

## Heavy duty polyurethane screed and mortar

### Product Description

TAL URAFLOOR TF is a heavy duty polyurethane based floor screed and mortar designed to provide excellent resistance to abrasion, chemical attack and thermal shock.

### Advantages

- Meets SCAQMD Rule 1113 & LEED VOC Limits
- Formaldehyde free
- High durability
- Resistant to abrasion, impact and chemical attack
- Able to be steam cleaned at a thickness of 9mm
- Seamless and hygienic finish
- Contains a unique antimicrobial additive
- Excellent chemical resistance
- Resistant to thermal shock
- Low odour during installation

### Uses

Used in heavy duty applications in food processing, medical facilities, dairies, beverage factories, cold stores etc that require a non slip finish that withstands thermal shock.

### Specification Compliance

SCAQMD Rule 1113  
LEED NC2009 IEQ 4.2  
EFNARC Type 6A (>4mm) & Type 8A (>6mm)  
FeFRA Type 6

## Laboratory Test Data

Property	Typical Results
Compressive strength (ASTM C109)	>60 MPa
Flexural strength (ASTM C580)	>40 MPa
Tensile strength (ASTM D638)	>6 MPa
Impact resistance (ASTM D2794)	>19 Joules
Abrasion resistance (ASTM D4060 1000g/1000r CS17)	<40mg

## Application Properties

Application thickness	6 to 9mm	
Application temperature range	5 to 30°C	
Pot life	20°C	30°C
	15 min	7 min

## Cure Time at 20°C

Light traffic	4 to 6h
Light wheeled traffic	12 to 16h
Heavy duty traffic	24h
Full cure	3 to 5d

### Operating Temperature

-15°C to +95°C

### Volatile Organic Content

VOC = <5 g/L

### Chemical Resistance

Excellent resistance to organic and inorganic acids, alkalis, fuel and hydraulic oils, aromatic and aliphatic solvents.

### Theoretical Coverage

TAL SF PRIMER: 8 to 10m<sup>2</sup>/L.

TAL MT PRIMER: 6 to 8m<sup>2</sup>/L.

TAL URAFLOOR TF: 2m<sup>2</sup> per 12L pack at 6mm thick & 1.33m<sup>2</sup> at 9mm thick.

### Packaging

TAL SF PRIMER: 5 and 15L kits

TAL URAFLOOR TF: 30kg kits

### Shelf Life

12 months when stored at 25°C or less in a frost-free, dry and shaded area.

### Application Guidelines

TAL URAFLOOR TF should be applied by experienced coating crews. TAL provides detailed method statements on all its products for use in various applications. These must be referred to prior to starting work. The information below is a summary intended for guidance only.

### Surface Preparation

The substrate must be structurally sound. Loose or unsound concrete should be removed and made good. Surfaces must be entirely free of oil, grease, paint, corrosion deposits, dust, laitance or other surface deposits. The surface should be prepared by captive blasting to produce a lightly exposed aggregate surface i.e. a ICRI CSP 4 or 5 surface profile. Any bug holes (blow holes) should be filled with TAL BUGFILL or TAL PRIMER FILLER (when using TAL MT PRIMER apply TAL BUGFILL or TAL PRIMER FILLER after priming).

### Moisture Testing

The concrete slab should be tested for moisture with the Rapid RH system following the procedure in ASTM F2170. If the humidity reading is greater than 80% then conduct moisture vapor emission rate (MVER) testing using the procedure in ASTM F1869. (Both test kits are available for purchase from TAL). If the MVER is under 3lbs/1000ft<sup>2</sup>/24h use TAL SF PRIMER. If the MVER is 3 to 5 lbs/1000ft<sup>2</sup>/24h use a single coat TAL MT PRIMER at 165 microns wft. If the MVER is 5 to 12lbs/1000ft<sup>2</sup>/24h use two coats of TAL MT PRIMER at 200 microns wft per coat.

## Priming

The base and hardener have to be mixed using a slow speed drill and approved mixing paddle until homogenous. The mixed primer should then be applied to the prepared substrate with a stiff brush or roller. Do not over apply or allow puddles of primer to form. If the primer is absorbed into the surface easily, it will be necessary to apply a second coat once the initial coat is tack-free. Immediately after application of the final primer coat broadcast TAL ANTISLIP GRAIN (M) on the surface of the primer at a rate of approximately 200 to 250g/m<sup>2</sup>. Allow the primer to cure for at least 12 hours before applying the next layer. Complete application of the next layer within 36 hours of priming.

## Mixing

Mixing should only be carried out using a forced action mixer such as a Mixit 25 (available for hire or purchase from TAL). Pre-mix the base component and then pour into the clean mixing vessel and, while stirring slowly, add the hardener component and mix for 1 minute. Once the base and hardener has been mixed, add the filler slowly and mix for a further 3 minutes.

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## Application

To control level and surface finish the use of a screed box or screed bars fixed to the required thickness is highly recommended. Place and level the material then carry out initial finishing with a wooden trowel to create an open texture that will allow air release. Once this is done then compact using the same trowel and finish using a steel trowel to tightly close the surface. Do not use solvent as a troweling aid as it will destroy the resin structure. TAL TROWELEASY is recommended as a finishing aid. It is applied to the steel trowel to assist with finishing to produce a tight dense uniform finish free from trowel burn.

## Sealing

If the finishing has been carried out to a high standard then a sealer is not normally required. If the surface is required to be sealed then seal using the resin (base and hardener mixed together without filler) component of TAL URAFLOOR TF. Apply at a coverage of 10 to 15m<sup>2</sup>/L.

## Cleaning

Clean with TAL SOLVENT S before the product has cured.

## Limitations

Application Temperature Range

Minimum: 5°C

Maximum: 30°C unless material is kept cool prior to mixing

Maximum moisture content of substrate 10%

Do not be applied within 3°C of the dewpoint or if it is within 5°C of the dewpoint and dropping.

