



10-3042 FAST CURING STRUCTURAL EPOXY ADHESIVE

DESCRIPTION:

10-3042 is an industrial grade fast setting epoxy adhesive. After just two hours the lap shear strength (aluminum to aluminum) is 1,100 psi and ultimately reaches 4,000 psi.

Many widely used fast curing structural adhesives have either sulfur odors (mercaptan based) or acrylic odors (methyl methacrylate based). The 10-3042 has no odor and is also not flammable. This epoxy adhesive has other performance advantages over other fast curing adhesives, such as, better mechanical properties, heat resistance and a higher glass transition temperature.

The 10-3042 is packaged in the easy to use TriggerBond® dispensing system. It cures under a wide range of temperatures and humidity levels.

The high performance epoxy adhesive forms excellent bonds to a wide variety of plastics and metals. It acts as an outstanding electrical insulator and therefore suitable for many electronic bonding applications.

FEATURES:

- Fast room temperature cure
- Low odor
- Packaged in TriggerBond® system
- Forms strong bonds to a variety of substrates
- Electrically insulating
- Good heat and solvent resistance
- Superior clarity

TYPICAL PROPERTIES:

Color	
Resin	Clear
Hardener	Clear
Mixed	Clear
Mix Ratio, by volume(R:C)	2:1
Viscosity, @25°C, cps	
Resin	2,500
Hardener	4,800
Specific Gravity, @25°C	
Resin	1.15
Hardener	1.09



Glass transition temperature, °C	50
Gel Time, 25°C, 10 grams	15 minutes
Durometer, Shore D	
@25°C	85
@62°C	75
Lap Shear Strength (Al to Al), psi	
After 2 hours	1,100
After 4 hours	3,400
After 24 hours	4,000
Dielectric Strength, V/mil	440
Dielectric Constant, 25°C, 100Hz	5.3
Volume Resistivity, ohm-cm, 25°C	2.4 x 10 ¹²
Operating Temperature, °C	-40 to +135

NOTES:

- 1) This product is an adhesive and is not designed for potting and encapsulating applications. 10-3042 is a fast reacting epoxy system and it will create a high exothermic temperature in large mass sizes (avoid mass sizes greater than 25 grams).

INSTRUCTIONS FOR USE:

- 1) Surfaces must be clean and grease free. Use an oil free solvent such as acetone to wipe surfaces. Adhesion can be substantially increased by abrading the surfaces to be bonded with emery cloth, sand paper, carbide grinding tools, sand blasting, etc... A roughened, porous surface will produce the best results. Any oxidized metal films should be removed just prior to application of the epoxy adhesive mixture.
- 2) Dispense material from TriggerBond® cartridge. See TriggerBond® instruction sheet for specific guidance.
- 3) Apply mixed product to substrate to be bonded.
- 4) Join substrates within 3-5 minutes.
- 5) Cure according to one of the following schedules:
 25°C 2-4 hours
 65°C < 10 minutes

STORAGE, HANDLING AND AVAILABILITY:

10-3042 is available in the 2:1 TriggerBond® systems: 50mL, 200mL, and 400mL dual barrel cartridges. Expected shelf life is 12 months. Store in a cool, dry place in original containers.

Please read and understand Safety Data Sheet (SDS) before using this product.

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