

DC390 Water Based Urethane Topcoat

TOPCOAT

PRODUCT DESCRIPTION:

EPIC DC390 is a bio-based urethane topcoat with excellent thermal shock capabilities. This product is normally applied on top of EPIC DC380 Urethane Slurry Coat which has been broadcast with aggregate. Exhibits excellent chemical and abrasion resistance. Functions as the Topcoat in the Epic Urethane Slurry System. Normal usage applications include food and beverage processing facilities, chemical processing facilities, commercial and industrial kitchens as well as freezers and coolers. Exhibits low to no odor.

CHEMICAL RESISTANCE	
CHEMICAL EXPOSURE	PERFORMANCE
Acetic Acid 10%	PASSED
30% Nitric	PASSED
Sodium Hydroxide 50%	PASSED
Sulfuric Acid 30%	PASSED
Xylene	PASSED

Spot testing per ASTM D1308 for Mustard, Ketchup, Lactic acid, vinegar, and lemon juice were performed and no physical damage to the exposed surface was observed. In 24 hour immersion testing, the following results were observed.

CURE SCHEDULE (77 Degrees F)		
Pot Life (0.25 cu. Ft. mix)	15 minutes	
Heavy Foot Traffic	24 hours	
Light Foot Traffic	12 hours	
Full Cure	7 days	
Application Temperature: 45-85 degrees F with relative humidity below 85%.		

BENEFITS:

Seamless hygienic finish with no grout lines Low odor, fast installation and fast cure. Thermal shock and chemical resistance. Attractive Matte Finish Resistant to fungi growth per ASTM G-21

STANDARD COLORS:

Gray, tan and red. (Special colors available with minimum quantities.)

SOLIDS BY WEIGHT:

Approximately 95% solids (liquids mixed with aggregate)

VOLATILE ORGANIC CONTENT:

5 grams per liter

FILM THICKNESS:

Final film thickness varies, dependent on substrate texture.

COVERAGE PER KIT:

The standard kit (approximately 0.28 cu. Ft.) typically yields 160-170 square feet per kit over 20/40 broadcast.

PACKAGING INFORMATION / MIX RATIO:

(7.25# part **A** in a gallon container, not full + 7.25# part **B** in a gallon container not full + 1 bag blended aggregate at 9.2# and 1# bag of dry pigment (weights approximate)

SHELF LIFE:

6 months for unopened and properly stored containers.

FINISH CHARACTERISTICS:

Matte Finish

COMPRESSIVE STRENGTH:

5,900 psi @ ASTM C-579

TENSILE STRENGTH:

1,250 psi @ ASTM C-307

BOND STRENGTH:

100% concrete failure @ ASTM D-4541

FLEXURAL STRENGTH:

2,900 psi @ ASTM C-580

RESISTANCE TO FUNGI GROWTH:

Passes rating of 1 @ ASTM G-21

IMPACT RESISTANCE:

160 in. lbs @ ASTM D-4226

VISCOSITY

When mixed, it forms a spreadable liquid.

DOT CLASSIFICATIONS:

Not Regulated

HEAT RESISTANCE:

Can withstand up to 200F degrees **PRIMER**: None normally required

MIXING AND APPLICATION INSTRUCTIONS:

SURFACE PREPARATION:

For applications over the DC380 All dirt, debris, dust and foreign contaminants must be removed to assure a trouble free bond to the broadcasted slurry.

PRODUCT MIXING:

This product is packaged in pre-measured kits. Use the entire kit - do not modify. Pour the part A into a five gallon mixing vessel and add one bag of the powder pigment to the part A and mix for about 15 seconds using a 1/2" drill and jiffy type mixing paddle. Next, add the part B and again mix for about 15 seconds. Finally, gradually add all of the contents from the provided aggregate filler bag into the liquid mixture and blend thoroughly until all particles are thoroughly wetted out; this will usually take about two minutes. Use slow speed mixing equipment to avoid adding air into the mix. After mixing, transfer the mixed material to another pail (the transfer pail) and again remix. The material in the transfer pail is now ready to be applied on the cured broadcasted slurry. Remix occasionally to prevent settling of aggregate. Improper mixing may result in product failure. Make sure to apply the product immediately after it is completely mixed.

PRIMING:

No primer is necessary on a properly prepared broadcasted slurry.

PRODUCT APPLICATION:

Immediately after mixing, pour mixed material on the floor in ribbons. Using a flat squeegee, move the material uniformly across the surface. Roll and back-roll material using a 1/4" nap roller to a uniform appearance. Do not over work.

RECOAT OR TOPCOATING:

In some areas, a suitable novolac or other types of UV resistant coatings can be used, depending on specific chemical resistance or UV stability requirements.

CLEANUP:

For cleaning any application, equipment, water can be used. The urethane component container is best cleaned with a suitable solvent.

FLOOR CLEANING:

Caution! Some cleaners may affect the color of the floor installed. Test each cleaner in a small area, utilizing your cleaning technique. If no ill effects are noted, you can continue to clean with the product and process tested.

RESTRICTIONS:

Restrict the use of the floor to light traffic and non-harsh chemicals until the coating is fully cured (see technical data under full cure). It is best to let the floor remain dry for the full cure cycle. Dependent on actual complete system application, surface may be slippery, especially when wet or contaminated; keep surface clean and dry.

LIMITATIONS

- Color stability or gloss may be affected by high humidity, low temperature, chemical exposure or lighting such as sodium vapor lights. Product is not color or UV stable.
- Do not install on wet concrete.
- Floors should be sloped to drain to prevent standing water or chemicals and spills should be removed as soon as possible
 to prevent a slipping hazard.
- Proper mixing is important for product performance.
- High heat exposure may discolor the surface.
- Colors may vary from batch to batch. Therefore, use only product from the same batches for an entire job.
- Always apply a suitable test area to evaluate the product performance and suitability prior to undertaking the entire project. Samples are available upon request.
- Mixtures of chemicals and applications with exposures to chemicals at elevated temperatures should be thoroughly evaluated before applying.
- Substrate temperature must be 5°F above the dew point.
- All new concrete must be cured for at least 15 days prior to application.
- Moisture vapor transmission should be less than 12 pounds or less per 1,000 sq. ft. over a 24 hour period as per ASTM E1907.
- Physical properties are typical values and not specifications.

PRODUCT STORAGE:

Store product in an area as to bring the material to normal room temperature before using. Continuous storage should be between 50 and 80 degrees F. Low temperatures may cause product crystallization. Do Not Freeze.

NOTICE TO BUYER: DISCLAIMER OF WARRANTIES AND LIMITATIONS ON OUR LIABILITY

We warrant that our products are manufactured to strict quality assurance specifications and that the information supplied by us is accurate to the best of our knowledge. Such information supplied about our products is not a representation or a warranty. It is supplied on the condition that you shall make your own tests to determine the suitability of our product for your particular purpose. Any use or application other than recommended herein is the sole responsibility of the user. Listed physical properties are typical and should not be construed as specifications. NO WARRANTY IS MADE, EXPRESSED OR IMPLIED, REGARDING SUCH OTHER INFORMATION, THE DATA ON WHICH IT IS BASED, OR THE RESULTS YOU WILL OBTAIN FROM ITS USE. NO WARRANTY IS MADE, EXPRESSED OR IMPLIED, THAT OUR PRODUCT SHALL BE MERCHANTABLE OR THAT OUR PRODUCT SHALL BE FIT FOR ANY PARTICULAR PURPOSE. NO WARRANTY IS MADE THAT THE USE OF SUCH INFORMATION OR OUR PRODUCT WILL NOT INFRINGE UPON ANY PATENT. We shall have no liability for incidental or consequential damages, direct or indirect. Our liability is limited to the net selling price of our product or the replacement of our product, at our option. Acceptance of delivery of our product means that you have accepted the terms of this warranty whether or not purchase orders or other documents state terms that vary from this warranty. No representative is authorized to make any representation or warranty or assume any other liability on our behalf with any sale of our products. Our products contain chemicals that may CAUSE SERIOUS PHYSICAL INJURY. BEFORE USING, READ THE MATERIAL SAFETY DATA SHEET AND FOLLOW ALL PRECAUTIONS TO PREVENT BODILY HARM.