# Epoxy Pack #2964

## 2-Part Steel-Filled Epoxy Resin



#### Features:

- Easy 1:1 mixing ratio
- Can be used for horizontal or vertical surfaces
- Spreads easily to fill large or small gaps
- Sets up rapidly for fast return to service repairs
- Can be shaped to required profile
- Can be used on virtually any surface
- One-year shelf life
- Do not apply at temperatures below 41°F (5°C)
- Will not shrink
- Ideal for emergency repairs
- Will not rust



#### **Description:**

EPOXY PACK is a two-part, general-purpose, fast-curing epoxy resin with a high steel-alloy content (40%). It is used to make tough, permanent repairs that are rust free and can be machined like steel. When fully cured, conventional metalworking techniques can be used to machine, tap, drill, file, sand and paint the finished repair. This product quickly and easily repairs holes and cracks to virtually any surface.

#### **Applications:**

- Low-Pressure Pipes
- Tanks
- Metal Fittings

- Castings
- Fabrications
- Shafts

- Valves
- Wood Fittings
- Housings

#### For Use On:

- Metals
- Wood

- Ceramics
- Concrete

- Porcelain
- Some Rigid, Thermo-Setting Plastics

#### For Use By:

- Contractors
- Hospitals
- · Military Bases

- Fleet Operations
- Hotels/Motels
- Municipalities

- · Food Processing Plants
- Industrial Plants
- Utility Companies

#### **Directions:**

**Surface Preparation:** All surfaces should be clean, dry and free from all contamination, particularly oils and greases, which would impair bond and could lead to premature failure. Ideally surfaces should be abraded with a fine emery cloth, followed by a solvent wipe with dry acetone or commercially available degreaser. Apply mixed product immediately after cleaning to avoid possible post-cleaning contamination.

**Mixing and Application:** EPOXY PACK hardener component will skin in contact with air. Any product skin should be removed and discarded before use. Mix each side before using.

Wear impermeable gloves when mixing or handling uncured product. Measure out equal volumes or weights of the two components, using different utensils for each to avoid contamination. Use only the amount needed for the job at hand. Mix together with a spatula for a minimum of 1 minute until uniform in color.

Use a spatula to apply to clean, dry surface and remove excess material before the paste begins to set. It is recommended that repairs be completed within 1 to 2 minutes to avoid disturbing the repair as it begins to set. To achieve a glossy finish, smooth the surface immediately after application with a knife moistened with a solvent such as acetone or mineral spirits.

EPOXY PACK will start to set within 5 minutes at 68°F (20°C), depending on volume or temperature: the greater the volume (or higher the temperature), the faster it will set. Allow 1 hour before handling, and 24 hours before returning to service. After 24 hours the application can be drilled, tapped, filed or sanded to shape and painted. For advice on building multiple layers, please contact the Pro Chem, Inc. technical services department.

**Shelf Life:** One year from date of shipment when stored in dry storage area in original, unopened container at 68°F (20°C). To avoid contamination, do not return unused product to containers.

### **Product Characteristics:**

Properties	Results	Test Methods
Uncured Properties		
Composition:	Steel-filled epoxy resin	
Physical Appearance:	Paste	
Odor (hardener)	Strong sulphurous smell (no odor when cured)	
Mixing Ratio by Wt and Vol:	1:1	
Viscosity:	7,000,000	
Mixed Density:	20 lb/gl (2.5 g/cm <sup>3</sup> )	
Maximum Thickness in One Pass:	<0.47 in (12 mm)	
Application Temperature:	50 to 95°F (10 to 35°C)	
Work Life @ 68°F:	5 minutes	
Handling Time @ 68°F:	1 hour	
Return to Service Time @ 73°F:	24 hours	
Cured Properties: 7-Day cure at 73	B°F:	
Physical appearance when Cured:	Metallic gray solid	
Hardness, Shore D:	75	ASTM D2240
Tensile Strength:	4,750 psi (33 MPa)	ASTM D925
Lap Shear Tensile Strength on:		
Steel:	1,740 psi (12 MPa)	ASTM D1002
Aluminum:	1,450 psi (10 MPa)	ASTM D1002
Compressive Strength:	7,250 psi (50 MPa)	ASTM D695
Temperature Limits:		
Continuous:	-4 to +176°F (-20 to +80°C)	
Intermittent:	-4 to +248°F (-20 to +120°C)	
Chemical Resistance:	Resistant to hydrocarbons, ketones, alcohols,	
	esters, halocarbons, aqueous salt solutions, dilute acids and bases	

<sup>\*</sup> Typical properties are for information only, not for purposes of specification. The data above represents product performance in ideal laboratory conditions. Individual users' experience may vary depending on application conditions.

Note: Not intended for structural applications.

Pictograms:

Part A:

**Signal Word:** 

Part A & B: Danger

## **Personal Protective Equipment Required:**





Transport Information:		
DOT:	Part A	Part B
Proper Shipping Name:	-	-
UN Number:	Not regulated.	Not regulated.
Class:	-	-
Packing Group:	-	-

NFPA	Α	В
Health	2	2
Flammability	0	0
Instability	0	0
Physical/Chemical Prop:		