

REVISION 10/20/18

Product Description

Polycoat PC FMB is a clear 2-component, 100% solids, low odor, low viscosity epoxy that is specifically formulated as a moisture barrier coating to treat new and existing concrete floors with high moisture and high pH. Polycoat PC FMB can be used as a one-coat moisture vapor barrier coating suitable for various types of concrete. The low viscosity formula not only promotes deeper concrete penetration for superior substrate adhesion, but also generates higher propensity for sealing and blocking moisture drive than standard epoxy flooring product.

Recommended Uses

- Manufacturing & Warehouse Floors
- Laboratories
- Mechanical Rooms
- Animal Care Areas
- Shop Floors
- Loading Docks
- Pharmaceutical Plants
- Retail Stores
- Multiple-Unit Housing
- Institution Facilities
- Excellent Moisture Blocker
- Underneath any Coatings Showing Concrete Contamination
- Underneath Various Floorings

Benefits

- 100% Solids, Low VOC, Low Odor
- Vapor Control for High Moisture and High pH Slabs
- One-Coating Moisture Vapor Barrier
- Excellent Concrete Adhesion
- Fast Drying Times
- Low Viscosity for Deeper Concrete Slab Penetration
- Controlled Vapor Pressure up to 25lbs

Color

Clear

Packaging

3 gallons & 15 gallons (2 Sided Kits)

Coverage

Approximately 100 sq.ft. per gallon @ 16 mils.

Storage

This product has a maximum shelf life of one year when stored off the ground in a dry area at 50° to 110°F, in the original sealed container.

Handling/Safety

Warning! Eye and skin irritant. May cause dermatitis and sensitization.

Always read and understand the product SDS. Avoid contact with eyes, skin or clothing. Avoid breathing vapor, mist or spray. Use with good ventilation.

Limitations

This product is best suited for application in temperatures between 60°F and 90°F. Do not use to grout coat over

TECHNICAL DATA

Components	2 Side
Visual Appearance	High Gloss
Density	9.0 lb/gal
VOC Content	<5g/l
Pot Life @ 70°F, 50% RH	10-15 Minutes
Equipment	Brush, Roller, & Flat Rubber Squeegee
Number of Coats	1 @ 16 mils
Theoretical Coverage	100 ft ² /gal 16 mils WFT
Dry to Touch @ 70°F, 50% RH	3-4 Hours
Life Traffic	N/A
Full Cure	N/A
Recoat Time @ 70°F	12 to 24 Hours
Min. Application Temp.	50°F
Mix Ratio by Volume	2:1 (A/B)


MECHANICAL PROPERTIES

Surface Prep Requirements	ICRI CSP-3, Primed
Adhesion, ASTM D7234	>400psi, Concrete Failure
Hardness, Konig (15 mils) ASTM D4366	100
Tensile Strength, ASTM D2370	7500 psi
Tensile Elongation, ASTM D2370	1.5%
Compression, ASTM D695	10,000 psi
Hardness (Shore D), ASTM D2240	75-85
Water Absorption, ASTM D570	<0.1%
Flame Test, ASTM D648	Class 1
Abraision Resistance, ASTM D4060	30 mg loss
Coefficient of Friction, ASTM D2047	0.7 Smooth
Impact Resistance, ASTM D2794	160 in/lb
Permeance ASTM E96	0.022 (gr/ft ² /hr/inHg) 100 sq.ft./gal @ 16 mils

CHEMICAL DATA @ 70°F

pH	4 to 13
Inorganic Acids	Good
Organic Acids	Good
Alkali	Excellent
Solvents	Good
Hydrocarbons	Good

Note: Although testing is critical, it is not a guarantee against future problems. This is especially true if there is no vapor barrier or the vapor barrier is not functioning properly and/or you suspect you may have concrete contamination from oils, chemical spills or excessive salts



aggregate. [Certain colors appear white when scratched such as blue based.] Higher temperatures will result in faster dry times and/or poor workability. Color may vary due to batch-to-batch variation, especially in higher temperature. Do not apply over ponding water.

First Aid

In case of contact:

1. Eyes: Immediately flush with water for at least 15 minutes.
2. Skin: Immediately remove from skin with dry cloth followed by thorough washing with soap and water.
3. Inhalation: Remove to fresh air. If breathing is difficult, give oxygen.
4. Ingestion: Immediately call a Poison Center/Doctor. Do NOT induce vomiting. If vomiting occurs naturally, lie on your side, in the recovery position.

Caution

Always read and understand the specific product data guide and SDS sheets before using this product. For more information contact Polycoat Products.

Check the Concrete

Concrete must be structurally sound and free of curing membrane, paint or other sealer. If you suspect that the concrete has been previously sealed, call Polycoat Products technical support for further instructions.

Check for Moisture

Concrete must be dry before application of this floor coating material. Concrete moisture testing must occur. Calcium chloride testing or "In-situ" relative humidity testing is recommended. Test methods can be purchased at www.astm.org, see ASTM F1869-11 or F2170-11, respectively or follow manufacturer's instructions. Readings must be below the defined threshold as specified for each Polycoat Products system to be installed directly to the concrete substrate. Please refer to the appropriate Technical Data Sheet for this information.

Check the Temperature & Humidity

Floor temperature and materials should be between 65°F (18°C) and 90°F (32°C). Humidity must be less than 95%. DO NOT coat unless floor temperature is more than (5°F) over the dew point.

1. SURFACED PREPARATION

Requires ICRI CSP 3

This product requires proper surface profile to perform as expected. Substrate must be mechanically profiled (ASTM 4259-83), clean, sound, and dry.

2. APPLICATION EQUIPMENT

Tools: 3" Disposable brush, low speed drill (450 rpm) with a 3.5" Jiffler blade, 3/8" nap non-shedding phenolic core roller, and flat rubber squeegee.

3. MIXING

The temperature of the (A) and (B) portions should be between 70°F and 80°F (20°-25°C). Mix them separately to ensure a uniform consistency. For a 3 gallon kit add (Side-B) into (Side-A) in a 3.5 gallon bucket. Mix contents thoroughly until

all components are completely incorporated and no streaking is observed. Thinning is not recommended. The portions of each side is accurately measured to ensure optimum product performance. Pouring from one container to the other (boxing) during mixing is very helpful in ensuring complete mixing. Mix for 2 minutes.

4. ROLL ON

After mixing all contents as instructed, immediately pour out into a ribbon on the surface. Squeegee the material out evenly and check for desired film thickness by using a wet-film thickness gauge. Back-rolling and then cross rolling is critical. Allow to dry minimum of 12 hours before recoat.

Clean-Up

Clean-up mixing station, tools and application equipment immediately after completion. Use suitable solvent as specified by Polycoat Products' Technical Services Team or if permissible by law, xylene, as a general over-the-counter solvent. Observe all fire hazards, legal, and health and safety precautions when handling or storing solvents, particularly in confined spaces. Make sure the working area is well ventilated at all times during application and curing times.

Disposal

Dispose all excess materials, packaging, and other waste in accordance with federal, state, and local regulations.

Maintenance

Occasionally inspect the installed floor by spot cleaning and spot repairing any damaged or cracked areas. To prolong the life of the flooring system, a daily cleaning maintenance program is highly recommended to ensure the floor is safe for its intended purpose.

Technical Support

For any application questions, please call our Polycoat Products Technical Team. PLEASE SEE SAFETY DATA SHEET (SDS) FOR SAFETY AND PRECAUTIONS.

USE PRODUCT AS DIRECTED. KEEP OUT OF THE REACH OF CHILDREN.

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