## **EPOXY METAL**

### **IRONCLAD AND METALLIC TWO-COMPONENT EPOXY ADHESIVE. FOR REPAIRS UNDER EXTREME CONDITIONS.**





PRODUCT DESCRIPTION

Ironclad and metallic two-component epoxy adhesive.

#### **FIELD OF APPLICATION**

Ideal for strong repairs of metal objects which must withstand extreme conditions (forces, vibrations, (sea)water, heavy load), such as tools, car parts, engines, (motor)bikes, metal (garden) fencing and cutlery. Also suitable for sealing a small hole in a radiator. Suitable for bonding of metal (steel, aluminium, iron) together and in combination with stone, wood, concrete, and various synthetics (such as formica, polyester and bakelite). Not suitable for Polyethylene (PE), polypropylene (PP), PTFE and silicone rubber.

#### **PROPERTIES**

- · Extreme strength: up to 220 kg/cm<sup>2</sup>
- · Metal coloured
- · Resistant to harsh conditions
- · Resistant to temperatures between -40°C and +100°C
- · Filling
- · (Sea)water resistant
- · Very good chemical resistance
- · Can be sanded, filed, drilled and painted after curing

#### **PREPARATION**

**Working conditions:** Only apply at temperatures between  $+5^{\circ}$ C and  $+35^{\circ}$ C.

Product cures by mixing the resin and hardener. Personal safety: Preferably wear gloves.

Surface requirements: The materials to be bonded must be dry, clean, free of

dust and grease.

**Preliminary surface treatment:** Degrease parts to be bonded with acetone.

Roughen smooth surfaces (sandpaper).

**Tools:** Mix the components in the double-syringe by means of the supplied mixing bowl and spatula.

**APPLICATION** Mixture ratio: 1:1

**Coverage:** 1 ml = approx 1 cm $^2$  at a film thickness of 1 mm

**Directions for use:** 

Remove the spatula from the side of the double syringe, and the closure cap from the handle. Break the seal of the double syringe. Press out an equal amount of both components onto the enclosed mixing tray. Mix these two equal parts well with a synthetic spatula until a mixture is obtained with a homogeneous colour. Apply the mixture, which at room temperature (+20°C) remains toolable for about 45 minutes, as a thin layer on one of the two materials. Join the materials and keep them in place for 10 hours. Be careful not to move the parts before the adhesive has cured. After use, clean the nozzle with a cloth and place the special cap in the handle on the double syringe. Resin and hardener must not come into contact with each other unless for usage.

Potlife: 45 minutes

**Stains/residue:** Remove wet stains immediately with warm water and soap.

Cured adhesive residue can only be removed mechanically.

**Advice:** Some types of synthetics can not be joined such as polyethylene and polypropylene. This can be tested by holding a glowing copper wire against the synthetics. Does it smell of wax? Then you can not bond it.

Use a piece of adhesive tape in order to keep the parts in place while the adhesive is curing.

**Points of attention:** After use close well (note: always place back the cap in the same way, due to the bonding of the cap to the double syringe). For optimum performance it is important to create a larger amount of adhesive and mix it very well. Curing time depends on the temperature. Adhesive does not cure below +5°C.

#### **CURE TIMES**

Handling time: approx. 10 hours

**Dry/Cure time:** approx. 24 hours. Curing takes longer at lower temperatures, and shorter at higher temperatures.

\* Curing time may vary depending on a.o. surface, product quantity used, humidity level and ambient

#### **TECHNICAL PROPERTIES**

Moisture resistance: Good

**Temperature resistance:** -40°C to +60°C Chemicals resistance: Very Good

Paintability: Good Filling capacity: Good

#### **TECHNICAL SPECIFICATIONS**

Chemical base: Resin: epoxy resin. Hardener: modified amide

**Colour:** Grey **Viscosity:** Pasty

**Solid contents:** approx. 100 % **Density:** approx. 1.2 g/cm<sup>3</sup>

Our advice is based on extensive research and practical experience. However, in view of the large variety of materials and the conditions under which our products are applied, we assume no responsibility for the results obtained and/or any damage caused by the use of the product. Nevertheless, our Service Department is always at your disposal for any advice needed.

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#### **STORAGE CONDITIONS**

At least 24 months after date of manufacture. Limited shelf life after opening. Store cool, dry, frost-free, upright (nozzle upwards) and tightly closed.

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