

Surrounding You with Exceptional Protection

# **Blome Membrane 74 Waterproofing & Anti-Fracture Membrane**

#### PRODUCT DESCRIPTION

Blome Membrane 74 is a two-component, high solids, elastomeric polyurethane membrane. Membrane 74 cures to form a tough waterproof, anti-fracture membrane that is used under dairy brick and quarry tile flooring systems. Membrane 74 forms a chemical resistant and waterproof barrier beneath brick and tile floors. Membrane 74 offers anti-fracture capabilities when installing brick or tile over concrete floor slabs with nonstructural or hairline cracks. These membrane/brick systems are used for the installation of chemical resistant floors, trenches and sump linings. Membrane 74 exhibits excellent resistance to various chemicals, including oxidizing bleaches, acids, and caustic cleaning solutions. The material exhibits excellent bond strength to properly prepared and primed concrete and steel substrates. Blome Membrane 74 remains flexible over a temperature range of -60°F to 180°F and is suitable for temperature excursions up to 220°F and above in many applications.

**TYPICAL USES** 

Blome Membrane 74 Waterproofing & Anti-Fracture Membrane is suitable for use in a variety of applications including:

> Dairy Brick and Quarry Tile Flooring Food and Beverage Plant Flooring Pharmaceutical Plant Flooring Acid Brick Flooring, Sumps and Trenches

# **HANDLING CHARACTERISTICS**

Blome Membrane 74 is supplied as a two (2)-component product, in four (4) gallon, pre-measured units. Blome Membrane 74 is supplied in a semi self leveling, flowable consistency. This formulation has ideal handling properties and is smooth spreading for easy application by steel trowel or rubber squeegee. Typical trowel application is 60 mils (1/16") applied in two passes, wet on wet, each 1/32" thick. Blome Membrane 74 is best applied to horizontal substrates. For application on vertical surfaces such as curbs, walls, trench or sump sidewalls, add small amounts of Blome EC-THIX non-silica thixotrope to improve the material's ability to hang on vertical surfaces.

**TYPICAL PROPERTIES WET** 

> Components: Two (2) – Resin and Activator Mixed consistency:

Semi Self Leveling; Flowable 50°F 45 minutes

Pot life:

77°F 25 minutes

50°F 12 hours Initial set:

77°F 6 hours

Final cure 50°F 7 days minimum

77°F 5 days minimum

Color Black

Elongation 180% minimum

Solids Content >96%

Temperature Resistance 180°F (continuous)

220°F (excursions)

# **PACKAGING, ESTIMATING & STORAGE**

Blome Membrane 74 is supplied as a two (2)-component product, with a Resin and Activator. Membrane 74 components are packaged as follows:

Unit Size Four (4) gallon unit Coverage per unit
Resin (Part A) 30 lbs. Coverage per unit
Approx. 88 ft² @ 60 mils

(1 x short filled 5 gallon pail)

Activator (Part B) 2.76 lbs.

(1 x short filled ½ gallon can)

Shelf life for Membrane 74 components is twelve (12) months. Keep Membrane 74 components tightly sealed in original containers until ready for use. Store both components in a cool, dry place, out of direct sunlight, on pallets at temperatures between 50°F and 80°F. Protect components from water & weather in storage and on job site.

# **BID SPECIFICATION GUIDE**

Use Blome Membrane 74 Waterproofing & Anti-Fracture Membrane as manufactured by Blome International, O'Fallon, MO.

# JOB SITE ENVIRONMENTAL CONDITIONS

Weather conditions, especially dew point, should be constantly monitored. Final blast cleaning and application of membrane system must only be performed when the temperature of substrates will not fall within 5 degrees of the dew point. Dehumidification and/or temperature control may be necessary to meet this requirement. Use a surface thermometer to frequently monitor the temperature of substrates during membrane installation.

Blome Membrane 74 is best applied while ambient temperatures are between 60°F and 90°F. Blome Membrane 74 components and substrate temperatures must also be maintained in this range and at least 5 degrees above the dew point. For best results, store Membrane 74 components at 75°F minimum for 24 - 36 hours prior to installation. Avoid installing Membrane 74 in direct sunlight. Installations of Membrane 74 should be protected from water and weather during installation and curing.

#### SURFACE PREPARATION

Steel substrates should be prepared by abrasive blasting or grinding to achieve near white metal clean (SSPC SP-10). Blasted steel substrates must not be allowed to flash rust prior to installing membrane; therefore, this surface preparation must be completed immediately prior to application of appropriate Blome primer. Blome 70 Polyvinyl Butyral Primer is recommended for application on rusty steel prior to installation of Membrane 74. Apply and cure Blome Primer 70 as directed on product data sheet.

Concrete substrates to which Blome Membrane 74 will be applied must have a minimum 28 day cure or have a minimum compressive strength of 3,000 psi. Minimum tensile strength of concrete must be 300 psi when tested using a Schmidt Hammer. Concrete must be dry in accordance with ASTM D 4263 Plastic Sheet Test Method. Concrete surfaces must be free of all laitance, oil, curing compounds and any dust or other loose materials prior to the installation of Membrane 74.

Concrete substrates to which Blome Membrane 74 will be applied should be primed using Blome 75 Epoxy Primer prior to installation of Membrane 74 membrane. Apply Blome 75 to prepared concrete substrates as directed on product data sheet using brush or roller, making certain to work primer into the pores of the concrete. Allow primer to cure tack free, or until the next day, prior to installation of Blome Membrane 74.

#### **SAFETY PRECAUTIONS**

Blome Membrane 74 Resin, Activator, and mixes of them present various health hazards if handled improperly. Membrane 74 Resin will cause eye injury and irritate skin. Membrane 74 Activator is an isocyanate material and is a skin and eye sensitizer. Wear respirator suitable for organic vapors, safety glasses with side shields, gloves and long sleeve shirts to prevent all contact with skin and eyes. After working with Blome Membrane 74, wash thoroughly before eating, drinking, smoking or other activities.

### APPLICATION EQUIPMENT

Blome Membrane 74 is best mixed with a drill motor driven paddle blade or "Jiffy" mixer. All mixing and application equipment must be clean, dry and free of any contaminants including Portland cement, other mortars or resins. When mixed, Membrane 74 is applied using a clean, dry, steel trowel or rubber squeegee.

## **MIXING AND APPLICATION**

Mix Resin (Part A) and Activator (Part B) together with a drill motor driven paddle blade or "Jiffy" mixer and blend thoroughly for 1-2 minutes. It is good practice to then transfer this mixture to a second pail, scraping the sides of the first pail into the second pail and remixing the unit in the second pail for another 1-2 minutes. This will minimize the likelihood of any unmixed components being installed during application. The units should be mixed completely and not split as the mix ratio is critical and any variation can potentially decrease or change physical properties and chemical resistance.

Apply Membrane 74 over prepared and primed substrate using a steel trowel or squeegee to a nominal thickness of 1/16". This is best applied in two passes, each 1/32" thick. This two-pass installation will help to shear any air bubbles trapped within the wet paste membrane material.

#### **CLEANUP**

All tools, mixing equipment, gloves and application equipment should be cleaned immediately using a citrus or biodegradable cleanser with hot water, while material is still wet. If material begins to cure, solvent-based cleaners will be required for removal.

#### WARRANTY

We warrant that our goods will conform to the description contained in the order and that we have good title to all goods sold. Our material data sheets and other literature are to be considered accurate and reliable, but are used as guides only. WE GIVE NO WARRANTY OR GUARANTEE, WHETHER OF MERCHANT ABILITY OR FITNESS OF PURPOSE OR OTHERWISE, AND WE ASSUME NO LIABILITY IN CONNECTION THEREWITH. We are happy to give suggestions for applications; however, the user assumes all risks and liabilities in connection therewith regardless of any suggestion we may give. We assume no liability for consequential or incidental damages. Our liability, in law and equity, shall be expressly limited to the replacement of non-conforming goods at our factory, or at our sole option, to repayment of the purchase price of the non-conforming goods.

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