concrete is very porous or if a quicker sheen is desired, apply a second application with the following procedure: Lightly mist the surface with L2 Top Coat then spread evenly with a lamb's wool applicator or a microfiber pad, and let dry. Additional information on L2 Top Coat can be found on the website: [www.chem-coat.com](http://www.chem-coat.com)

**CLEAN UP** Use water to clean tools and equipment. L2-Lithium™ treatments are environmentally friendly and do not require special handling or hazardous disposal methods

**MAINTENANCE** Routine sweeping, mopping, washing with 450-Plus by Chem-Coat and if needed a mild mechanical scrubbing of floors. 450-Plus is designed for polished concrete and is fortified with Lithium and cleaning agents to protect and preserve Polished Concrete. If not using 450-Plus then a mild conventional cleaners and detergents is recommended. DO NOT USE acidic cleaners to maintain the floor. Although L2 Top Coat is chemically resistant and helps reduce staining, this application in specific chemical environments and in some acidic concentrates may etch the surface causing a residual stain. If unsure, contact a Chem-Coat Industries Technical Representative. Regular maintenance and cleaning will improve the surface shine and appearance. Use a non-citric based degreaser and regular mopping for scrubbing the floor. This will prolong the life of the floor surface, and over time will increase the sheen (reflectivity.) Wipe up any chemical spills as soon as possible.

#### AVAILABILITY

L2-Lithium™ concrete treatment is available through Certified Contractors, Licensed Applicators, or by arrangement through Chem-Coat Industries. For the name and contact information of your nearest L2-Lithium™ Certified Contractor or Applicator, contact Technical Services at (800) 511-2769. Factory "Certified Contractor" or "Licensed Applicator" contact information is available on request.

#### POLISHED CONCRETE CONSTRUCTION APPLICATIONS

L2-Lithium™ (General application instructions)—Review technical information and application guidelines for Decorative Polished Concrete (available on request) before using L2-Lithium. Example for Illustrative purposes: L2 Lithium may be applied immediately after all surface prep/grinding is completed, generally at the 100 to 120 Resin-Bond Diamond level. Continue with Resin-Bond Diamond passes (220-400; 600-800; 1800-3500) depending on the specified level of top-coat sheen [reference Chem-Coat Industries Polished Concrete Specification data for further information]. Generally, the higher the resin-bond diamond level – the result will be a higher sheen/gloss finish. First, clean floor thoroughly to remove any dust from prep/grinding. Second, apply L2-Lithium™ with a spray bottle or pump up sprayer, and then spread evenly with a micro fiber mop. Allow to dry then repeat if necessary. Do not allow the application of the L2-Lithium™ product to "pool" on floor. The product may turn white when applied too heavy, or if any pooling of the applied product is allowed.

**IMPORTANT:** Applicator and Specifier of Chem-Coat Industries products must verify that the most current versions of L2-Lithium™ Product Data Sheets and MSDS are being used. Read all current information prior to use. Call Customer Service (800-511-2769) to verify the most current versions, or visit the website at: [www.chem-coat.com](http://www.chem-coat.com). Proper application is the responsibility of the user. Field visits by Chem-Coat Industries personnel are for the purpose of making technical recommendations only and not for supervising or providing quality control on the jobsite.

#### WARRANTY

**LIMITED WARRANTY:** Chem-Coat Industries Inc. warrants that, at the time and place of product shipment, our material will be of good quality and will conform to CCI's published specifications in force on the date of the acceptance of the order. **DISCLAIMER:** The information contained herein is included for illustrative purposes only and, to the best of our knowledge, is accurate and reliable. Chem-Coat Industries Inc. cannot however under any circumstances make any guarantee of results or assume any obligation or liability in connection with the use of this information. As Chem-Coat Industries Inc. has no control over the use to which others may apply its products, it is recommended that the products be tested to determine if they are suitable for a specific application; and/or that information is valid in a particular circumstance. Responsibility remains with the architect or engineer, contractor and owner for the design, application and proper installation of each product. The specifier and/or user shall determine suitability of products for specific application and assume all responsibilities in connection therewith. **Such as caution slippery floor signs, rubber safety boots and all other appropriate safety measures. Keep** all public and all other trades off the floor until work is completed. The application area should be roped off to prevent any traffic on the floor during application and final dry times.

CHEM-COAT INDUSTRIES, INC.

Tel: 972-485-8648; 1-800-511-2769 FAX: 972-485-0333

[www.chem-coat.com](http://www.chem-coat.com)

Rev – 07/13