

Stain and wear resistant, Coval Stone is an outstanding coating for natural stone.

A professional grade sealer, **Coval Stone** stops acid etching and stains on marble, granite, and other natural stone substrates with a transparent barrier. Always use Coval Stone Primer underneath Coval Concrete to seal the pores before application.

I. PRODUCT DESCRIPTION

Coval Stone is a thin film-forming, single component, clear coating designed to protect natural stone and other architectural surfaces from surface wear and staining. On a Coval primed surface, it creates a covalent bond with the substrate and is extremely hard, UV stable (will not yellow), and resistant to moisture, stains, scratches, dirt, acids, and graffiti.

II. RECOMMENDED USES

- A. Marble
- B. Granite
- C. Polished, densified concrete
- D. Porcelain and ceramics
- E. Mixed substrates
- F. Transition strips

III. PRODUCT CHARACTERISTICS

A. PROPERTIES

1. Color: Clear, or clear to slight off-white (depending on temperature and humidity)
2. Finish: High-Gloss
3. Vehicle Type: Solvent Base
4. Flash Point: (C Penskey-Martens closed cup) -9°C/15°F
5. VOC: Less than 100 g/L (US EPA guidelines)
6. Weight/Litre: 7.36 lb./gal.

B. DRY TIME

1. Dry Time: @ 77°F, 60% RH
2. Touch Dry: 2-4 hours
3. Cure Time: 4-5 hours with heat buffing
4. Cure time: 12 hours with no buffing.
5. Can be recoated once the first coating is dry and hard. Estimated time 4 hours under normal conditions.

C. SPREAD RATE PER COAT (recommended) 400 sq. ft. per gallon

D. TESTING RESULTS

| | |
|--|------------|
| ASTM D-4060 Taber Abrasion 500 g weight per wheel, 1000 rotations- | <1-3 mg |
| | 9H |
| ASTM D4541 Adhesion | 11,721 kPa |
| ASTM D3359-97 Adhesion | 4 |

| Staining Agent | Resistance Time (hours) | Cleaner Required |
|------------------|-------------------------|------------------|
| 10% Citric Acid | 12 | Dry Cloth |
| Balsamic Vinegar | 12 | Dry Cloth |
| Betadine | 6 | Wet Cloth |
| Coffee/Tea | 48+ | Dry Cloth |
| Permanent Marker | 48+ | Solvent |
| Red Wine | 48+ | Dry Cloth |

E. INDOOR SAFETY

During application, 1) Turn off pilot all lights or open flames in the building, 2) always wear safety goggles and 3) wear an OSA approved respirator.

IV. APPLICATION INSTRUCTIONS

All installers should be experienced stone restoration professionals. Contact Coval for training at sales@cvltechnologies.com.

A. GENERAL

Coval Stone is a moisture cured coating. It will cure faster in hotter and more humid conditions. The substrate must be properly identified. Coval Stone must be applied over Coval Stone Primer, to assure no contamination in the stone exists. If the primer is rejected, it indicates a defect, and the primer needs to be buffed out, the contamination addressed, and the primer reapplied. Coval Stone application is the last step. The Coval training provides specific instructions. Overall:

- Properly clean and prepare surface.
- Apply Primer (see Coval Stone Primer technical data sheet for instructions).
- Buff out – burnishing adds heat, which reduces dry time.
- Apply Coval Stone.

B. Applicator pads and foam brush

1. Pour and spread via foam or applicator pad. Let product flow and self-level.
2. Working time is 1 - 2 minutes under normal conditions.
3. Make sure wet edge keeps moving.
4. Buff out after dry to touch, or 4 hours, with a heat pad. Start at low speed. The heat will remove minor imperfections. Buffing out will promote curing.

C. Spray application or larger areas

1. Stone floor - Coval can be sprayed by using an airless sprayer or acetone pump sprayer.
2. Vertical wall – Coval recommends using an HVLP with 1.2-1.4mm spray tip at pressure between 8-15 PSI.
3. A commercial air scrubber is recommended to limit the amount of airborne solvents when spraying in a confined area.

- d. Cover the adjacent areas to protect from overspray.

B. SURFACE PREPARATION

1. The surface preparation process will depend strictly on the type of surface that is being coated. Surface must be primed with Coval Stone Primer and clean. See the Stone Primer TDS for instructions. Please attend the Coval Certification Training Program for specific guidelines.

2. Test Area

a. When using **Coval Stone** on a new substrate for the first time, follow the steps on applying the Coval Stone Primer TDS, then test it on a small, inconspicuous area to ensure adhesion and determine that the desired look is achieved. Due to the wide variety of texture and porosity of stone surfaces and the various methods of application and environments, different reactions may occur in curing. Once satisfied, work can begin.

b. There will be a slight enhancement or change in appearance from the natural surface when using Coval coatings.

- c. If ever in doubt about a coating, TEST it first.

C. INTERRUPTION OF WORK

Plan to start and finish the job in one event. In case of a failure, have acetone and rags on standby to remove the uncured coating to start over.

V. STORAGE

If excess coating remains in a container, Coval recommends the following:

- A. Put a nitrogen or argon blanket on the top of the remaining liquid in the container, **OR**
- B. Move the remaining coating to a smaller container with as little air/oxygen in the container as possible. Use only HDPE containers.
- C. Store in a temperature controlled location. Do not store solvent-based products in the sun, warm storage area, or in a sun-heated vehicle as overly heated products can turn dark in color and remain tinted when applied.
- D. Shelf life: 12 months unopened
- E. Maximum storage temperature: 80°F

VI. CARE AND MAINTENANCE

- A. Wipe up spills as soon as possible.
- B. Do not use heavy abrasive pads on auto-scrubbers.
- C. A soft brush or white buffing pad is sufficient to remove stains from the surface once cured.

- D. Neutral pH cleaners, disinfecting cleaners, and de-greasers will not damage the finish and can be used regularly.
- E. Remove paint spills or graffiti with rubbing alcohol and rinse with water.
- F. If high traffic areas show wear, lightly sand and spray a fresh coat in the worn area.
- G. Maximum temperature that Coval Stone can withstand continuously and under peak conditions when applied to a surface is, Continuous: 250°F, Peak: 600°F

VII. SAFETY AND ENVIRONMENTAL

- A. **During application, turn off all pilot lights or open flames in the building.**
- B. Please wear OSHA approved PPE, including OSHA 1910.134 and ANSI Z88 2 respiratory protection and safety goggles.
- C. Fresh air and exhaust should be provided in enclosed work areas. If inhaled, remove affected person to fresh air and call physician immediately if physical difficulties occur.
- D. Wear butyl-rubber gloves and other skin protection to avoid contact. In the event of contact with skin, wash skin thoroughly with soap and water.
- E. Chemical safety goggles or splash shields are required. Do not wear contacts without eye protection. Immediately flush your eyes with water for 15 minutes after contact and get medical attention.
- F. If accidentally swallowed, rinse mouth thoroughly and obtain immediate medical attention.
- G. In enclosed areas, make sure to have an observer watching the applicator for any signs of physical distress.

For more information, go online to www.covaltechnologies.com.