

Description

LOCTITE® EA 608 is a clear, fast setting epoxy adhesive used in many applications where optical clarity and/or fast cure rates are needed. LOCTITE® EA 608 bonds a variety of materials including metals and plastics.

Features

- Clear
- Easy to Mix
- 1:1 Mix by Weight and Volume
- Quick Set
- High Strength
- Room Temperature or Heat Cure

| Typical Uncured Properties | Part A | Part B | Mixed |
|---------------------------------|--------------------|------------------|-------|
| Pot Life @ 77°F, 20 grams, mins | -- | -- | 5 |
| Color | Milky White | Amber | Clear |
| Viscosity, cP | 200,000 to 450,000 | 20,000 to 40,000 | N/A |
| Specific Gravity | 1.17 | 1.15 | 1.16 |
| Mix Ratio | | | |
| By weight | 1 | 1 | -- |
| By volume | 1 | 1 | -- |

| Typical Properties | Typical Value |
|--|------------------------|
| CTE, ASTM D 696, in/in/ °C | 86 x 10 ⁻⁶ |
| Thermal Conductivity, cal x cm/cm ² x secs x °C | 5.0 x 10 ⁻⁴ |
| Hardness, Shore D | 80 |

| Electrical Properties | Typical Value |
|--|------------------------|
| Dielectric Strength, ASTM D149, V/mil | 1200 |
| Dielectric Constant, MIL 1-16923. K 1kHz | 3.78 |
| Dissipation Factor, ASTM D 150 1kHz | 2.1 x 10 ⁻⁴ |
| Volume Resistivity, ASTM D 257 | |
| Surface Resistivity, ASTM D 257 | |

| Shear Strength, psi, ASTM D 1002 Etched Aluminum | | |
|--|--------------|---------------|
| Cure Schedule | Test Temp °F | Typical Value |
| 1 Hour @ 77°F | 77 | 1500 |
| | -67 | 1000 |
| | 77 | 2000 |
| | 140 | 600 |
| | 180 | 200 |
| 2 Hours @ 140 °F | -67 | 1100 |
| | 77 | 3000 |
| | 180 | 250 |

Handling

Mixing: This product requires mixing two components together just prior to application. Complete mixing is necessary. The temperature of the separate components prior to mixing is not critical, but they should be close to room temperature.

Application

Mixing - Bulk: Combine Part A (resin) and Part B (hardener) in the correct ratio and mix thoroughly until the color and consistency are uniform. EPOXI-PATCH® Tube Kits have been designed so that squeezing **EQUAL LENGTH BEADS of Part A & Part B** will give proper ratio. Ratios given above can be used for measuring larger amounts. Mixing the adhesive just prior to use is recommended. Heat buildup during or after mixing is normal. Do not mix quantities greater than one pound as dangerous heat buildup can occur causing uncontrolled decomposition of the mixed adhesive. Mixing smaller quantities will minimize the heat buildup.

Mixing - Cartridges: Place cartridge in proper dispenser. To begin using a new cartridge, remove the cap and dispense a small amount of adhesive, making sure both parts A & B are extruding. Attach nozzle and dispense approximately 1-2" before applying onto the part to be bonded. Partially used cartridges should be stored with the mixing nozzle attached. To reuse, remove and discard the old nozzle, attach the new nozzle, and begin dispensing.

Application: Bonding surfaces should be clean and dry. Once the adhesive is applied, the bonded parts should be held in contact until the part has developed handling strength. It is not necessary to clamp the parts unless movement during cure is likely.

Cure: Complete cure is obtained after 24 hours at room temperature. LOCTITE® EA 608 will achieve handling strength in 10-15 minutes at 77°F (note: this can vary with different bond configurations). LOCTITE® EA 608 can also be fully cured with heat such as; 5-20 minutes at a maximum of 150°F temperature.

Clean Up: It is important to remove excess adhesive from the work area and application equipment before it hardens. Many common solvents and citrus cleaners are suitable for removing uncured adhesive. Consult with your supplier's information pertaining to the safe and proper use of solvents.

GENERAL INFORMATION

This product is not recommended for use in pure oxygen and/or oxygen rich systems and should not be selected as a sealant for chlorine or other strong oxidizing materials.

For safe handling information on this product, consult the Material Safety Data Sheet, (MSDS).



Storage

Store product in unopened container in a cool dry location. Ideal conditions are within the range 8 to 21 degrees C (46 to 70 degrees F) and are recommended for long term storage. Exposure to higher temperatures (greater than 28 degrees C) for prolonged periods should be avoided as extended exposure to warm conditions can adversely affect product properties. For further specific shelf life information, contact your local Technical Service Center.

Note

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