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H&C®

HB-100 AND HB-150 WATER REPELLENTS

DESCRIPTION	CHARACTERISTICS	PERFORMANCE TESTS
<p>H&C HB-100 and HB-150 Water Repellents are clear oligomeric siloxane water repellents designed to weather-proof old and new masonry against nature's destructive forces. They provide a long lasting, breathable barrier which exhibits superior resistance to water, airborne dust and dirt, salt, acid rain, efflorescence, alkali, freeze/thaw damage and spalling. They also minimize iron staining by helping to prevent reinforcing steel from corroding and deteriorating due to water intrusion.</p> <p>HB-100 is a 10% siloxane solution and HB-150 is a 15% siloxane solution.</p> <p>Recommended Uses: Most masonry surfaces including: • Driveways • Stadium Supports • Bridges and Bridge Structures • Parking Garages • Traffic Sound Barriers • concrete walls • stucco • *split faced block • fluted block • concrete block • brick (clay or cement) • mortar • roof tile • cement floors</p> <p>Alternate Uses: For a color/seal system on extremely porous substrates, apply a flood coat of HB-100 or HB-150 then 2 coats of H&C® Concrete Sealer Solvent Based.</p> <p><i>*Lightweight Split Faced block may require a film-forming product due to its extreme porosity.</i></p>	<p>Color: Clear</p> <p>Coverage sq ft/gal Smooth precast concrete 125 - 175 Porous concrete 100 - 150 *Split face block 50 - 75 Fluted Block 25 - 50 Concrete Block 75 - 125 Brick (Clay) 100 - 150 Roof Tiles 75 - 125 Bridge decks 100 - 150 Steel trowelled concrete 150 - 200 Coverage will vary depending on the porosity and texture of the substrate</p> <p>Drying Time, @ 77°F, 50% RH: temperature and humidity dependent Touch: 3 hours Recoat: 24 hours</p> <p>Finish: none</p> <p>Vehicle Type: Oligomeric Siloxane HB-100 HB-150</p> <p>Flash Point, PMCC: 90°F 110°F VOC (less exempt solvents): g/L 732 711 lb/gal 6.11 5.93</p> <p>Volume Solids: 6 ± 2% 9 ± 2% Weight Solids: 8 ± 2% 12 ± 2% Weight per Gallon: 6.7 lb 6.8 lb</p> <p>Applicable Standards: Meets or exceeds Federal Spec SS-W-110C & Canadian Spec 58-GP-1P.</p> <p>HB-100 and HB-150 are not recommended for topcoating over film-forming paints, stains, or sealers.</p> <p>Ordering Information HB-100 Part Number/SMIS Five 50.040105/107-8765 HB-150 Part Number/SMIS Five 50.040155/108-0332</p>	<p>National Cooperative Highway Research Program, 244 REPORT, Series I Test</p> <p>Reduction in Water Absorption: Minimum Required 75% HB-10079.6% HB-15085.1% Reduction in Water Absorption is an indication of HB-100 and HB-150's effectiveness.</p> <p>Water Vapor Transmission Minimum Required:100% HB-100115.8% HB-150119.9%</p> <p>Reduction in Chloride Ion Intrusion Minimum Required: 75% HB-100:..... 86.0 HB-150:..... 92.1</p> <p>Series IV Test Southern Climate HB-100:..... 86.0 HB-150:..... 91.8</p> <p>Scaling resistance OPS B51.08.01 ASTM C672 50 Cycles Minimum Required: NA HB-100:..... 2 HB-150:..... 2</p> <p>Freeze Thaw ASTM C666 Relative Dynamic Modules of Elasticity, HB-150: 96.2</p> <p>Acid & Alkali Resistance Tests: Each was allowed to react for 24 hours under a watch glass, washed with water, allowed to recover for 30 minutes then observed.</p> <p>Alkali: 2% NaOH..... No effect 5% Tide..... No effect 2% Ivory flakes No effect</p> <p>Acid: 5% Citric Acid No effect 100% Milk No effect 5% HCL No effect 5% Phosphoric Acid No effect</p>



H&C[®] HB-100 AND HB-150 WATER REPELLENTS

SURFACE PREPARATION

Testing: Due to the wide variety of substrates, preparation methods, application methods and environments, the customer should test the product in an inconspicuous spot for adhesion and compatibility prior to full scale application. All surfaces must be clean, dry and free of grease, oil, paint, sealers, etc. To clean, use **H&C[®] Cleaner Degreaser**, following label directions, rinse thoroughly and allow the surface to dry. If mold mildew or fungus are present, kill and remove by cleaning with a solution of 1 part household bleach to 3 parts water.

Bare Concrete:

New concrete must be cured 28 days. All horizontal concrete must be etched with **H&C[®] Etching Solution** first, following label directions. For very smooth surfaces (troweled surfaces with no porosity) use **H&C[®] Etching Solution** at full strength. For smooth-troweled concrete with some porosity, 1 part **H&C[®] Etching Solution** to two parts water should be used. Do not etch painted surfaces. **Prepared concrete should have a pH between 6 and 10.**

Repair:

For the best waterproofing protection on vertical concrete and masonry, patch and repair cracks and crevices where water can enter. On floor surfaces, use appropriate patching material. Patching compounds will generally be visible through clear coatings.

APPLICATION

- Two flood coats are required if product will not be topcoated. Because the flood method is recommended, surface texture will determine actual coverage.
- Stir thoroughly before and during application.
- Air and surface temperature should be between 50° and 90°F.
- Do not reduce.
- Protect against rain for 4 to 5 hours to allow the water repellent to become effective.

Application:

Apply by low pressure airless sprayer, pump-up sprayer, or power roller on smooth surfaces. The best results are achieved when working with low spraying pressures so the impregnating solution is applied in the form of droplets rather than a mist. Use the flood method. Vertical surfaces must be saturated, or "flooded", allowing the material to run down 8 to 10 inches. Always work from the bottom up. Horizontal surfaces can be applied by the above methods or with conventional roller or brush providing enough material is used to allow it to stand for a few seconds before completely penetrating.

Interruption of Work:

Upon drying, treated surfaces appear identical to untreated surfaces. It is possible areas could remain untreated if work is interrupted. It is advisable to stop application on a corner joint or any other obvious marker so the applicator can begin where application had previously ceased.

CLEANUP INFORMATION

Clean spills, splatters and tools immediately with Xylene or Mineral Spirits. Clean hands immediately after use with a waterless hand cleaner. Follow manufacturer's safety recommendations when using any solvent.

CAUTIONS

Not for use on marble, limestone, or other forms of calcium carbonate. Do not use below grade. For atmospheric use only.

LABEL CAUTIONS (HB-150)

CAUTION contains ALIPHATIC HYDROCARBONS. Contents are COMBUSTIBLE. Keep away from heat and open flame. VAPOR HARMFUL. Use only with adequate ventilation. To avoid overexposure, open windows and doors or use other means to ensure fresh air entry during application and drying. If you experience eye watering, headaches, or dizziness, increase fresh air, or wear respiratory protection (NIOSH approved) or leave the area. Avoid contact with eyes and skin. Wash hands after using. Keep container closed when not in use. Do not transfer contents to other containers for storage. FIRST AID: In case of eye contact, flush thoroughly with large amounts of water for 15 minutes and get medical attention. For skin contact, wash thoroughly with soap and water. In case of respiratory difficulty, provide fresh air and call physician. If swallowed do not induce vomiting. Call Poison Control Center, hospital emergency room, or physician immediately. DELAYED EFFECTS FROM LONG TERM OVEREXPOSURE. Contains solvents which can cause permanent brain and nervous system damage. Intentional misuse by deliberately concentrating and inhaling the contents can be harmful or fatal. DO NOT TAKE INTERNALLY. KEEP OUT OF THE REACH OF CHILDREN.

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The information and recommendations set forth in this Product Data Sheet are based upon tests conducted by or on behalf of H&C concrete coatings and The Sherwin-Williams Company. Such information and recommendations set forth herein are subject to change and pertain to the product offered at the time of publication. Consult your H&C or Sherwin-Williams representative to obtain the most recent Product Data sheet.