

Sikaflex®-529

Sprayable Polyurethane Hybrid Sealant

Technical Product Data (Typical Values)

| | | |
|--|-----------------------------------|----------------------------|
| Chemical base | One-component polyurethane hybrid | |
| Color | Yellow ochre | |
| Cure mechanism | Moisture-curing | |
| Density (uncured) | 10.7 lb/gal | |
| Non-sag properties | Low Sag | |
| Application temperature | 60° - 95°F (15° - 35°C approx) | |
| Tack free time ¹ | 15 min | |
| Curing speed | (see diagram 1) | |
| Shore A-hardness (ASTM D 2240) | 45 | |
| Tensile strength (ASTM D 412) | 145 psi | |
| Elongation at break (ASTM D 412) | 120% | |
| Tear propagation resistance (ASTM D 624) | 11 pli | |
| Glass transition temperature | -76°F (-60°C) | |
| Service temperature | permanent | -40° - 194°F (-40° - 90°C) |
| Long term | 4 hours | 248°F (120°C) |
| Short term | 1 hour | 266°F (130°C) |
| Shelf life (storage below 77°F (25°C)) | 12 months | |

¹⁾ 73°F (23°C) / 50% r.h.

Description

Sikaflex®-529 is a multifunctional sprayable 1-C polyurethane hybrid sealant for vehicle body assemblies. Sikaflex®-529 is manufactured in accordance with ISO 9001 / 14001 quality assurance systems and the Responsible Care Program.

Product Benefits

- 1-C hybrid-formulation technology
- Reproduces original factory finish, can be applied by spray or brush, suitable for textured seams
- Seals seams with limited overspray
- Bonds well to a wide range of substrates, no priming necessary
- Clean application with Sika® Jetflow-Gun
- Can be overpainted immediately and up to 72 hours after application
- Fast drying
- Excellent non-sag characteristics
- Good acoustic and mechanical damping properties
- High electrical resistance
- Low odor formulation

Industry



Areas of Application

Sikaflex®-529 is designed for use as an elastic sealant for flush seams and lap joints in vehicle body assemblies. Suitable substrates include metals, both primed and finish-coated (2-c paint systems).

This product is suitable for experienced professional users only. Tests with actual substrates and conditions have to be performed to ensure adhesion and material compatibility.

Cure Mechanism

Sikaflex®-529 cures by reaction with atmospheric humidity. At low temperatures the water content of the air is lower and the curing reaction proceeds at a slower rate.

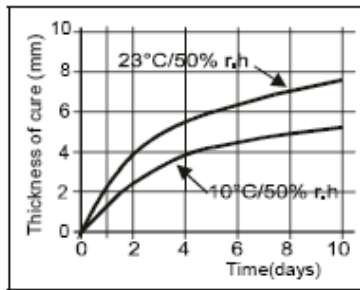


Diagram 1: Curing speed for Sikaflex®-529

Chemical Resistance

Sikaflex®-529 is resistant to fresh water, seawater, limewater and sewage effluent as well as dilute acids and caustic solutions; temporarily resistant to fuels, mineral oils; vegetable and animal fats and oils; not resistant to organic acids, alcohol, concentrated mineral acids and caustic solutions or solvents.

The above information is offered for general guidance only. Advice on specific applications will be given on request.

Method of Application

Surface preparation

Surfaces must be clean, dry and free from all traces of grease, oil and dust. Where appropriate, the adhesion of the sealant can be improved by treating the substrate with Sika® Cleaner 226. Advice on specific applications is available from the Technical Service Department of Sika Industry. (888) 832-7452.

Application

Sikaflex®-529 is applied with the Sika® Jetflow-Gun, or other appropriate spray equipment. Operating air pressure: minimum 72 psi (5 bar). This equipment should be operated in strict accordance with the manufacturer's instructions.

For advice on selecting and setting up a suitable pump system, as well as on the techniques of pump operated application, please contact the System Engineering Department of Sika Industry

Tooling and finishing

Sikaflex®-529 can be tooled and finished with a brush or spreader within ten minutes of application.

Removal

Uncured Sikaflex®-529 can be removed from tools and equipment with Sika® Remover-208, mineral spirits or another suitable solvent. Once cured, the material can only be removed mechanically. Hands and exposed skin should be washed immediately using a suitable industrial hand cleaner and water. Strictly follow solvent manufacturer's instructions for use and warnings. Do not use solvents on skin!

Overpainting

Sikaflex®-529 can be overpainted immediately after application with one or two component paint systems based on a non-oxidative drying mechanism. The paint must be tested for compatibility by

carrying out preliminary trials. The hardness and film thickness of the paint may impair the elasticity of the sealant and lead to cracking of the paint film.

Limitations

Do not apply at temperatures below 60°F or above 95°F (15°- 35°C approx). The optimum temperature for substrate and sealant is between 60°F and 77°F (15°C and 25°C approx).

CAUTION: IRRITANT. Contains Silane-Terminated Prepolymer (CAS: Mixture). May cause eye/skin/respiratory irritation. Strictly follow all usage, handling and storage instructions.

HMIS

| | |
|---------------------|---|
| Health | 2 |
| Flammability | 1 |
| Reactivity | 0 |
| Personal Protection | C |

First Aid Measures

Eyes – Hold eyelids apart and flush thoroughly with water for 15 minutes. **Skin** – Remove contaminated clothing. Wash skin thoroughly for 15 minutes with soap and water. **Inhalation** – Remove to fresh air. **Ingestion** – Do not induce vomiting. Dilute with water. Contact physician. **In all cases contact a physician immediately if symptoms persist.**

Further Information

Copies of the following publications are available on request at www.sikaindustry.com:
- Material Safety Data Sheets
- Product Data Sheets

In case of emergency call:

Chemtec: 800-424-9300
International: 703-527-3887

Further information available at:
www.sikaindustry.com

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**KEEP OUT OF REACH OF CHILDREN
NOT FOR INTERNAL CONSUMPTION
FOR INDUSTRIAL USE ONLY
KEEP CONTAINER TIGHTLY CLOSED
FOR PROFESSIONAL USE ONLY**

Packaging Information

| | |
|--------|-----------------|
| Unipac | 300 ml |
| Drum | 51.5 gal (195l) |

Value Basis

All technical data stated on this Product Data Sheet are based on the results of laboratory tests only. Actual measured data in the field may vary due to site specific conditions which are not known to Sika and beyond our control.

Handling and Storage

Avoid direct contact. Wear personal protective equipment (chemical resistant gloves/goggles/clothing) to prevent direct contact with skin and eyes. Use only in well ventilated areas. Open doors and windows during use. Use a properly fitted NIOSH respirator if ventilation is poor. Wash thoroughly with soap and water after use. Remove contaminated clothing and laundry before reuse. Store below 77°F (25°C) in a cool dry place away from sunlight.

Clean Up

Use personal protective equipment (chemical resistant gloves / goggles / clothing). Without direct contact, remove spilled or excess product and place in suitable sealed container. Dispose of excess product and container in accordance with applicable environmental regulations.

Limited Material Warranty

SIKA warrants this product for one year from date of installation to be free from manufacturing defects and to meet the technical properties on the current Product Data Sheet if used as directed within shelf life. User determines suitability of product for intended use and

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Further information available at:
www.sikaindustry.com

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