



Fastfix-it Enterprise Co., Ltd.

No. 47-1, Lane 199, Rexin Road, Renwu District,
Kaohsiung City 81460, TAIWAN
Tel: 886-7-3756058 Fax: 886-7-3756091
www.fastfix-it.com

TECHNICAL DATA

Product Name: Steel repair epoxy liquid
Product Code: FX-ESL301
Product Description: Steel repair epoxy liquid cures at room temperature and stands as a robust solution for maintenance, repair, and tooling purposes. It possesses the capability to be poured onto models, ensuring precise detail replication. Once fully cured, this compound can undergo drilling, tapping, machining, and painting procedures.

- Features:**
- 1.Low viscosity, self-leveling liquid
 - 2.Fix to stainless steel, steel and many other metals, as well as concrete.
 - 3.Machine casting to metallic finish.
 - 4.100% solids.
 - 5.Non-rusting repairs.
 - 6.Resistant to chemicals and most acids, bases, solvents and alkalis.

Product Data:

The color of Part A (Resin): Steel gray
 The color of Part B (Hardener): Amber
 The mixed color: Steel gray, nearly steel color
 Ratio: 5.6:1 (by volume), 94:6 (by weight)

Storage condition & Shelf-Life: 24 months from date of production if stored properly in original unopened, sealed and undamaged packaging in cool and dry conditions at temperatures between +5°C and +25°C. Protect from direct sunlight.

Technical Data:

TYPICAL PHYSICAL PROPERTISE	RESULTS	TEST METHOD
Uncured		
% Solids by Volume	100	-
Mixed Viscosity	Liquid	-
Specific Gravity	Resin: 2.5 Hardener: 1	-
	Mixed: 2.41	-
Working time	25~30 mins (500g, @25°C)	-
Full cure time	24 hours	-
Maximum Operating Temperature	Wet: 49°C, Dry: 150°C	-
Cure 7 days @25°C		
Shear Strength	1113 psi	Ref.ASTM D 1002-10
Tensile Strength	7290 psi	ASTM D638-14 (Type I, V= 5 mm/min.)
Glass Transition Temperature	88.75 (T _g) °C	DSC
Flexural Strength	11982 psi	ASTM D790-17 Procedure AI
Compressive Strength	16415 psi	ASTM D695-15
Hardness	87 Type D/1 sec	Ref. ASTM D2240-15 ^{sl}
Temperature Limitations	Continuous: -30 to 150 °C Intermittent: -30 to 200 °C	-

*** For information only - not for specification purposes.***

Application Instructions:**1.Surface Preparation**

FX-ESL301 Steel repair epoxy liquid only be applied to clean, dry and well roughened surfaces.

- (1) Remove all loose material and surface contamination and clean with a suitable solvent which leaves no residue on the surface after evaporation such as acetone, MEK, isopropyl alcohol, etc.
- (2) If necessary, apply moderate heat to remove ingrained oil and clean again with solvent.
- (3) Roughen surface by abrasive blasting, grinding, rotary file or other appropriate means.

2.Mixing

Combine the hardener with the resin and thoroughly blend using a spatula or a similar tool until a consistent, streak-free texture is achieved within approximately 4 minutes. Ensure to mix the material from the bottom and sides of the container.

3.Application

Apply it using a spatula, pressing firmly to prevent air entrapment and guarantee optimal surface coverage. Use fiberglass, sheet metal or wire mesh to fill large gaps and holes.

4.Cleaning Equipment

Wipe excess material from tools immediately. Use acetone, MEK, isopropyl alcohol or similar solvent as needed.

*** Not recommended for long term exposure to concentrated acids or to organic solvents ***

Health and Safety Information: For information and advice on the safe handling, storage and disposal, users shall refer to MSDS containing physical, ecological, toxicological and other safety-related data.