



# PRODUCT SPECIFICATION MXCRYL® 321

## **Product Description**

MXCRYL® 321 is a two component structural methacrylate adhesive, designed for the bonding of high strength metal and composite applications. MXCRYL® 321 has been formulated from innovative technology, including our revolutionary adhesion system. This unique system enables the adhesive to achieve the ultimate balance of mechanical strength and impact resistance whilst still remaining both simple and quick to use.

## Typical Applications

MXCRYL® 321 is very versatile and can bond a wide variety of substrates without the need for surface primers or conditioners. Typical examples shown below:

- Bonding metal fasteners to moulded composite parts
- Bonding aluminium and stainless steel lettering in the sign manufacturing industry.
- Bonding automotive carbon fibre body panels
- Bonding GRP in the marine industry
- Bonding dissimilar metals for trailer fabrication

#### **Instructions For Use**

- 1. Always consult MSDS before using this product for the first time.
- 2. Carry out surface preparation where required.
- 3 Remove cap, and attach mixer nozzle.
- 4 Dispense sufficient adhesive to ensure equal mix.
- Apply adhesive to one surface and assemble components carefully, clamping if required.
- It is always easier to remove any excess adhesive 6. prior to cure using a suitable cleaner
- Allow the adhesive sufficient time to achieve handling strength before moving or unclamping components.

## **Properties of Uncured Material**

Resin	Methyl Methacrylate
Colour	Green/Pink
Appearance	Translucent Liquid
Viscosity Brookfield T Bar	5000cps
Cure System	Exothermic
Open Time	2-3 Minutes@ 20°C
Handling Strength	4-5 Minutes@ 20°C

## **Performance of Cured Material**

ASTM D1002 Lapshear	Up to 25 Nmm²
ASTM D638 Tensile Strength	Up to 25 Nmm²
Gap Fill	2mm
Temperature Range	-55°C to 125°C

### **Packaging**

MXCRYL® 321 is available in 25ml, 50ml and 400ml nylon cartridges for use with a dispensing gun.

#### Storage & Shelflife

MXCRYL® 321 should be stored unopened in a cool, dry location out of direct sunlight. Stored correctly, this grade can offer a 12 month shelf life from manufacture.

## **Health and Safety in Use**

MXCRYL® 321 is a methyl methacrylate and should not be used without consulting the MSDS, which contains full information regarding the use of this product, including Transport, Disposal, Toxicological, Exposure Controls, Accidental Release and First Aid measures essential to the safe use of this product.

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