# **TECHNICAL DATA SHEET**



## **TRI-FLOOR SCREED**

### Heavy duty solvent free epoxy screed for industrial areas

## **Description**

Tri -Floor Screed is a solvent free, three component screed system consist of epoxy resin (A), hardener (B) and filler (C). Tri -Floor Screed provides an excellent mechanical properties, high resistance to water and wide variety of chemicals. This system is designed as heavy duty topping for industrial floor with 5-8 mm thickness.



## Uses

- Chemical plants and process areas
- Heavy engineering plants and steel works. •
- Ware house and dairy. •
- Work shops, oil refineries and plating factories. •
- Electricity substations and battery rooms. •
- Food processing plants. •
- Decorative flooring. •
- Hangers and stairs.

## **Advantages**

- Impact and abrasion resistant.
- High compressive and tensile strength. •
- Excellent resistance to chemicals. •
- High strength and proven durability. •
- Non tainting. •
- Solvent free.

## Chemicals Resistance

fully cured blocks of Tri -Floor Screed have been tested in a wide range of aggressive chemicals commonly found in industrial environments. Tests were performed by constant immersion over a set period, followed by visual inspection and testing for Shore D hardness

Acids (m/v)	Ū	Alkalies (m	ı/v)	
Hydrochloric acid 3	6% : Resistc	int Sodiu	um hydroxide 24	% : Resistant
Sulphuric acid 10%	: Resista	nt Amm	onia 35%	: Resistant
Solvents & organics		Aqueous	solutions	
Butanol	: Resistant	Bleach	:Re	sistant

White spirit Oil/grease/petrol : Resistant Xylene : Resistant

: Resistant

Saturated sugar : Resistant Saturated urea 10% : Resistant

All the above properties have been determined by laboratory controlled tests and are in excess of those expected in practice.

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## **TRI- FLOOR SCREED**

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### Technical Data @°25c

DISCRETIONS	VALUE			
Color	Natural sand, Grey (other required colors)			
Solid Content (by weight)	100 %			
Density	$2.20\pm 0.20 \text{ kg/l}$			
Mixing ratio, A: B:C by weight	3.67A: 1B: 37 C (1 epoxy A+B): 7.9 C -filler)			
Pot life	30 -45 min. (decreases at higher temperatures)			
Initial setting time	8 hours			
Final setting time	24 hours			
Full hardness	7 days			
Min. Application temperature	10° C			
Rate of use (theoretical)	11 -18 kg /m <sup>2</sup> / 4-8 mm (depending on surface conditions)			
Compressive strength	70 N/mm <sup>2</sup>			
Tensile strength	16 N/mm <sup>2</sup>			
Abrasion resistance	0.77 mg/1000 cycles loss in weight			
Bond strength to concrete	> Cohesive strength of the concrete			
Flexural strength	22 N/mm2			

## **Derictions for use**

#### **Surface Preparation**

It is essential that **Tri -Floor Screed** is applied to sound, Clean and dry surfaces In order that maximum bond strength is achieved between the substrate and The flooring system.

All dust and debris should be removed prior to application of the product or its primer. **New concrete floors** 

Should be at least 28 days old (at 20°C) with maximum moisture content not Exceeding 5%. Laitance deposits on new concrete floors are best removed by light grit blasting mechanical scrabbling or grinding.

#### Old concrete floors

Again, mechanical cleaning methods are strongly recommended on old Concrete floors particularly where heavy contamination by oil and grease has occurred or existing coatings are present.

These may well have been absorbed several millimeters into the concrete. To Ensure adhesion, all contamination should be removed.

Proprietary chemical degreaser may be used on small areas of light Contamination only. **Steel surfaces** 

Steel surfaces should be degreased and grit blasted to  $a2\frac{1}{2}$  immediately Prior to application.

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The mixed **Tri-Floor Screed** should be spread to uniform Thickness on the primed surface while the primed surface still tacky using either a garden rake or the edge of a plastic trowel. The material should be tamped with a

wooden float to ensure complete

Compaction and finally finished to a closed even texture using a steel trowel.

Once mixed, the material must be used within the specified pot life

(See above "Properties").

After this time, any unused material will have stiffened and should be discarded.

#### Expansion Joints Surface Preparation

Expansion joints in the existing substrate should be Continued through the

Tri-Floor Screed topping, and filled to the required level with a suitable sealant from tri-chem range Tri - Flex PU incorporating the appropriate movement. Sealing

Although **Tri-Floor Screed** is impervious at 4-8 mm thick, in constantly wet Operation areas or where a high degree of cleanliness is required, **Tri-Floor Screed** May be sealed.

## Cleaning

Clean all tools and equipment immediately after use with Tri- sol 20.

## Package

A,B,C 25 kg pack.

## Shelf Life

2 years in original packing

## Storage

Store the material in a cool, covered dry place. Do not expose the pails to Direct sunlight and keep away from all sources of heat.

## **Health and Safety**

Tri-Floor Screed, Tri-Prime SF should not come in contact with skin and eyes Or be swallowed.

Avoid prolonged inhalation of solvent vapours.

Ensure adequate ventilation and if working in enclosed areas use suitable breathing apparatus.

If mixed resin comes into contact with the skin, it must be removed before it Hardens with a resin removing cream followed by washing with soap and Water. Do not use solvent's accidental eye contamination occur with any of the Above products, wash well with plenty of clean water and seek medical advice. If swallowed, seek medical attention immediately. Do not induce vomiting.

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