

## QC Solvent-based Sealers (Spray-Applied)

# QC Ultra Seal, QC Ultra Seal 100 VOC and QC Solvent Seal VOC III Product Information Bulletin 18S.1008P

QUALITY ARCHITECTURAL CONCRETE

### QC SOLVENT-BASED (SB) SEALERS FOR SPRAY-APPLIED APPLICATIONS

QC SOLVENT-BASED SEALERS are high quality, VOC-compliant, solvent-based acrylic sealers designed to permanently seal concrete and masonry surfaces, providing a medium to high gloss finish that will protect surfaces from water, dust, stains and dirt.

#### Uses and Benefits

- QC offers three high-quality solvent-based sealers for spray-applied applications: QC ULTRA SEAL, QC ULTRA SEAL 100 VOC and QC SOLVENT SEAL VOC III.
- When applied according to the written instructions, these QC SOLVENT-BASED SEALERS provide a breathable, non-yellowing protective finish and enhance exterior concrete, terrazzo, brick and masonry surfaces. *Please see 'Limitations' section of this bulletin for important information regarding interior use, vapors and flammability.*
- QC SOLVENT-BASED SEALERS provide medium to high gloss finishes, depending on substrate, product used and number of coats applied. QC recommends a minimum of two coats for best results. Always test in an inconspicuous area for desired gloss and compatibility.
- QC SOLVENT-BASED SEALERS are an excellent choice for sealing and enhancing the following surfaces:
  - Colored, imprinted concrete
  - Colored concrete that has been unsealed or stripped
  - Concrete that has been treated with water-based stain, acid stain, or dye that has been left unsealed or stripped
  - Color hardened concrete that has been left unsealed or stripped
  - Uncolored concrete that has been left unsealed or stripped
  - Exterior concrete surfaces that will weather naturally
  - Exposed aggregate
- These sealers protect surfaces against dusting, staining and dirt with non-yellowing finishes. The sealers enrich the tone of concrete colored with QC COLORTECH-E\*, QC COLORTECH\*, QC COLOR HARDENER\* and QC THIN-PAVE NI\*, as well as accentuate the surface character of concrete treated with QC PATINA STAIN\*, QC CEMTINT\* or QC CONCRETE DYE\*.
- Tinted QC SOLVENT-BASED SEALERS are not meant to be the primary coloring system. Any one of these tinted sealers should be used in conjunction with another QC concrete coloring product.

#### **Before Any Application**

- 1. When using any QC SOLVENT-BASED SEALER, the surface must be clean and completely dry before application. If the surface is not clean or completely dry, the sealer may turn white or hazy, or the sealer may fail to form a proper film. If excessive moisture in the concrete is suspected, contact QC CONSTRUCTION PRODUCTS for technical assistance before applying a QC SOLVENT-BASED SEALER.
- **2.** Before applying product to new or existing concrete, test the QC SOLVENT-BASED SEALER in an inconspicuous area for desired results. For any questions regarding application, contact QC CONSTRUCTION PRODUCTS.

#### Application to New Concrete

**Warning:** Do not apply any QC SOLVENT-BASED SEALER to fresh concrete. These sealers are not curing compounds. Allow at least 7 days for concrete to cure or at a very minimum, wait until the concrete has reached a uniform color. For optimum results, allow concrete to cure for 28 days or longer.

- 1. The surface should be completely clean and dry before application. For cleaning use QC CONCRETE DEGREASER AND NEUTRALIZER\* diluted with at least 2 ounces of QC CONCRETE DEGREASER AND NEUTRALIZER\* per gallon of water. If applying over old lacquer or sealer, test a small area to determine compatibility. Loose, flaky sealer should be removed using a high-pressure washer.
- **2.** QC SOLVENT-BASED SEALERS should be applied undiluted with a high-quality pump-up or airless sprayer.
- 3. Important: When applying a QC SOLVENT-BASED SEALER, do not allow the sealer to puddle. Apply the sealer as uniformly as possible without leaving

either spaces or puddles. Multiple thin applications will give better results than a single, heavy application.

**4.** Two light coats of a QC SOLVENT-BASED SEALER, at the recommended coverage rate, are usually sufficient to seal and protect. However, for increased gloss, durability and extra protection, apply additional coats after initial coats are dry.

#### Application to Existing or Old Concrete

- 1. Surface must be thoroughly cleaned, rinsed and allowed to dry. To clean surface, use one part QC CONCRETE DEGREASER AND NEUTRALIZER\* to eight parts water. On smooth surfaces, scrub in with automatic scrubber or use a low-speed buffer equipped with scrubbing pads or brushes. After scrubbing surface, use a mop and ringer bucket with clean water to rinse the surface of remaining residue. On rough surfaces or textured concrete, use the same equipment as with smooth surfaces but rinse with pressure washer.
- 2. If applying sealer to existing concrete, paint or other coating, test prior to application in an inconspicuous area to ensure compatibility. For any questions regarding surface of existing concrete, contact QC CONSTRUCTION PRODUCTS.
- **3.** After cleaning and testing surface, follow application steps listed above in the "Before Any Application" and "Application to New Concrete" sections.

#### Surface Protection and Maintenance

- For areas where oil spills may occur, like parking garages and driveways, use a QC SOLVENT-BASED SEALER according to application directions as stated above. QC SOLVENT-BASED SEALERS will resist oil stains initially upon contact.
- **Note:** If oil is left on the surface for an extended period of time or if the oil is not properly cleaned up, the oil may penetrate the sealer and go into the concrete. Should oil penetrate the sealer, that area can be degreased with QC CONCRETE DEGREASER AND NEUTRALIZER\* and recoated with a QC SOLVENT-BASED SEALER.
- Remove any QC SOLVENT-BASED SEALER using QC SEAL STRIP\*.
- *Maintain* the sealed surface with regular cleaning:
  - Day-to-Day Cleaning QC SOLVENT-BASED SEALERS, like all surface sealers, must be kept clean for maximum durability and protection. Frequent sweeping or vacuuming of loose soils will significantly increase the wear-life of QC SOLVENT-BASED SEALERS.
  - *Maintenance Cleaning* Clean sealed surfaces with QC FLOOR CLEANER\* (a water-based detergent cleaner), rinse and let dry.
  - Removing Ground-in Soils For removal of ground-in soils, use QC FLOOR CLEANER\* diluted to two to four ounces per gallon of water, scrub with a low-speed buffer. Rinse by pressure washing thoroughly. Let dry before allowing traffic.

#### Limitations

#### ■ These Products are Highly Flammable.

- Keep away from heat, sparks, and flame. Vapors may cause flash fire. Do not smoke. Extinguish all flames and pilot lights, and turn off stoves, heaters, electric motors and other sources of ignition during use and until all vapors are gone. Prevent buildup of vapors by opening all windows and doors to achieve cross-ventilation. Use only with adequate ventilation.
- Use on interior concrete: If used on interior concrete, ensure adequate ventilation and block all HVAC ventilation ducts which may distribute solvent odor.
  - Do not breathe vapors or spray mists. Ensure fresh air entry during application and drying.
  - Prevent buildup of vapors by opening all windows and doors to achieve cross-ventilation. Use only with adequate ventilation.
- Do not apply when concrete surfaces or ambient temperatures are below 40 °F and above 90 °F. Use with adequate ventilation and keep away from open flames.
- If solvent odor is objectionable, the use of a water-based, low odor product, such as QC CEMSEAL\*, QC PERMASEAL\* or QC SURPRO WB Matte\*, may be preferred.
- QC SOLVENT-BASED SEALERS will protect concrete from dusting and soiling if applied properly, evenly, with adequate film thickness, and with sufficient coverage as outlined in the application directions. Insufficient number of

coats when applying a QC SOLVENT-BASED SEALER will result in inadequate protection for the concrete.

- Failure to remove dirt and debris from the surface or failure to properly clean the surface will result in premature wear and will impair penetration.
- Adhesive-backed tape (such as duct tape) left on a QC SOLVENT-BASED SEALER over an extended period of time will create a chemical "weld" between the tape and the sealed substrate. If this happens, the sealer may be subject to delamination. Delamination can also occur when plastic or synthetic rubber mats are placed on the surface and left undisturbed over extended periods and when rubber tires on the sealed surface have been exposed to heat.

#### Coverage Rates and Drying Times

Coverage rates may vary depending on the texture, porosity, condition of the concrete, the application method, and other local conditions. Two light coats of QC SOLVENT-BASED SEALERS at the recommended coverage rates are usually sufficient to seal and protect. However, if you want increased gloss, durability, and extra protection, apply additional coats after initial coats are dry.

- Smooth Finish Material usage is 300-500 square feet per gallon/coat.
- Rough or Broom Finish Material usage is 250–400 square feet per gallon/coat.

**Drying times** will vary depending on surface porosity, temperature, humidity and other local conditions.

Note: When the air temperature reaches 85 °F or higher and the surface to be sealed is in the direct sunlight, the temperature can be 10 -20 degrees higher thus causing the sealer to flash off which in turn may cause blistering or bubbling of sealer. If this occurs wait for the temperature to drop and apply a light thin coat of xylene to reemulsify the sealer.

#### QC ULTRA SEAL, QC ULTRA SEAL 100 VOC and QC SOLVENT SEAL VOC III

- Set to Touch Surface can be lightly touched 30 to 60 minutes after application.
- *Recoat* Surface can be recoated two to four hours after each application.
- *Light Traffic* Light traffic can be allowed 24 hours after final coat.

# ■ QC ULTRA SEAL, QC ULTRA SEAL 100 VOC and QC SOLVENT SEAL VOC III will dry rapidly. Avoid applying product with a nap roller. Package Sizes

QC SOLVENT-BASED SEALERS are available in 1-, 5- and 55-gallon units.

#### **Applicable Standards**

#### QC ULTRA SEAL

QC ULTRA SEAL conforms to most California Air Quality Management VOC regulations, and to federal regulations for all states.

- ASTM D2047 exceeds slip-resistance requirements
- ASTM D2801 for leveling
- ASTM D3153 for recoatability
- ASTM D523 for gloss (QC ULTRA SEAL is 90)

#### QC ULTRA SEAL 100 VOC

QC ULTRA SEAL 100 VOC conforms to ALL Arizona and California Air Quality Management VOC regulations, and to federal regulations for all states.

- ASTM D2047 exceeds slip-resistance requirements
- ASTM D2801 for leveling
- ASTM D3153 for recoatability

#### QC SOLVENT SEAL VOC III

QC SOLVENT SEAL VOC III conforms to most California Air Quality Management VOC regulations, and to federal regulations for all states.

- ASTM D2047 exceeds slip-resistance requirements
- ASTM D2801 for leveling
- ASTM D3153 for recoatability
- ASTM D523 for gloss (QC SOLVENT SEAL VOC III is 93)

#### Technical Data

Please refer to the corresponding MSDS for hazard-related information.

#### *QC ULTRA SEAL*

- Color......Clear (unless tinted to QC specification colors)
- Odor ..... Sweet
- Solids Content..... 23%
- Flash Point .....-4 °F
- VOC Content...... Less than 350 grams per liter
- Resin ...... Pure acrylic, non-yellowing

#### QC ULTRA SEAL 100 VOC

- Odor ..... Sweet
- Solids Content ..... 25%
- Flash Point .....-4 °F
- VOC Content...... Less than 80 grams per liter
- Resin ...... Pure acrylic, non-yellowing

#### QC SOLVENT SEAL VOC III

- Odor ..... Sweet
- Solids Content..... 25%
- Flash Point ..... -4 °F
- VOC Content...... Less than 340 grams per liter
- Resin ...... Pure acrylic, non-yellowing

#### Colors

Using QC SOLVENT-BASED TINT CONCENTRATE\*, QC SOLVENT-BASED SEALERS may be tinted to match any color shown on any QC color chart or may be tinted to match any custom color. Order enough tinted sealer to complete a specific job as tint colors may vary slightly from batch to batch.

#### Shelf Life and Storage

All QC SOLVENT-BASED SEALERS have a shelf life of one year. Store product indoors, away from heat, direct sunlight and sources of ignition. Do not allow product to freeze.

#### **Product Handling**

For complete instructions on handling and use, consult the corresponding Material Safety Data Sheet before using product.

#### Warranty

QC SOLVENT-BASED SEALERS are warranted to be of uniform quality within manufacturing tolerances. Since control is not exercised over its use, no warranty, expressed or implied, is made as to the effects of such use. Seller's and manufacturer's obligation under this warranty shall be limited to refunding the purchase price of that portion of the material proven to be defective. The user assumes all other risks and liabilities resulting from use of this product. If you have any questions, please contact QC CONSTRUCTION PRODUCTS.

\*PLEASE REFER TO THE QC WEBSITE FOR THE CORRESPONDING PRODUCT INFORMATION BULLETIN CONTAINING TECHNICAL AND APPLICATION DATA.

# www.qcconstructionproducts.com

For complete information on all QC products—including product information catalogs, product brochures, color charts, technical specifications, sales aids and more—contact QC CONSTRUCTION PRODUCTS.

QC CONSTRUCTION PRODUCTS® is a registered trademark and servicemark with the U.S. Patent Office and other countries. © 2008 QC CONSTRUCTION PRODUCTS Printed in U.S.A. 10.08 1M

#### **QC CONSTRUCTION PRODUCTS**

11901 Gavin Rd • Laredo, TX 78045 Customer Service 800.453.8213

al specifications, sales aids and more—contact QC CONSTRUCTION PRODUCTS.

QC CONSTRUCTION PRODUCTS available through:

ON STRUCTION PRODUCTS® is a registered trademark and servicemark with the U.S. Patent Office and other countries.

www.qcconstructionproducts.com 
Nationwide distribution and district sales offices