



Convergent Concrete Technologies, LLC.

Specialty Chemical Concrete Treatments

115 North 1380 West Orem, Utah 84057 United States of America

Office: 801-375-2280

www.convergentconcrete.com



## **PRODUCT DESCRIPTION**

Pentra-Sil® (H) is the preferred Nano-Lithium® densifier for freshly placed concrete and tilt-up construction slabs. It can also be used on existing concrete surfaces and cementitious overlays. This fast-drying, reactive formula provides maximum hardening to improve abrasion resistance and reduce dusting with a simple, one-coat application. If desired, curing compounds can be applied directly on top of the treated surface once it is dry.

Pentra-Sil® (H) creates an extremely hard surface that is dense yet breathable. When applied to new concrete, it penetrates up to ¼ inch (7mm) where it reacts to form insoluble calcium-silica-hydrate, making concrete more water, stain, and abrasion resistant for easier maintenance and a longer life. The treatment leaves no film, reduces application time and cost, and allows most curing compounds to be more easily removed. This easy-to-use, water-based solution requires no rinsing and is VOC compliant.

## **KEY BENEFITS**

- Easy application, no rinsing required
- Penetrates, no film to lift or peel off
- Bond-breakers can be applied directly on top for tilt-up construction applications
- Reduces efflorescence and surface sweating
- Does not contribute to surface ASR, or surface crazing
- Compatible with integrally colored concrete, stains and dyes
- Curing compounds are more easily removed with scrubbing
- Resists stains and dusting, making concrete easier to maintain
- VOC compliant, may contribute to LEED points (IEQ credit)

Pentra-Sil® (H)

### **Customer Service:**

Call 1-866-375-2280

Visit our website:

www.convergentconcrete.com

Or scan the code:



### **USES**

Power-Troweled Concrete, Tilt-Up Construction Slabs, Grocery Stores, Parking Garages, Fire Stations, Sidewalks, Driveways, Loading Docks, Aircraft Hangars, Automotive Dealerships, Shipping Terminals, Vehicle Maintenance Areas, Office Buildings, Healthcare Facilities, Cafeterias/Restaurants, Correctional Institutions, Retail & Shopping Centers, Schools, Stadiums, Veterinary Clinics, Common Areas, Laboratories, Lobbies, Mechanical Rooms, Mezzanines, Manufacturing Facilities, Warehouses, Storage, Distribution Centers, Food Processing Plants, Textile Mills, Wastewater Treatment Plants, Pharmaceutical Plants, Electronic Facilities, Cold Storage/Freezers, Beverage Bottling Plants, Chemical Processing Plants, etc.

### APPLICATION

Apply only when temperatures will be above 40°F (4°C) for at least 2 hours following application.

Using a sprayer, apply Pentra-Sil® (H) evenly on the surface. Keep the surface wet with product for at least 20 minutes, adding more product where needed.

On newly placed, machine-troweled concrete, Pentra-Sil® (H) may be applied immediately after the finishing, immediately after joints have been cut and cleaned, or anytime thereafter. As the material dries into the surface, spread out any puddles with a soft bristle broom or a flat microfiber pad.

On existing concrete, clean surface before application to remove any dirt, laitance, curing compounds or coatings that may prevent Pentra-Sil® (H) from penetrating the surface. Do not use citrus or acidic cleaners. If acidic or d-limonene cleaners have been used, neutralize the surface using an alkaline cleaner (TSP, Tide laundry detergent, etc.).

The surface is ready for use when dry.

\*It may be necessary to spray water on hot concrete with a surface temperature above 90°F (32°C) to cool the surface prior to application so Pentra-Sil® (H) does not flash-dry on the surface. Proceed with product application once the surface is dry.

\*Before application, always do a small test sample in a less-visible area to be sure there are no variables or contaminants in the substrate that may be incompatible with this product.

# **ESTIMATED COVERAGE**

Machine-troweled: 450-650 ft<sup>2</sup> per gallon (11-16 m<sup>2</sup> per liter) \*Coverage rate will vary with concrete porosity and environmental conditions.

# **CLEAN UP**

Use soap and water to clean tools and equipment. Although Pentra-Sil® (H) is non-toxic and environmentally safe, it is alkaline. Use up or dry out extra material and dispose of according to local regulations. Do not pour into sewer systems or storm drains.

## MAINTENANCE

Clean with Pentra-Clean™ (CR), Pentra-Clean™ (DC) or neutral pH cleaners as needed. If additional protection or gloss is desired, apply Pentra-Finish™ (HG), Pentra-Pel™ (SI), or Pentra-Guard® (EXT). Consult a Convergent Concrete Representative for further information.

Pentra-Sil® (H)

### **Technical Service**

**Customer Care:** 

Toll Free 866-375-2280 or 801-375-2280

### **Email:**

info@convergentconcrete.com

## Web:

www.convergentconcrete.com

# For Chemical/Medical Emergencies:

Infotrac 800-535-5053 Outside USA 352-323-3500

## SAFETY/HEALTH INFORMATION

KEEP OUT OF REACH OF CHILDREN.

Do not drink. If swallowed, do not induce vomiting; drink two glasses of water and call a physician. Wear goggles and gloves. If splashed in eyes, rinse eyes immediately with clean water and call a physician if irritation persists. Clean skin with soap and water. CAUTION: Surfaces wet with Pentra-Sil® (H) may be slippery.

Additional precautions, safety information and first aid treatments are contained in the Safety Data Sheet.

### **PROPERTIES**

Form: Liquid

Color: opaque, dries clear Odor: Slight to none Total Solids: 9% Specific Gravity: 1.06 pH: 11-12

VOC Content: <50g/L Flash Point: N/A

Freeze Point: 32°F (0°C)

Shelf Life: 1 year in unopened, sealed container

### **PACKAGING**

1-Gal Jug • 3.79 L 5-Gal Pail • 18.93 L 55-Gal Drum • 208.20 L 275-Gal Tote (IBC) • 1040 L

### **LIMITATIONS**

Pentra-Sil® (H) will not bridge or fill cracks and will not salvage honeycombed or structurally unsound surfaces. Not suitable for asphalt, non-cement surfaces or painted surfaces. Paint and coatings may be applied over the top of Pentra-Sil® (H).

If Pentra-Sil® (H) comes into contact with glass, fabric, metal, or painted surfaces, immediately wipe contaminated surfaces with a damp cloth, then wipe dry with a second clean cloth.

Make certain the most current versions of the Pentra-Sil® (H) Product Data Sheet and SDS are being used. Call Customer Service (1-866-375-2280) or visit our website (www.convergentconcrete.com) to find additional tips, guidelines and specifications. Proper application is the responsibility of the user. Field visits by Convergent Concrete Personnel are for the purpose of making technical recommendations only and not for supervising or providing quality control on the job site.

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### **WARRANTY**

The product and application information contained herein is offered in good faith and we believe it to be accurate. However, since conditions and methods of use of our products are beyond our control, this information should not be used in substitution for customer's tests to ensure that our products are safe, effective, and fully satisfactory for the intended end use. Suggestions of use shall not be taken as inducements to infringe any patent. Convergent Concrete Technologies, LLC.'s sole warranty is that our products will meet our specifications at the time of shipment. Your exclusive remedy for breach of such warranty is limited to refund of purchase price or replacement of any product shown to be other than as warranted.

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Refer to www.convergentconcrete.com for latest Technical Data Sheet and MSDS.

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# UNIQUE STRENGTHS, UNMATCHED PERFORMANCE™