



PRODUCT DATA SHEET

UrePac® Cast 25 170

Product Description

UrePac® Cast 25 170 is a cold cure, RIM elastomer based on polyether polyol and MDI isocyanate. The system has a rapid reaction time and has been developed to be mixed and poured using high pressure mixing equipment. The elastomer was designed for use in the production of flexible thin walled components with high rigidity and impact resistance.

UrePac Cast 25 170 (Polyol) Specification:

210kg per 205lt Open top drum.

Specific Gravity (22°C):	1.04 +- 0.02 g/ml
Viscosity (Brookfield) (22°C):	800 +- 200 m.Pas
Appearance:	Black liquid

UrePac 2104 (Isocyanate) Specification:

240kg per 205lt Closed top drum.

Specific Gravity (22°C):	1.20 +- 0.02 g/ml
Viscosity (Brookfield) (22°C):	150 +- 50 m.Pas
Appearance:	Clear Amber liquid

Processing Conditions:

Temperature

The temperature of both components should be conditioned to at least 20°C to ensure that cross-linking of the elastomer takes place. The optimal temperature of the components should be between 25-30°C to achieve repeatable results of the finished product. If the products are heated above this temperature, the reaction between both components will take place much quicker and therefore the mixture will have a reduced pot life. The mould should have a suitable release agent applied and be kept at a temperature of 55-65°C to achieve a good surface finish and reduced demould time.

Mix Ratio

It is imperative that the correct mix ratio of both components is maintained to within +-1% of the ratio specified to ensure that the components will completely react. The components are precisely manufactured so that all of the resin will react to completion, any variance from this will produce products with inferior physical properties, or in severe cases the product will not cure at all.

Mixing

For machine mixing it is recommended that regular calibration shots are conducted to ensure that the correct mix ratio is being achieved.

Cured Elastomer Properties

Mix Ratio	100 Polyol (Part A): 130 Isocyanate (Part B) (w/w)
Gel Time (22°C):	25+-5 seconds
Demould time (Mould Temp. 55°C):	180+-5 seconds
Density:	1.07 +-0.02 g/ml
Shore Hardness:	70+-5 Shore D
Tensile Strength:	35 N/mm ²
Elongation at break:	30+ 10 %
Tear Strength:	120 N/mm

Storage and Handling

Component A should be stored under dry conditions out of direct sunlight between 18 and 25°C. **Component B** should be stored separately from *Component A*, but under the same conditions.

- Both products will have a minimum shelf life of six months when stored under these conditions.
- It is imperative that **Component A** be thoroughly mixed prior to use.
- If **Component A** is held in storage tanks, the contents must be mixed at least once per day.

Please refer to the material safety data sheet for further advice on the safe handling of these products.

Transport Classification

Component A:	None
Component B:	None