



## Description

Tiger Crete is a 3 component water dispersed self-smoothing polyurethane screed. Tiger Crete has an aesthetic, easy to clean and smooth surface and is typically installed at 3~6mm. Tiger Crete is suitable for areas medium to heavy loading, abrasion and high chemical exposure to provide a smooth, flat and decorative wearing surface.

## Properties

- High resistance to chemical substances
- Good resistance to water permeability
- Non taint, odorless
- 3 component water dispersed polyurethane screed
- No cracks
- VOC free
- Easily maintained
- High bonding strength
- Jointless
- High abrasion resistance resulting from its silica aggregate structure
- High mechanical resistance



## Scope of use

- Floors food processing plant in wet or dry process area, freezer and cooler, thermal shock area.
- Floors of chemical plant and laboratory
- Floors of parking lot and warehouse
- Floors of workshop

## Surface preparation

- Concrete substrates must be prepared mechanically using vacuum shot blasting, grit blasting, drum sander, ultra-high pressure water blasting to remove cement laitance and an open textured surface.
- Weak concrete must be removed and surface defects such as holes and voids must be repaired using appropriate products.
- The substrate must be stable, clean, dry and free from loose parts. Water-repellent residues (such as formwork oil, grease, paint) must be removed. The surfaces must be free of cracks. If necessary, chisel out any cracks and fill with cement mortar or injection resin.
- Compressive strength of the substrate must be more than 25 N/mm<sup>2</sup> (28days) and bending strength must be 1.5 N/mm<sup>2</sup> (28days).
- All free edges of Tiger Crete, whether at the perimeter, along gutters or at drains require extra anchorage to distribute mechanical and thermal stresses. This is best achieved by forming or cutting grooves in the concrete. Grooves must have a depth and width of twice the thickness of Tiger Crete.

Expansion joints must be provided in the substrates at intersection of dissimilar materials. Isolate areas subject to thermal stresses, vibration movements or around load-bearing columns at vessels sealing ring

## Mixing and application

### Mixing

- Premix A part to make sure all materials is uniformly distributed with low speed electric stirrer.
- Add A part and then B part and mix for 10~30 seconds. Gradually add C part to the mixed resin part during mixing with electric stirrer and mix for 2~3 minutes until free of lumps.
- Mixing time can be changed about 1~2 minutes based on the standard mixing time according to job site temperature.
- Temperature condition of the materials for best use is 15~25°C.
- About 300~400 rpm of speed of electric stirrer is recommended.
- Do not mix Tiger Crete by hands.
- After mixing, the mixed mixture must be applied immediately.

### Application

#### 1) Scratch coat application of Tiger Crete

Priming is not needed in this application system Apply a scratch coat of Tiger Crete using steel trowels to spread the materials to about 1mm thickness. This application will seal concrete surface to fill the surface irregularities including non-moving joints and cracks. Allow cure for 1 day at 20°C prior to body coat application.

#### 2) Body coat application of Tiger Crete

Pour the mixed Tiger Crete on the substrate and spread with a toothed trowel or pin screed to desired thickness, achieving a flat surface. A straight edge trowel can also be used to smooth out the marks of the tooth trowel. Take care to spread newly placed materials across the transition of previously applied mixes before the surface begins to set. Remove air with a spike roller immediately. Roller spikes must be at least three times longer than the product thickness applied. Spike roller must be used within 10 minutes from mixing of the mixture for smooth surface

## Cleaning

Clean all tools and application equipment with thinner immediately after use.  
Hardened material can be removed mechanically.

## Curing

Allow a minimum 12 hours cure period at 20°C prior to light traffic.

## Please note

- Construction joints require pre-treatment with a stripe coat to verify and seal loss of material through the joint
- Perform a groove along the perimeter of the application area to prevent curling during curing. Width and depth must be twice the thickness of the floor finish.
- 10 ~ 30°C of temperature and below 85% of relative air humidity are recommended.
- The substrate can be dry or damp with no free standing water.
- Do not apply to asphaltic or bituminous substrate, glazed tile or non-porous brick, tile and magnesite, copper, aluminium, soft wood, elastomeric membrane and FRP composites
- The substrate and uncured floor must be at least 3°C above dew point to reduce the risk of condensation on the floor finish.
- Do not apply to cracked or unsound substrate.
- Color uniformity can not be completely guaranteed from batch to batch. Do not mix batch numbers in a single area.
- Do not apply to wet or green concrete or polymer modified patches if the moisture content is above 10%.
- Tiger Crete is subject to yellowing when exposed to UV radiation.
- For indoor use only

## Other information

Apart from the information in this leaflet it is important to observe the relevant regulations of various organizations and trade associations. The warranted characteristics are based on practical experience and applied testing. However, we have no influence over site conditions and therefore, if in doubt, the user should carry out sufficient tests to ensure the product is suitable. In case of doubt obtain advice.

## Storage

Shelf life at least 12 months for A and B part and 8 months for C powder in containers well sealed and dry place.

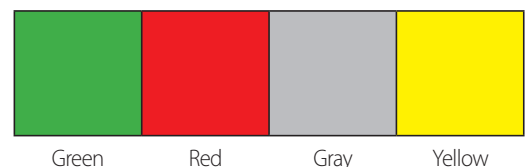
## Technical data

Base	Inorganic powder and water based modified polyurethane
Pot life(20°C)	20~25min
Set to foot traffic (20°C)	After 12hrs
Set to light traffic (20°C)	After 24hrs
Set to heavy traffic (20°C)	After 48hrs
Full hardening (20°C)	7 days
Compressive strength (28 days)	Approx. 55N/mm <sup>2</sup>
Bending strength(28 days)	Approx. 22N/mm <sup>2</sup>
Bond strength(28 days)	Approx. 2N/mm <sup>2</sup> (failure in concrete)
Service temperature	TigerCrete is suitable for use when exposed to continuous temperature, wet or dry at approx. -40 ~ +110°C
Water permeability	No permeation
Consumption (m <sup>2</sup> )	Approx. 5.5 ~ 6m <sup>2</sup> / 1 set (3~4mm in thickness)

## Type of pack (1 set)

- A part : 7kg / pail
- B part : 7kg / pail
- C powder : 26.4kg / paper bag

## Color Chart



\* Custom colors available.