



## PRODUCT DATA

### TFI IS

#### USES:

Toledo Floor, Inc. Industrial Strength Flooring is a high strength, durable overlayment formulated for various floor protection systems.

TFI IS is designed for repairing and resurfacing of old, worn floors or for new concrete protection where excellent abrasion, durability and compressive strength is required.

#### PRODUCT DESCRIPTION:

TFI IS is a 1/4" flooring system composed of:

- Primer: Two component epoxy primer that promotes adhesion to concrete.
- TFI IS: Three component polymer system composed of resin, curing agent and aggregate.
- TOP COAT TFI K-HB, TFI K-SATIN, K-STIPPLE
- OPTIONS: TFI K-SR, TFI K-DECO QUARTZ

#### PHYSICAL/CHEMICAL CHARACTERISTICS

Working Properties:	Service Time	Foot Traffic	8-12 hrs. (77°F)
		Light Vehicular	12 hrs. (77°F)
		Maximum Durability	5-7 days (77°F)
Mechanical Properties	Compressive Strength	15,519 psi	ASTM D-695
	Flexural Strength	16,302 psi	ASTM D-790
	Tensile Strength	6,004 psi	ASTM D-638
	Coefficient of Thermal Expansion	3.5 x 10 <sup>5</sup> in/in/°F	ASTM C-531
	Tensile Bond Strength	>400 psi Concrete >1,500 psi Steel	ASTMD-454-85
	Shore D	83	

### ACID/CHEMICAL RESISTANT GUIDE

The following results are based on 21 day immersions.

R = Resistant L = Limited Resistance  
NR = Not Recommended

Ammonia 25%	L
Aromatic Hydrocarbons	L
Butanol	NR
Chromic Acid 40%	NR
Citric Acid	NR
Cyclohexane	NR
Ethylene Glycol	NR
Hydrochloric Acid 20%	L
Jet Fuel	L
Kerosene	L
Methylene chloride	NR
MIBK	NR
Nitric Acid 5%	NR
Phosphoric Acid 5%	NR
Potassium Hydroxide	L
Sulfuric Acid 20%	R
Waste Water, Sewage	NR
Xylene	R

## SPECIFICATIONS

### TFI IS

#### INDUSTRIAL FLOORS

Toledo Floor Inc. Industrial Strength Flooring is a three component polymer system. These epoxy floors are engineered to provide outstanding impact, abrasion and chemical resistance. This class of Industrial Floors are distinguished for their use in heavy industrial and commercial environments.

The Epoxy I.S. System is based on the latest in polymer technology designed for a seamless, durable surface, formulated for the rigors of heavy use. The additional use of a waterproof membrane provides a moisture-proof barrier, as needed. A variety of Epoxy top coats are available as a smooth, textured or slip resistant finish. The seamless I.S. Flooring is recognized industry wide for its strength, durability and compressive strength. Toledo Floor Inc. Epoxy I.S. Flooring systems are; easy to maintain and provide a solution to industrial flooring problems.

#### PART 1 GENERAL

##### 1) Qualifications

- a. Contractor skilled and regularly engaging in manufacturing and installation of epoxy polymer flooring systems of similar size and nature for the past five years.

##### 2) Job Provisions

- a. Concrete (standard six-bag mix) shall have a 28-30 day cure. Quick cure additives (High Early) may be used for a 5-10 day cure. Do not use a sealer on new concrete. Concrete shall have a rough, broom finish.
- b. Utilities, air, electric, water, heat 50° - 70°F (air), 50°F or greater (concrete) to be furnished by contractor or user.
- c. Dock for unloading of material and equipment and disposal dumpster for non-toxic dust to be provided by contractor or user.

##### 3) Guarantee

- a. With Toledo Floor Inc.'s installation, workmanship and adhesion are guaranteed as specified.

#### PART 2 INSTALLATION

##### 1)Surface Preparation

All areas are mechanically steel shot blasted and/or scarified to remove all dirt, grease, loose and fatigued concrete; opening the pores of concrete to accept primer, fill material if necessary and overlayment.

##### 2)Surface Priming

A penetrating epoxy primer is applied to the abraded concrete.

##### 3)Surface Irregularities

Specially formulated epoxy fill material is trowelled into all holes and low spots to bring floor back to grade level as needed.

##### 4)Expansion and Control Joints

Joints  $\geq$  or greater are saw cut and filled with an elastomeric, flexible epoxy filler as needed.

##### 5)Installation of Overlayment

Specially formulated compounds with color pigment and graded silica sand is applied by trowelling or screed box application to thickness of approximately 3/16" prior to power trowelling.

##### 6)Coating

A hi-build, hi-solids, pigmented epoxy coating is applied to improve appearance and facilitate easier cleaning and maintenance of the entire system.



## CLEANING RECOMMENDATIONS

### PART 3 CLEANING RECOMMENDATIONS

TFI products are formulated for long wear ability and low maintenance. Periodic cleaning is recommended to maintain the aesthetics of the system.

#### INITIAL – AFTER CURE

Immediately after application, it is important to keep traffic and debris off the surface until the coating is fully cured (8-12 hours @ 77°F, unless otherwise stated by the manufacturer).

#### MAINTENANCE

Epoxy Coatings – For cleaning: Warm water and a mild standard industrial detergent works well as a solution. For hi-builds, a squeegee or power scrubber (rider or walk behind) is recommended. If you have a slip resistant floor, a soft bristle scrub (push broom or light weight power scrubber) is recommended.

**DO NOT -** Use Solvents, lacquer thinners or alcohols as cleaning solutions. They may discolor and deteriorate the coatings physical and chemical properties.

**DO NOT -** Leave cleaning solutions or water puddle on the floor, especially on fresh coating (3-7 days), as discoloration may occur.

**DO -** Follow Detergent manufacturers Cleaning Instructions.

### SPECIAL PROCEDURES FOR STATIC CONTROL

Use as needed if static electricity occurs.

\* Floor system must cure minimum of 24 hours prior to any of the following.

1. Use a linen or cotton mop; apply clear, clean water, at ambient temperature; to the floor.
2. Allow water to remain on floor approximately 6-10 minutes.
3. Remove water with mop, squeegee or power vacuum.

**Caution:** Only treat areas where the water can be completely removed after the 6-10 minute time interval. If water is left longer than the 6-10 minute interval, discoloration may occur.

If you have additional questions call Toledo Floor, Inc. at (800) 839-6446.