



KEY EPOCOAT

DESCRIPTION

KEY EPOCOAT consists of a unique water based epoxy technology which allows the contractor to install epoxy resin floor systems and other moisture sensitive floor coverings on new concrete (5 days old) without fear of moisture entrapment. **KEY EPOCOAT** is typically applied in a two coat application. **KEY EPOCOAT** is the primer/basecoat used in various **KEY EPOCOAT SYSTEMS** and **KEY EPOCON SYSTEMS** including **KEY EPOCON SL**. **KEY EPOCOAT** may also be used as a primer with various **Key Resin Systems** to reduce concrete outgassing.

KEY EPOCOAT is a unique two-component, moisture tolerant, extremely high density, chemically enhanced epoxy based product which reduces the passage of water vapor and moisture through slabs on, above or below grade, thus eliminating delamination and blistering of adhesives, floor coverings, resin floor systems, epoxy terrazzo and coatings.

KEY EPOCOAT controls water vapor transmission levels for the installation of most floor covering systems, including VCT, sheet vinyl, carpets, wood, laminates, epoxy resin flooring and epoxy terrazzo.

KEY ADVANTAGES

- Low VOC, water-based, meets LEED criteria.
- Moisture vapor and water barrier.
- High to unlimited moisture tolerance*.
(*varies by thickness, type of system installed)
- Compatible with most flooring systems.
- Does not support mold.
- Easy to install.
- Minimal downtime.

KEY CONSIDERATIONS

- Substrate temperature must be a minimum of 60°F and maximum of 85°F.
- Substrate must be free of actively seeping water (i.e., glistening wet), dirt, waxes, curing agents, and other foreign materials.
- Must be installed as Key Epocon SL System for use with moisture sensitive floor coverings.

COLOR SELECTION

KEY EPOCOAT is available in neutral (off-white). Consult with Key Resin Technical Service on use of recommended pigment packs.

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 **Key Resin Technical Bulletin #1**. Work must be performed by trained or experienced resin flooring or epoxy terrazzo contractors. Consult with **Key Resin Company** regarding any questions. Shot blast concrete slabs to create a coarse texture surface profile minimum CSP-3. Alternate surface preparation methods must be approved by **Key Resin Technical Service**.

INSTALLATION

Mixing: **KEY EPOCOAT** is a two-component material. Part I and Part II are supplied in the correct mixing ratios. Always mix full or half units in the proportions supplied. Add one (1) part of **KEY EPOCOAT PART I** to four (4) parts **KEY EPOCOAT PART II**. Do not add additional mix water. Thoroughly mix with a low speed drill and Jiffy blade for 3-4 minutes until uniform. Do not entrap excessive air. Scrape all sides and bottom of container to ensure thorough mixing.

Primer: Prime using **KEY EPOCOAT**. Apply to the properly prepared substrate with a squeegee at coverage rate of 160-250 ft² per gallon and back roll with short nap roller to achieve uniform coverage. Allow to cure hard enough for light foot traffic, about 3-4 hours at 75°F and 50% RH.

Body Coat: Mix and apply **KEY EPOCOAT** as required for the specific **KEY EPOCOAT SYSTEM** or **KEY EPOCON SYSTEM**. Refer to the appropriate detailed system installation instructions document and system data sheet for further information.

TECHNICAL DATA

Material	2-component epoxy
Density	12.70 lbs/gallon
VOC Content, Mixed	< 1 g/L
Volume Solids	59%
Flash Point: Part A	>212°F
Part B	170 °F
Mixing Ratio	1:4 by Vol.
Pot Life, Approximate	60 minutes @ 75°F (24°C)
Open to Foot Traffic	After 16 hrs. at 73°F (23°C)
Cure Temperature	Minimum 50°F
Cure Time (heavy traffic)	7 days @ 75°F
Hardness, Shore D	50-60 Shore D
ASTM D2240	
Compressive Strength	5500 psi
ASTM C579	
Flexural Strength	2100 psi
ASTM C580	
Adhesion ASTM D7234	400 psi
-New concrete (7 days @ 73°F)	(concrete failure, varies by concrete strength)
Temperature Resistance:	
a) Continuous:	
-Dry heat	140°F (60°C)
-Humid	113°F (45°C)
b) Intermittent:	
-High pressure water	185°F (85°C)
-Dry heat	149-185°F (65-85°C)

AVAILABILITY

Key Resin materials are available throughout the United States, Canada, and a number of other countries. Contact the **Key Resin Representative** in your area for details.

MAINTENANCE

After completing the application of **KEY EPOCOAT** and any required topcoats or floor covering system, the installer should provide the owner with maintenance instructions relevant to the specific topcoats or floor covering. If floors become slippery due to animal fats, oil, grease, or soap film, clean and rinse thoroughly.

TECHNICAL SERVICE

Key Resin Company provides services and consultations on material selection, specifications, troubleshooting, and other information on the proper repair and protection of concrete surfaces. **Key Resin Sales/Technical Representatives** are available to assist you. Telephone 888.943.4532 or visit www.keyresin.com.

WARRANTY

Key Resin Company ("Key") 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 **Key**. If any product fails to meet this warranty, the liability of **Key** will be limited to replacement of any non-conforming material if notice of such non-conformity is given to **Key** within (1) one year of delivery of materials. **Key** may in its discretion refund the price received by **Key** in lieu of replacing the material. No customer, distributor, or representative of **Key** 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 **Key**. In order to obtain replacement or refund the customer must provide written notice containing full details of the non-conformity. **Key** 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. **KEY'S OBLIGATION SHALL NOT EXTEND BEYOND THE OBLIGATIONS EXPRESSLY UNDERTAKEN ABOVE AND KEY 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.**