



Fast-setting Epoxy for Bonding

Product Description

JA484-3 is a two component epoxy resin designed for fast cure. This resin exhibits high adhesion strength, greasy resistance, chemical and solvent resistance. This resin is suited for plastics, ceramics, glass and metals bonding. This product is recommended as a general adhesive which can fast cure at room temperature is desired. The two specialties of this product are convenience to use and can shorten the product process.

Features

1. This resin exhibits great operation after mixing.
2. This product offers good adhesion strength to many plastic and metals.
3. With the advantage of fast initial strength, the user can proceed next product process after about 20 minutes.
4. This product is able to reduce the working time and increase the efficiency at the same time.
5. The hardening surface will not exhibit oiliness and poor gloss.
6. This product complies to the 2011/65/EU RoHS regulations.
7. This product complies to chlorine < 900ppm, bromine < 900ppm, chlorine + bromine < 1500ppm.

Typical Uncured Properties

	JA484-3A	JA484-3B
Appearance	Liquid	Liquid
Color	Colorless	Light yellow
Viscosity 25°C, S14 20rpm, cps	15,000~23,000	10,000~15,000
Specific Gravity	1.16	1.11

Typical Curing Properties*

Mix Rate (A:B) By Weight	1 : 1
Pot Life, 25°C, min	3
Surface Dry Time, 5g, 25°C, min	13
Through Cure Time, 25°C, days	3

Direction of Use

1. It should be applied to a clean surface which is free of dirt, grease or mold release. In many cases, a simple solvent wipe is sufficient.
2. Mix thoroughly by weight 1:1. Mix approximately 15 seconds after uniform color is obtained.
3. For optimum properties mixed, this product should be used before its pot life. Large quantity mixing is not recommended for this resin.
4. For maximum bonding strength apply adhesive evenly to both surfaces to be jointed.
5. The handling information of this product supplied in dual syringe cartridge can be obtained by requesting a copy of "Introduction for Adhesive Cartridge Dispenser", F-06122201.

Typical Cured Properties*1

Glass Transition Temp., (DSC)°C	52
CTE*2 (100~180°C), μm/m/°C	218
Durometer Hardness, Shore D	84
Water Absorption Ratio(25°C /24hr), %	2.60
Water Absorption Ratio(80°C /24hr), %	9.06
Water Absorption Ratio(97°C /1.5hr), %	5.77
Shear Strength, Al vs. Al, Kg/cm ²	207
Tensile Strength, MPa	40
Elongation, %	3.8
Flexural Strength, MPa	68
Flexural Modulus, MPa	2,000
Compression Strength, MPa	70
Degradation Temp, (TGA 10 °C /min) °C	332
Weight Loss Ratio @ 100°C, %	0
Weight Loss Ratio @ 150°C, %	0.2
Weight Loss Ratio @ 200°C, %	0.4
Weight Loss Ratio @ 250°C, %	0.7
Weight Loss Ratio @ 300°C, %	1.6
Volume Resistivity, ohm-cm	5*10 ¹⁵
Surface Resistivity, ohm	5*10 ¹⁴
Dielectric Constant 100Hz	4.1

*1 Specimen Cure Condition : 25°C / 7days

*2 CTE: Coefficient of Thermal Expansion

Storage and Shelf Life

The container should be stored in cool and dark place. The resin and hardener will become yellow under the sunlight. This product is mercaptan content, replace the lid immediately after use. Keep without any possibility of wet when not using. This product has a one year minimum shelf life when stored below 14~34°C in original, unopened containers.

Caution

Some findings indicate a lack of potential for carcinogenicity with the compositions of this product by long term recurrent application to the skin. However, contact with skin is likely to produce mild transient reddening. It is important to remove adhesive from skin with soap and water thoroughly. This product is of moderate acute toxicity by swallowing. If swallowed, call a doctor. Avoid contact with eyes. In case of contact, flush with water for at least 15 minutes and get medical attention. For specific information on this product, consult the Material Safety Data Sheet.