

PRODUCT NAME

# Cem-Kote® Flex TC

## Flexible Cementitious Thin Coating

MANUFACTURER

Gemite® Products Inc.

Toll Free: 888-4-GEMITE (888-443-6483)  
E-mail: [techinfo@gemite.com](mailto:techinfo@gemite.com)  
Web Site: [www.gemite.com](http://www.gemite.com)

USA

160-3480 East Robinson Rd.  
Amherst, New York 14228  
Phone 888-443-6483  
Fax 888-443-6329

CANADA

1787 Drew Road  
Mississauga, Ontario L5S 1J5  
Phone 905-672-2020  
Fax 905-672-6780

FEATURES

- Superior flexibility
- High freeze/thaw resistance
- Self-curing
- Chemical resistant
- Breathable
- Excellent bond
- High resistance to carbon dioxide diffusion
- Very low shrinkage
- Non-flammable
- Vermin proof
- Salt resistant
- Non-toxic

PRODUCT DESCRIPTION

Basic Use

*Cem-Kote Flex TC* is designed for waterproofing and finishing of concrete where a superior flexibility, breathability and carbon dioxide diffusion resistance are required; and for structures subjected to AAR (Alkaline aggregate reactivity) deterioration. Other applications include its use as a part of waterproofing and finishing coating system for swimming pools.



Composition and Materials

*Cem-Kote Flex TC* is a highly flexible, fibre-reinforced, hydraulic cement based, two component system consisting of a dry Component A and a liquid Component B.

Limitations

Do not apply *Cem-Kote Flex TC* when the temperature is expected to be below 4 °C (40°F) within 48 hours or when rain is imminent. Follow Hot Weather concreting procedures when applying *Cem-Kote Flex TC* at temperatures exceeding 25°C (77°F). Proper surface preparation is essential for a successful concrete repair using *Cem-Kote Flex TC*. *Cem-Kote Flex TC* is not designed for a high traffic area. *Cem-Kote Flex TC* must be always used in combination *Cem-Kote Flex ST* as a base coat, especially in the exterior swimming pool applications.

Health and Safety

*Cem-Kote Flex TC* is non-toxic. Your skin might be sensitive to hydraulic cement or the liquid additive. We recommend use of rubber gloves. Avoid contact with eyes and prolonged contact with skin. If contact occurs, flush immediately with water. Seek medical advice if irritation occurs. Harmful if digested. Keep product out of reach of children. FOR INDUSTRIAL USE ONLY. Consult MSDS for additional information.

Color

Light Gray and White

Packaging

*Cem-Kote Flex TC Premix Kit* consists of dry Component A, packaged in 14.2 - 15.4 kg (31.2 - 33.9 lb) bags, and liquid Component B, packaged in 8.4 - 8.6 L (2.2 - 2.3 USG) plastic jugs.

Yield

*Cem-Kote Flex TC* yields approximately 13.6 - 14 L (0.48 - 0.50 ft<sup>3</sup>). The theoretical coverage of *Cem-Kote Flex TC* is 13.6 - 14 m<sup>2</sup> @ 1.0 mm (144 - 149 ft<sup>2</sup> @ 40 mils) thickness per kit applied in two (2) coats.

The actual coverage will depend on surface roughness and the thickness applied. The applicator must carry out a sample application to determine the actual coverage for the given substrate and application thickness.

Storage and Transportation

*Cem-Kote Flex TC*, when stored on pallets in a dry, cool area, free from moisture and direct sunlight has a shelf-life of 12 months. The liquid Component B must not freeze. Packaged 40 kits per pallet.

TECHNICAL DATA

Elongation in direct tension	25 -30 %
Salt Scaling Resistance (ASTM C672)	excellent

Water Vapor Permeance (ASTM E96) Wet Cup, 1 mm	1,270 ng/Pa.s.m <sup>2</sup> (23.2 perms)
Water Vapor Permeability, Engelfried-Klopfer S <sub>d</sub> < 3 m	S <sub>d</sub> = 0.14 m

## INSTALLATION

Current Guide Specification and Application Instructions contain additional information specific to each application and must be followed. Consult Gemite's Technical Service before starting a project to ensure the correct surface preparation, crack treatment, application procedures and suitability for a given environment.

### Surface Preparation

Remove all deteriorated and loose concrete, form release agents, oil, grease, laitance, dust, dirt and efflorescence by dry or wet sandblast, shotblast, or high pressure water (min. 6,000 psi / 41 MPa). Repair deeper areas using *Gem-Plast TC* or *Fibre-Patch*.

The proper surface preparation is essential for a successful waterproofing and concrete repair using *Cem-Kote Flex TC*.

### Reinforcing Steel

Remove all loose rust from any exposed reinforcing steel and apply two coats of *Fibre-Prime* rustproofing.

### Crack Treatment

All cracks must be treated using *Cem-Kote Flex Plus* and *Reinforcing Fabric HD*, prior to the application of *Cem-Kote Flex TC*. Pre-fill any open cracks larger than 2 mm (80 mils) with *Cem-Kote Flex Plus*. Apply a thin coat *Cem-Kote Flex Plus*, 15-25 cm (6-10 in) wide, over the crack. Embed a strip of the *Reinforcing Fabric HD*, into the wet *Cem-Kote Flex Plus* and apply a second coat to fully cover the *Reinforcing Fabric HD*. The total applied thickness should be 2 mm (80 mils).

### Mixing

Use a clean paddle or helix screw type mortar mixer, or heavy duty drill (400 - 600 RPM) with a mixing paddle. Thoroughly mix the liquid Component B prior to its use. Gradually add the dry Component A into the liquid Component B and mix until a smooth and lump free mix is obtained. A small amount of water can be added, if required, at higher ambient temperatures.

### Application

Apply first *Cem-Kote Flex ST* waterproofing layer in two coats to approximate thickness of 1.6-2.0 mm (60-80 mils). Roll or brush apply *Cem-Kote Flex TC* in two coats, to build at least 1.0 mm (40 mils) thick layer. The second coat must be applied into a wet first coat, usually within 10-15 minutes, depending on temperature and relative humidity. The delayed application of the second coat could result in its de-bonding.

## Curing

Cure *Cem-Kote Flex TC* by air drying for a minimum of 3 days prior to a continuous exposure to water. Protect fresh applications from rain, strong wind and intense sunlight for 12 hours. When working under tarps at freezing temperatures, use electrical heaters. Avoid using propane heaters to prevent "carbonation" of the material.

## Clean Up

All tools must be cleaned with water immediately after use. Cured material can only be removed mechanically.

## AVAILABILITY AND COST

*Cem-Kote Flex TC* is available worldwide. Contact Gemite Products Inc. for the name of the Representative/Distributor nearest you and pricing information.

## MAINTENANCE

Some maintenance may be required, depending upon the application. A cleaning and simple recoating is usually sufficient.

## WARRANTY

A limited twelve (12) month Material Replacement Warranty is available. For complete details contact Gemite's Head Office.

## TECHNICAL SERVICE

For technical advice on the suitability of *Cem-Kote Flex TC* for a specific application, specification assistance and application advice, contact Gemite Technical Service: USA 888-443-6483 or Canada 905-672-2020.

## Short Specification

The waterproofing finishing coating will be *Cem-Kote Flex TC*, highly elastomeric, fibre-reinforced and polymer modified cement, manufactured by Gemite Products Inc. [USA 888-443-6483] [Canada 905-672-2020]. It will be mixed and applied according to manufacturer's specifications and recommendations. Contact Gemite Technical Service for Specification Assistance, Application Instructions and the suitability of the surface preparation method.