

# **ENDURABLE CONCRETE STAIN**

Endurable Concrete Stain is a semi-transparent penetrating stain. Endurable technology has made the particle size smaller and lowered the viscosity, making it easier to mix. UV protection makes this an excellent stain for exterior applications as well as interior applications. It is quick, easy to apply, and ready to be sealed in a short period of time.

# **ADVANTAGES**

- Non-reactive and semi-transparent
- · Will penetrate and color most porous surfaces
- May be mixed in water, acetone, denatured alcohol, or Endurable coatings
- Excellent versatility allows for interior and exterior use
- Low VOC content
- Low odor
- Small particle size to allow maximum penetration
- Excellent lightfastness provides optimum resistance to UV rays
- Concentrated to minimize shipping costs and maximize shelf space
- · Application versatility provides infinite appearance options
- Endurable sealers or coatings may be applied immediately after stain is dry to the touch (typically 30 minutes or less when mixed in water and 5 minutes or less when mixed in acetone)
- No acrylic binders = no bond breaker for sealers
- Colors may be mixed together to form custom colors

## WHERE TO USE

Use on concrete garage floors, driveways, patios, walkways, countertops, pool decks, commercial floors, parking garages, masonry, and more.

# PACKAGING

1-gallon and 5-gallon concentrates

# **TEST AREA**

Performing a test area is advisable to make sure product is suitable for the surface.

# **COVERAGE RATES**

#### **INTERIOR SURFACES**

500 - 800 square feet per gallon depending on porosity of surface and level of preparation

### **EXTERIOR SURFACES**

300 - 700 square feet per gallon depending on porosity and texture

# **PRODUCT AVAILABILITY**

Product is available at retail distributors around the world. Visit endurableproducts.com to find the nearest distributor.

# **REGULATORY INFORMATION**

VOC CONTENT - <10g/L when mixed in water

## LEED

At less than 10 grams per liter of VOC content when mixed in water, product contributes towards LEED certification points.





# PREPARATION

Endurable Concrete Stain may be used on both interior and exterior concrete. Apply to dry, porous concrete. New concrete should be allowed to cure for at least 28 days. All surfaces need to be clean, dry, and free from bond-breaking contaminants. Endurable Surface Cleaner is the recommended product to use for surface preparation. Please refer to the technical data sheet for application instructions of the Endurable Surface Cleaner. ACIDIC OR ALKALINE CLEANERS AND ETCHING PRODUCTS ARE NOT RECOMMENDED.

#### **INTERIOR SURFACE PREPARATION**

Before application of stain, make sure surface is free from dirt, oils, glues, or previous sealers. For optimal results, open troweled concrete mechanically. Diamond grind the surface to a suitable profile. Please refer to grinding specifications on Endurable website. Repair and grout cracks, pop-outs, and joints with suitable joint and patching compounds.

Hardening: Softer concrete may need to have 1 - 3 applications of Endurable Concrete Hardener depending on concrete hardness. A Mohs hardness test kit is recommended to test the hardness of the surface. Grouting and Joint Repair: Apply suitable joint and grout materials. Grind off excess materials before application of

Endurable Concrete Stain.

#### **EXTERIOR SURFACE PREPARATION**

Before application of stain, make sure the surface is free from dirt, oils, and sealers. Clean the surface with Endurable Surface Cleaner in conjunction with pressure washing. Use per instruction on Endurable website. Allow the concrete to dry before application process.

## **REMOVAL OF EXISTING SEALERS**

It is advisable to remove all existing sealers with Endurable Power or Vertical Stripper. Follow instructions and videos on how to remove existing sealers on Endurable website.

## **COUNTERTOPS**

Endurable Concrete Stain is an excellent choice for concrete countertops. Follow the interior surface preparation instructions above.

## **BEFORE MIXING**

Settling of the pigment is normal and to be expected. Before mixing product, shake product vigorously. It also may be helpful to turn the bottle upside down for a few minutes before shaking. IT IS NOT RECOMMENDED TO BREAK DOWN ENDURABLE CONCRETE STAIN CONCENTRATES. SAMPLE SIZES ARE AVAILABLE AND ARE PRE-MIXED IN WATER.

# **CARRYING AGENT OPTIONS**

- Water
- Acetone
- Denatured alcohol
- Endurable sealers or coatings

### MIXING

Dispense product into suitable carry agent. Rinse the bottle several times. Any pigment remaining may be discarded. Combine product and carrying agent at low speed with a drill and paddle.

## **APPLICATION TOOL OPTIONS**

- Pump up sprayer capable of spraying stain with a .05 to .15 gpm conical tip at 40 psi (on smooth surface concrete use a maximum .05 - .08 gpm conical tip) - If spraying acetone or denatured alcohol, use a solvent rated sprayer
- HVLP (cup gun) for countertop application





# **APPLICATION INSTRUCTIONS**

Apply product via pump sprayer with a conical tip. Tip size of .05 to .15 gpm at 40 psi is recommended to reach proper coverage rates. After the stain is applied over an interior application, there may be residue that can be removed by buffing the floor. If you do not wish to buff the floor, you may wear booties or spikes to avoid leaving footprints in the residue. After the stain is dry to the touch, seal with an Endurable sealer or coating. A light coat is recommended as the stain will go far and over-application will result in excess residue as well as lower coverage rates.

### WARNINGS

### ALWAYS PERFORM TEST AREAS. CONCRETE MUST BE DRY. SHAKE Occasionally during application to keep color in solution.

ALWAYS BE CAUTIOUS WITH FLAMMABLE CARRYING AGENTS. Extinguish all ignition points and use approved respirators when applicable. Follow carrying agent manufacturer recommendations and warnings.

## **STAINING TECHNIQUES**

To see the full effect of the colors, the stain must be sealed with an Endurable product. Choice of carrying agent may depend on type of concrete.

The use of different carrying agents, the ability to apply many different techniques, and 21 colors from which to choose, make the Endurable Concrete Stain one of the most versatile products in the industry. Unlike reactive or acrylic stains, Endurable Concrete Stain offers endless options and looks. The look may be changed even after Endurable sealers or coatings have been applied. Applicators may use different carrying agents, sprayers, as well as choices of color, to achieve the final look.

#### STAINING WITH ACETONE OR DENATURED ALCOHOL

When using an acetone sprayer with a decorative tip, stains may be layered over other colors to produce many different looks. Stains mixed in acetone or denatured alcohol dry extremely fast and can be sealed minutes after application. Vertical or sloping surfaces may work best with acetone as it will dry faster (this may prevent dripping or movement of the stain.)

#### **STAINING WHEN MIXED WITH WATER**

Applying the stain mixed in water can produce similar effects or looks as with acetone or denatured alcohol but does take longer to dry. Two different stain colors may be "flooded" or sprayed into each other to produce marbleized or variegated looks. Dry times are longer compared to acetone/denatured alcohol.

#### **LAYERING THE STAINS**

Stains may be layered over each other in random patterns. A dark colored stain may be applied first over some or all the floor. Then a lighter color may be applied covering all or some of the floor. This can help to create a variegated or mottled look. This process may also be reversed. With a light color applied first, and a dark color second.

To create different effects, carrying agents may be combined. Water may be added to acetone or denatured alcohol for different results. Adding water to stain mixed in acetone will allow the stain to not dry or "flash off" as quickly when staining.





## STAINING OVER ENDURABLE CONCRETE SEALER

#### Mixed in water

Endurable Concrete Stain mixed in water can be sprayed over Endurable Concrete Sealer that has cured long enough to walk on without leaving footprints. This process typically takes 3 - 8 hours after application depending on porosity and weather conditions. This staining system can deliver durable and vivid results, while using zero solvents. After the first coat of Endurable Concrete Sealer is applied, apply a second coat mixed at 1:1. When dry to walk on, apply stain mixed in water. Two or three applications may be applied before the sealer becomes to hard for the stain to be absorbed. When finished, apply a final coat of sealer mixed at 1:1

#### Mixed in acetone

Endurable Concrete Stain may penetrate Endurable Concrete Sealer when mixed in acetone for the first day or two after application. If applying stain mixed in acetone over sealer, spray very lightly. Too much acetone can "cook" the sealer. Upon further curing, the stain cannot penetrate unless an additional coat of sealer is applied. When applying Endurable Concrete Stain over sealer mixed in acetone, make sure there is no residue on the surface when sealing with a T-Bar, microfiber pad, or roller. Residue may be "moved" over the surface and alter the look of the finished product.

#### **COLOR SEALING**

Endurable Concrete Stain may be mixed into Endurable sealers or coatings for a "color seal" option. Mix an Endurable sealer or coating as instructed and add Endurable Concrete Stain concentrate. Add more or less stain depending on desired look. Adding more stain can give a solid look, while adding less may give an accent of color.

# LIMITATIONS

Endurable Concrete Stain must be sealed with an Endurable sealer or coating. Stain should be applied to dry concrete.

# WARRANTY

Evaluate whether this product is suitable for the intended application. Conditions of product use are outside of HDIP's control and vary widely, the following is made in lieu of all express or implied warranties of merchantability: HDIP's only obligation and the customer's only remedy are replacement of product, at the option of HDIP INC. In no case will HDIP INC be liable for any direct, indirect, special, incidental, or consequential damages including lost profits, goodwill, or business opportunity.

# **TECHNICAL ASSISTANCE**

For technical questions or support, call 800-910-3120 ext. 1 between the hours of 8:30 am to 4:30 pm PST.

# **STORAGE AND SHELF LIFE**

Shelf life is undetermined, but a minimum of 5 years when stored in original unopened containers. Store product between 40 and 77 degrees Fahrenheit. Keep product free from excessive heat, moisture, and freezing.

## **SAFETY**

Use with proper ventilation when spraying the stain mixed with solvents. Extinguish all ignition sources when mixing with flammable solvents. As with any chemical, respirators, eye protection, and gloves are recommended.

