# Product Name EPOXYCAST™ EPOXY CASTING SYSTEM

# **Product Description**

EPOXYCAST<sup>™</sup> is an epoxy resin system specifically designed for the casting of small to medium sizes items. It allows for batches of approximately 5-10L to be mixed and poured into sections up to 30mm thick. EPOXYCAST<sup>™</sup> can be poured in multiple layers with excellent cohesion.

### **Product Highlights**

- Contains anti-yellowing additives
- Displays excellent adhesion to other substrates and cohesion on multiple layers
- Good fluidity and de-airing properties
- FDA Approved and Non-Dangerous Goods for transport
- Easily tinted with a vast range of compatible colourants
- Low exotherm resulting in low shrinkage
- Convenient 2:1 ratio by Volume
- Fantastic clarity and visually water white

### **Typical Applications**

- Small-Medium sized articles such as bowls, platters and homewares
- Wood/Resin art for decorative ware and cutting boards
- Jewelry and craft casting
- Electrical assembly potting
- Most small-medium sized clear castings

# Physical Properties

Fait A		
Viscosity	cPs @ 25°C	1000-2000
Colour		Colourless Transparent

Part B		
Viscosity	cPs @ 25ºC	100
Colour		Colourless Transparent

#### **Handling Properties**

Mix Ratio	Part A : B (by volume)	100 : 50
Potlife	200g mass @ 23°C	40 mins
Cure Time	@23°C	24 hours
Cured Hardness	7 @23C	80-82D
Heat Distortion Temp	When properly cured	80°C

## **Processing Information**

(Optimal casting conditions are 23°C and 50%R.H)

- If the cast item/part is to be used for Food Contact after curing, the temperature of the food should not exceed 50°C
- When the relative humidity exceeds 80%, the surface of the cured product can absorb moisture and form a white mist. We suggest a fully controlled environment if casting in these conditions.
- If timber and similar objects are being embedded, it is suggested that they should be pre-sealed.
- Although EPOXYCAST is intended primarily for small-medium size pours, it is also used for smaller articles as the extended "fluid time" before gelling allows for air-release. This is ideal if the user does not have a vacuum unit, however it must be noted that in smaller items the cure time can easily be up to a minimum of 48hrs.
- If the materials have been stored at temperatures below 15°C for a prolonged period, ensure to condition the Part A material at 25-30°C to reduce viscosity and assist in air release. The material can be cast at lower temperatures, but the user should be aware of viscosity changes at lower temperatures.
- This resin and hardener combination have been formulated with the objective of being as safe as possible, however, in common with most epoxy resins and hardeners, skin contact with uncured materials may cause irritation of sensitive skins. For this reason, contact with the uncured materials must be avoided at all times.
- Ensure that mixing & casting is performed in a well-ventilated area as some vapors may be released during cure.
- Please refer to the Materials Safety Data Sheet for more information.

#### **Storage**

Store the components in a dry place at 18 - 25 °C, in tightly sealed original containers. It is suggested to purge moisture from the Part A containers with F720 Dry Air Spray prior to resealing the lid after use.

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# Revision Number 2

#### **Disclaimer**

The data presented in this leaflet are in accordance with the present state of our knowledge, and does not absolve the user from carefully checking all supplies immediately on receipt. We reserve the right to alter product constants within the scope of technical progress or new developments. The recommendations made in this leaflet should be checked by preliminary trials because of conditions during processing over which we have no control, especially where other companies' raw materials are also being used. Recommendations for use do not constitute a warranty, either expressed or implied, of the fitness or suitability of the product for a particular purpose.