# **TECHNICAL DATA SHEET**

Henkel





Item #	Package	Size
1363118	Carded Syringe	0.85 Fl. Oz. (25 mL)

#### **Henkel Corporation**

Professional and Consumer Adhesives Rocky Hill, CT 06067 Phone 1-800-624-7767 Fax (440) 250-7863 www.henkel.com www.loctiteproducts.com

# DESCRIPTION

Loctite® Epoxy Plastic Bonder is an acrylic formula that is specially formulated to bond and repair plastic surfaces. The convenient double syringe dispenses equal amounts of each component every time. When mixed in equal volumes, the components react to produce a tough, rigid, high strength bond in 20 to 25 minutes. Loctite® Epoxy Plastic Bonder does not shrink and is resistant to water, most common solvents and shop fluids. It has high impact resistance and can be sanded and drilled.

## **RECOMMENDED FOR:**

Bonding substrates such as: PVC, polycarbonate, acrylic, ABS, FRP, Nylon™, Mylar™, delrin, phenolic, aluminum and stainless steel.

## NOT RECOMMENDED FOR:

- Bonding polyethylene, polypropylene, Teflon<sup>™</sup> or other non-stick surfaces
- Applying at temperatures below 40°F (5°C) or above 70°F (21°C)
- Use in continuously wet areas, prolonged immersion in water or use in potable water systems

# FEATURES & BENEFITS:

Feature	Benefits	
High impact resistance	Will not crack when drilled	
Resistant to water and most common solvents and shop fluids	Versatile product that can be used in many different applications	
Will not shrink	One-time application	
Convenient double syringe	Dispenses equal amounts of each component every time	
Handling strength achieved in 20 to 25 minutes	Quick completion of project	

## DIRECTIONS

### Tools Typically Required:

Utility knife, mixing tool/applicator (e.g. small flat plastic or wooden stick), disposable surface (e.g. foil, paper).

#### Safety Precautions:

Apply and cure in a well ventilated area. Wear gloves and wash hands after use.

#### Preparation:

Surfaces must be clean, dry and free from oil, wax and paint. Roughen smooth surfaces with 220 grit sandpaper prior to cleaning. To clean surfaces, wipe with rubbing alcohol. Pre-fit parts to be joined. Remove the plug from between the piston. Cut off the end tips of the syringe. Turn syringe end up and pull plunger back slightly allowing air bubbles to rise to top. Press the plunger to dispel the air. Depress the double piston to dispense equal parts of the two materials on a disposable surface. Mix both components thoroughly until a uniform color is achieved. Wipe syringe tips clean, retract piston slightly and close with the plug. Ensure that the plug is always placed in the same orientation on the tips.

Loctite® Epoxy Plastic Bonder EPXY\_PLSTC\_S Page 1 of 3

#### Application:

Apply a small amount to both surfaces, join and press together. Support parts until bond sets in approximately 20 to 25 minutes at room temperature. After the fixture time is achieved the material has reached handling strength.

#### Clean-up:

Remove any excess uncured adhesive immediately using mineral spirits, isopropyl alcohol or denatured alcohol.

## STORAGE AND DISPOSAL

Not damaged by freezing. If frozen, warm to room temperature until both components become liquid enough to mix. Store in an unopened container in a dry location below 75°F (24°C). Use an approved hazardous waste facility for disposal.

## PRECAUTIONS

**WARNING:** Contains methyl methacrylate. Flammable liquid and vapor. Causes eye, skin and respiratory tract irritation. May cause allergic skin reaction. May be harmful if swallowed. Keep away from heat, sparks and flame. Avoid contact with eyes, skin and clothing. Wash thoroughly after handling. Keep container closed when not in use. Use only with adequate ventilation. **FIRST AID:** If in eyes or on skin, rinse with water for at least 15 minutes. If inhaled, remove to fresh air. If swallowed, do not induce vomiting. Get medical attention if symptoms develop or persist. **KEEP OUT OF REACH OF CHILDREN.** 

**WARNING:** This product contains a chemical known to the State of California to cause cancer and birth defects or other reproductive harm.

#### Refer to the Material Safety Data Sheet (MSDS) for further information

## DISCLAIMER

The information and recommendations contained herein are based on our research and are believed to be accurate, but no warranty, express or implied, is made or should be inferred. Purchasers should test the products to determine acceptable quality and suitability for their own intended use. Nothing contained herein shall be construed to imply the nonexistence of any relevant patents or to constitute a permission, inducement or recommendation to practice any invention covered by any patent, without authority from the owner of the patent.

# **TECHNICAL DATA**

Typical Uncured Physical Properties		Typical Application Properties	
Base:	Methyl Methacrylate (MMA)	Odor:	Sharp
<u>Color &amp; Appearance:</u> Part A:	Cream colored opaque paste	Application Temperature:	Apply above 40°F (5°C) and below 70°F (21°C)
Part B: Specific Gravity:	Pale yellow colored opaque paste	Mixing Ratio (Part A: Part B):	1:1
Part A: Part B:	1.04 1.08	<u>Open Time (@ 70°F):</u>	15 to 18 minutes
Viscosity:		<u>Set Time (@ 70°F):</u>	20 to 25 minutes
Part A: Part B:	80,000 to 110,000 cps 45,000 to 70,000 cps	<u>Cure Time:</u>	24 hours Note: Cure time is dependent upon temperature, humidity and amount of
<u>Flash Point:</u> Part A: Part B:	58°F (14°C) 58°F (14°C)		material used.
VOC Content: Part A & Part B:	0.3% by weight (2.86 g/L)		
<u>Shelf Life:</u>	18 months from date of manufacture (Unopened)		
Lot Code Explanation:	YYDDD YY = Last two digits of year of manufacture		
(Lot Code is stamped on back of syringe label)	DDD = Day of manufacture based on 365 days in a year		
	For example: 09061 = 61 <sup>st</sup> day of 2009 = March 2, 2009		

Loctite® Epoxy Plastic Bonder EPXY\_PLSTC\_S Page 2 of 3

# **Typical Cured Performance Properties**

<u>Color:</u>	Cream
Sandable:	Yes
Service Temperature:	-40°F (-40°C) to 180°F (82°C)
<u>Tensile Shear Strength (24 hours):</u> Cold Rolled Steel (SB) Aluminum (SB)	2903 psi 3477 psi
Compression Shear Strength (24 hours): Polycarbonate (UI) Polycarbonate (SI) Acrylic (UI) Acrylic (SI) PVC – Hard (UI) PVC – Hard (SI) Delrin (SI) Nylon (SI) Mylar (SI) ABS (UI) ABS (UI) ABS (SI) Phenolic (SI) Fiberglass (UI) SB = Sandblasted, 80 grit + solvent wash	1713 psi 1698 psi 1224 psi 1875 psi 1045 psi 2219 psi 669 psi 1526 psi 1526 psi 1031 psi 1463 psi 2179 psi 1576 psi
UI = Unsanded + IPA wash SI = Sanded 220 grit + IPA wash	
<u>Side Impact Strength - Aluminum</u> : (GM9751P test)	35 to 40 kJ / m <sup>2</sup>
Chemical and Solvent Resistance:	Resistant to water, salt water, unleaded gasoline, diesel fuel and motor oil.

Loctite® Epoxy Plastic Bonder EPXY\_PLSTC\_S Page 3 of 3