

TECHNICAL INFORMATION

BEST-LIQUID METAL

BEST-LIQUID METAL is a two component epoxy adhesive which cures within 5 minutes after mixing (at room temperature). Liquid metal develops its high bonding strength and chemical resistance within a short time frame. It is a 100% reactive epoxy-adhesive, suitable for bonding and filling of many materials including wood, metal, glass, ceramics, plastics and rubber.

PROPERTIES:

- easy to handle two-component epoxy-adhesive
- excellent bonding strength on a multitude of materials, e.g. aluminium, copper, steel, brass, concrete, FK/SMC, wood, glass, plastics ceramics, painted metal, graphite, polyurethane, galvanized metals, hard plastics, etc.
- BEST-Liquid Metal develops high strength after 2 – 3 hours

PHYSICAL PROPERTIES (liquid state) :

Viscosity (mixed) at 25°C	10.000 – 15.000 Pas
Mixture ratio	1:1 vol/vol or wt/wt
Appearance resin/hardening agent	white/black
Appearance mixed product	grey
Processing time	4 – 6 minutes
Specific weight	1.30
Solid content	100%
Cure time	2 – 3 hours
Temperature resistance	120°C

STRENGTH PROPERTIES :

Shore hardness	78 – 80	(ASTM D 2240)
Tensile shear strength	14 – 18 N/mm ²	(DIN 53283)
Shear strength	3 – 5 N/mm ²	(ISO 4578)

**ELECTRICAL PROPERTIES:**

Thermal conductivity	0,1	(W/mK)
Coefficient of Thermal Expansion	$60 - 120 \times 10^{-6}$	(1/K)
Dielectric strength	50 – 90	(kv/mm)
Spec. resistance	$3 - 5 \times 10^{12}$	(OHM/cm)

INSTRUCTIONS FOR USE

Bonding surfaces should be clean, dry and free of grease. Mixture ratio: 1:1. For best results discard the first millimeters of bead dispensed. The adhesive must be applied to the bonding surface directly after mixing.

Adhesive layer thickness for maximum bonding strength: 0,005 inch (0,13 mm)

General

The data and information above correspond to the current know-how of BEST-Klebstoffe GmbH & Co.KG. Our information and data have been developed from laboratory tests and extensive practical experience. It is the user's responsibility to perform receiving inspections and to determine suitability for the user's purpose of any production methods. We disclaim all warranties expressed or implied, that any product will have specific properties for a particular purpose. BEST-Klebstoffe GmbH & Co. KG reserves the right to change the contents of this document as necessary.

Revision: 240313
Revision Date: 24.03.2013