

Biresin® G28 - Resin with several hardeners

Fastcast resin, unfilled

Areas of Application

- Casting of master and core models, negatives and mouldings of medium up to big dimensions
- For casting of art and crafts articles with excellent detail reproduction
- Casting of higher thicknesses (> 20 mm) is possible with addition of 300 pbw fillers to 100 parts resin and 100 parts hardener, for thinner layers up to 200 parts

Product Benefits

- Very good flowability and longer potlife
- Good wetting of fillers
- With hardener **Biresin® G26** for high filler loading
- With hardener **Biresin® G27** for faster curing
- With hardener **Biresin® G27 weiß** with increased flowability and for mouldings with lighter colours
- Low shrinkage and good dimensional stability
- Very good mechanically workable

Description

- Basis Two-component-PUR-system
- Resin **Biresin® G28**, polyol, beige, unfilled
- Hardener **Biresin® G26**, standard hardener, MDI-based isocyanate, reddish-brown
- Hardener **Biresin® G27**, MDI-based isocyanate, brown, unfilled
- Hardener **Biresin® G27 weiß**, MDI-based isocyanate, white, unfilled

Processing Data		Resin		Hardener	
Individual components		Biresin® G28	Biresin® G26	Biresin® G27	Biresin® G27 weiß
Viscosity, 25°C	mPas	~ 150	~ 25	~ 60	~ 13
Density	g/ml	1.0	1.15	1.14	1.13
Mixing ratio	in parts by weight	100	100	100	100
Mixtures					
Mixed viscosity, 25°C	mPas		~ 80	~ 90	~ 60
Potlife, 200 g, RT	min		7 - 8	6 - 7	6 - 7
Demoulding time, RT	h		2 - 3	~ 2	2 - 3
Curing time, RT	d		3		

Physical Data (approx. values)

Biresin® G28 resin		with hardener	Biresin® G26	Biresin® G27	Biresin® G27 weiß
Colour			beige	beige	white
Density	ISO 1183	g/cm³	1.1	1.1	1.1
Shore hardness	ISO 868	-	D 68	D 69	D 68
E-Modulus	ISO 178	MPa	1,000	950	900
Flexural strength	ISO 178	MPa	41	40	35
Tensile strength	ISO 527	MPa	27	28	19
Elongation at break	ISO 527	%	6	6	18
Impact resistance	ISO 179	kJ/m²	20	28	40
Heat distortion temperature	ISO 75B	°C	75	80	75
Linear shrinkage	internal	%	0.31	0.26	0.28

Packaging

Individual components	Biresin® G28 resin	50 kg; 20 kg; 5 kg net
	Biresin® G26 hardener	50 kg; 20 kg; 5 kg; 1 kg net
	Biresin® G27 hardener	20 kg; 5 kg; 1 kg net
	Biresin® G27 weiß hardener	20 kg; 5 kg; 1 kg 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 mix can be poured, beginning at the lowest point into previously released moulds (e. g. with Sika® Trennmittel 810, 815 Quick resp. Sika® Trennwachs 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 and storage of products, users should refer to the current Safety Data Sheet 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

The information, and, in particular, the recommendations relating to the application and end-use of Sika products, are given in good faith based on Sika's current knowledge and experience of the products when properly stored, handled and applied under normal conditions in accordance with Sika's recommendations. In practice, the differences in materials, substrates and actual site conditions are such that no warranty in respect of merchantability or of fitness for a particular purpose, nor any liability arising out of any legal relationship whatsoever, can be inferred either from this information, or from any written recommendations, or from any other advice offered. The user of the product must test the product's suitability for the intended application and purpose. Sika reserves the right to change the properties of its products. The proprietary rights of third parties must be observed. All orders are accepted subject to our current terms of sale and delivery. Users must always refer to the most recent issue of the local Product Data Sheet for the product concerned, copies of which will be supplied on request.

