

Biresin® G27 - Component A with several B Components

Fastcast resin, unfilled

Areas of Application

- Casting of master and core models, negatives and mouldings of small up to medium dimensions
- Applicable for thinner and thicker layers
For casting of art and crafts articles with excellent detail reproduction
- **Biresin® G27** component A with component B **Biresin® G55** is especially suitable for spin production of hollow mouldings because of shorter potlife and shorter demoulding time

Product Benefits

- Good wetting of fillers
- With component B **Biresin® G27** for good flowability and short demoulding time
- With component B **Biresin® G27 weiß** for increased flowability and short demoulding time
- High quality of surface detail reproduction
- Low shrinkage and good dimensional stability
- Very good mechanically workable
- Very fine structure

Description

- Basis Two-component-PUR-system
- Component A **Biresin® G27**, polyol, beige, unfilled
- Component B **Biresin® G27**, standard hardener, MDI-based isocyanate, brown, unfilled
- Component B **Biresin® G27 weiß**, MDI-based isocyanate, white, unfilled
- Component B **Biresin® G55**, MDI-based isocyanate, colourless, unfilled

Processing Data		Component A		Component B	
Individual components		Biresin® G27	Biresin® G27	Biresin® G27 weiß	Biresin® G55
Viscosity, 25°C	mPa.s	~ 70	~ 60	~ 13	~ 250
Density	g/ml	1.02	1.14	1.13	1.22
Mixing ratio A : B	in parts by weight	100	100	100	80
Mixtures					
Mixed viscosity, 25°C	mPa.s	~ 50	~ 30	~ 140	~ 140
Potlife, 200 g, RT	min	2' 15''	2' 15''	1' 30''	1' 30''
Demoulding time, RT	min	> 20	> 20	> 15	> 15
Curing time, RT	d	3	3	3	3

Physical Data (approx. values)

Biresin® G27 (A)		with component B	Biresin® G27	Biresin® G27 weiß	Biresin® G55
Colour			beige	white	white
Density	ISO 1183	g/cm³	1.1		
Shore hardness	ISO 868	-	D 70	D 70	D 75
E-Modulus	ISO 178	MPa	1,300	900	1,500
Flexural strength	ISO 178	MPa	55	42	60
Tensile strength	ISO 527	MPa	32	22	40
Elongation at break	ISO 527	%	7	10	7
Impact resistance	ISO 179	kJ/m²	25	60	50
Heat distortion temperature	ISO 75B	°C	80	75	75
Linear shrinkage	internal	%	0.2		

Packaging

Individual components	Biresin® G27 (A)	20 kg; 5 kg; 6 x 1 kg in a box net
	Biresin® G27 (B)	20 kg; 5 kg; 6 x 1 kg in a box net
	Biresin® G27 weiß (B)	20 kg; 5 kg; 6 x 1 kg in a box net
	Biresin® G55 (B)	20 kg; 5 kg; 6 x 1 kg in a box net

Processing

- The material, processing and mould temperature must be from 18 to 25°C.
- Both components must be shaken well before use.
- Pay attention to dry conditions and dry mould surfaces while processing.
- Mix the fillers if necessary thoroughly in the resin or half in both components before mixing the components.
- Porous surfaces (wood) have to be well sealed before.
- The resin and hardener components are to be mixed thoroughly and poured immediately beginning at the lowest point into previously released moulds (e.g. with Sika® Liquid Wax-815 resp. Sika® Pasty Wax-818; for more information see product data sheet).
- For cleaning of cured mouldings from wax residues we recommend Sika® Reinigungsmittel 5. Before application of other cleaners test their compatibility with resin.

Storage

- Minimum shelf life is 12 month under room conditions (18 - 25°C), when stored in original un-opened containers.
- After prolonged storage at low temperature, crystallisation of components may occur. This is easily removed by warming up for a sufficient time to a maximum of 70°C. Allow to cool to room temperature before use.
- Containers must be closed tightly immediately after use to prevent moisture ingress. The residual material needs to be used up as soon as possible.

Health and Safety Information

For information and advice on the safe handling, storage and disposal of chemical products, users shall refer to the most recent Safety Data Sheet (SDS) containing physical, ecological, toxicological and other safety related data.

Disposal considerations

Product Recommendations: Must be disposed of in a special waste disposal unit in accordance with the corresponding regulations.

Packaging Recommendations: Completely emptied packagings can be given for recycling. Packaging that cannot be cleaned should be disposed of as product waste.

Value Bases

All technical data stated in this Product Data Sheet are based on laboratory tests. Actual measured data may vary due to circumstances beyond our control.

Legal Notice

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