

# **KPOXY FLEXIBLE EPOXY MEMBRANE**

# DESCRIPTION

**KPOXY FLEXIBLE EPOXY** is an ultra-high solids, flexible urethane-modified epoxy used as a crack isolation membrane for interior use under various **KPOXY Flooring Systems. KPOXY FLEXIBLE EPOXY** resists cracking caused by horizontal substrate movement, providing a crack-resistant, resilient, sound absorbent, waterproof, durable floor. When used in conjunction with most **KPOXY FLEXIBLE EPOXY** offers stress-relieving properties for floor slabs that show movement or vibration. **KPOXY FLEXIBLE EPOXY** is also used to treat the surface of individual cracks and properly filled and covered contraction joints (sawcuts). **KPOXY FLEXIBLE EPOXY** is available in a wall grade formulation.

#### **KPOXY ADVANTAGES**

- Crack Resistant Flexibility Allows Horizontal Substrate Movement, Aids in Suppression of Reflective Cracking From Substrate
- Advanced Technology Maintains Flexibility in Cold Temperatures
- Increased Tensile and Bonding Strength Versus Epoxy-Only Membranes
- Higher Compressive Modulus Provides Greater Support for Heavy Point Loads Versus Softer Membranes
- Optional Scrim Cloth Reinforcement
- VOC <25 g/L, Meets USGBC LEED Criteria and All VOC Regulations Including Los Angeles SCAQMD
- Low Odor for Use in Occupied Areas
- Ultimate Elongation of 140-150%
- Reduces Noise Created by Mechanical Vibrations
- Meets USDA Requirements

#### **KPOXY CONSIDERATIONS**

- Slabs on grade must have an efficient moisture vapor retarder.
- Excessive moisture in concrete requires moisture mitigation system.
- Substrate temperature must be a minimum of 50°F.
- Substrate must be free of dirt, waxes, curing agents, and other foreign materials.
- Do not apply to wet or damp surfaces.
- Do not use for filling isolation/expansion joints.

#### APPLICATION SURFACE PREPARATION

**Surface Preparation** is the most critical portion of any successful resinous flooring system application. All substrates must be properly prepared as outlined in **KPOXY TERRAZZO Resin Technical Bulletin #1.** Work must be performed by trained or experienced contractors or maintenance personnel. The **Klein and Company, Inc. Customer Service** department is available to answer any questions- **800.241.0681**.

#### **MIXING & INSTALLATION**

Mix one (1) part of **KPOXY FLEXIBLE EPOXY Part A** by volume with one (1) part of **KPOXY FLEXIBLE EPOXY Part B** by volume with a slow speed drill until liquids are completely blended. Pour mixed onto working area and spread with notched squeegee or trowel at a rate of 40 to 50 ft<sup>2</sup> per gallon to achieve 32-40 mils. For complete installation instructions, contact **Klein and Company, Inc. Customer Service Department at 800.241.0681.** 

#### **CLEAN UP**

Clean skin with soap and water. Tools and equipment should be cleaned with xylene or lacquer thinner. Consult Material Safety Data for safety and health precautions.

# COMPOSITION

Ultra-high solids flexible urethane-modified epoxy resin and amines.

#### COLOR SELECTION

**KPOXY FLEXIBLE EPOXY** is available in GREY. Custom colors may be available with lab approval and additional lead time.

# COVERAGE

**KPOXY FLEXIBLE EPOXY** will yield approximately 32-40 mils when spread at 40-50 ft<sup>2</sup> per gallon.

#### PERFORMANCE PROPERTIES

Tensile Strength	ASTM D412	1650 psi
Ultimate Elongation	ASTM D412	140-150%
Adhesion (unprimed	) ACI 503R, ASTM D7234	300+%
		Concrete Failure, varies by
		concrete strength
Viscosity (mixed)		4800 cps
VOC Content	ASTM D2369 (EPA Method 24)	<25 g/L
Hardness Shore A	ASTM D2240	70-80
Hardness Shore D	ASTM D2240	60-65
Impact Resistance	ASTM D2794	16 ft. lbs.
Thermal Cycling	ASTM C884	No Cracking
Flammability	ASTM D635	Self-extinguishing

#### **CURE/DRY TIME**

Working Life (spread on substrate)	25-30 minutes
Cure Time, Tack Free	10-12 hours @ 75° F
Recoat Time	12-48 hours@ 75° F
Full Set Time	48-72 hours
Full Cure & Maximum Performance	5-10 days

# AVAILABILITY

**KPOXY** materials are available throughout the United States, Canada, and a number of other countries. **Contact Klein and Company, Inc. Customer Service Department at 800.241.0681 for details.** 

# MAINTENANCE

After completing the application of **KPOXY FLEXIBLE EPOXY** and the flooring system, the installer should provide the owner with maintenance instructions. If floors become slippery due to animal fats, oil, grease, or soap film, clean and rinse thoroughly.

# **TECHNICAL SERVICE**

Klein and Company, Inc. provides services and consultations on material selection, specification, troubleshooting, and other information on the proper repair and protection of concrete surfaces. Klein and Company, Inc. Customer Service Representatives are available to assist you- 800.241.0681. Please visit our website for additional products and information- www.kleincoinc.com.

# WARRANTY

Klein and Company, Inc. warrants for a period of one (1) year that its products will be free of manufacturing defects and will be in conformity with published specifications when handled, stored, mixed, and applied in accordance with recommendations of Klein and Company, Inc. If any product fails to meet this warranty, the liability of Klein and Company, Inc. will be limited to replacement of any non-conforming material if notice of such non-conformity is given to Klein and Company, Inc. within (1) one year of delivery of materials. Klein and Company, Inc. may in its discretion refund the price received by Klein and Company, Inc. in lieu of replacing the material. No customer, distributor, or representative of Klein and Company, Inc. is authorized to change or modify the published specifications of this warranty in any way. No one is authorized to make oral warranties on behalf of Klein and Company, Inc. In order to obtain replacement or refund the customer must provide written notice containing full details of the non-conformity. Klein and Company, Inc. reserves the right to inspect the non-conforming material prior to replacement. EXCEPT FOR THE EXPRESSED WARRANTY STATED ABOVE, THERE ARE NO OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING WITHOUT LIMITATION, ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR PURPOSE. Klein and Company, Inc. SHALL NOT EXTEND BEYOND THE OBLIGATIONS EXPRESSLY UNDERTAKEN ABOVE AND Klein and Company, Inc. SHALL HAVE NO LIABILITY OR RESPONSIBILITY TO THE PURCHASER OR ANY THIRD PARTY FOR ANY LOSS, COST, EXPENSE, DAMAGE OR LIABILITY, WHETHER DIRECT OR INDIRECT, OR FOR INCIDENTAL OR CONSEQUENTIAL DAMAGES.