

Product Data Sheet

Edition 11.2008

CSC Master Format™ 07 92 13

Sikaflex® 15LM

Sikaflex® 15LM**High-Performance, Low-Modulus Elastomeric Sealant**

Description	Sikaflex® 15LM is a low-modulus, high-performance, one-component, polyurethane-based, non-sag elastomeric sealant.			
Where to Use	<ul style="list-style-type: none">■ Excellent for moving joints i.e. expansion, construction, whether in vertical or horizontal applications.■ Suitable for use between similar as well as dissimilar materials.■ Typical applications include joints in panel and wall systems, around window and door frames, reglets, flashings, etc.■ Exceptional sealant choice for high rise and facade applications where high movement capacity is required.■ An effective sealant for use in Exterior Insulation Finish Systems (EIFS).			
Advantages	<ul style="list-style-type: none">■ Low modulus of elasticity.■ Easy and ready to gun.■ Eliminates time, effort, waste, and equipment cleaning.■ Cures to a durable, flexible consistency.■ Excellent cut and tear resistance.■ Stress relaxation properties.■ Non leaching.■ ULc certified for joint systems FF-S-0007, WW-S-0011, FW-S-0015, HW-S-0076.■ Capable of +100% / -50% joint movement.■ Excellent adhesion.■ Bonds to most construction materials, often without primer.■ Excellent resistance to aging, weathering.■ Proven in tough climates around the world.■ Can be painted with water-, oil- and rubber-based paints.■ Meets CAN/CGSB 19.13-M87, Classification MCG-2-40-B-N.■ Meets Federal Specification TT-S-00230C, Type II, Class A.■ Meets Federal Specification TT-S-00227E■ CFIA acceptance■ USDA acceptance■ Meets ASTM C 920, Type S, Grade NS, Class 25.■ Meets Federal Specification for Silicones TT-S-001543A, Type NON SAG■ SWRI validated.■ Canadian Food Inspection Agency accepted■ Ministère des Transports du Québec acceptance			
Technical Data				
Packaging	300 mL (10.1 fl. oz) cartridge, 24/case; 590 mL (20 fl. oz) sausage, 20/case 11.4 L (3 US gal.) pail (special order only).			
Colour	White, Colonial White, Aluminum Grey, Limestone, Black, Dark Bronze, Capitol Tan, Off-White, Almond, Beige, Coping Stone, Aluminum Stone, Redwood Tan, Hartford Green.			
Shelf Life	Cartridge/sausage: 12 months; pail: 9 months - in original, unopened packaging. Store between 4° - 23°C (39° - 73°F). Condition product to 18° - 23°C (65° - 73°F) before using.			
Yield	Linear Meter of Sealant per Liter		Linear Meter of Sealant per Cartridge	
Width	Depth		Depth	
mm (in)	6 (¼)	13 (½)	6 (¼)	13 (½)
6 (¼)	24.8		24.4	
13 (½)	12.4	6.2	12.2	6.1
19 (¾)	8.3	4.1	8.2	4.0
Application Temperature	4° - 38°C (39° - 100°F). Sealant should be installed when joint is at mid-range of its anticipated movement.			
Properties at 23°C (73°F) and 50% R.H.				
Service Range	-40° - 77°C (-40° to 170°F)			
Curing Rate	Tack-free time		3 to 6 hrs (TT-S-00230C)	
	Tack-free to touch		3 hrs	
	Final cure		7 to 10 days	
Shore A Hardness ASTM D 2240				
21 days	20 ± 5			
Tensile Properties ASTM D 412				
21 days	Tensile stress		0.86 MPa (125 psi)	
	Elongation at break		700%	
	Modulus of elasticity	25%	0.13 MPa (20 psi)	
		50%	0.24 MPa (35 psi)	
		100%	0.34 MPa (50 psi)	



Adhesion in Peel TT-S-00230C

Substrate	Peel Strength	Adhesion Loss
Aluminum	4.25 N/mm (25 lb/in)	0%
Glass	4.25 N/mm (25 lb/in)	0%
Concrete	5.1 N/mm (30 lb/in)	0%
Weathering Resistance	Excellent	
Chemical Resistance	Good resistance to water, diluted acids, and diluted alkalines. Not normally for fully immersed conditions.	
VOC (EPA Method 24)	35 g/L	

How to Use**Surface Preparation**

All joint interfaces must be clean, sound, and frost-free. Joint interfaces must be free of oils, grease, curing compound residues, and any other foreign matter that might prevent bond. Ideally this should be accomplished by mechanical means. Bond breaker tape or backer rod must be used in bottom of joint to prevent bond.

Priming

Priming is not usually necessary. Most substrates only require priming if testing indicates a need or where sealant will be subjected to water immersion after cure. Consult Sikaflex® Primers technical data sheet for additional information

Note: Most Exterior Insulation Finish System (EIFS) manufacturers recommend the use of a primer. When EIFS manufacturer specifies a primer or if on-site bond testing indicates a primer is necessary, Sikaflex® 202 primer is recommended. On-site adhesion testing is recommended with final system prior to the start of a job.

Application

Recommended application temperatures between 4° - 38°C (39° - 100°F). For cold-weather application, store units at approximately 21°C (70°F); remove just prior to using. Make sure joint is frost-free. Cut plastic tip on cartridge to desired joint size. Puncture airtight seal at base of tip. Place nozzle of gun into bottom of joint and fill entire joint. Keeping the nozzle deep in the sealant, continue with a steady flow of sealant preceding nozzle to avoid air entrapment. Also, avoid overlapping of sealant since this also entraps air. Tool as required. Proper joint design for moving joints is 2:1 width to depth ratio, with a recommended 6 mm (1/4 in) minimum and 13 mm (1/2 in) maximum depth of sealant. For non-moving joints, the width to depth ratio can vary. Install with hand or power operated caulking gun. For best performance, Sikaflex® 15LM should be gunned into joint when joint slot is at mid-point of its designed expansion and contraction.

Clean Up

Uncured material can be removed with Sika® Equipment Cleaner/Epoxy Thinner or Sika® Hand Cleaner. Cured material can only be removed mechanically.

Limitations

- Allow 1 week to cure under standard conditions when using Sikaflex® 15LM in total water immersion situations and prior to painting.
- When overcoating with water-, oil- and rubber-based paints, compatibility and adhesion testing is essential.
- Avoid exposure to high levels of chlorine. (Maximum continuous level is 5 ppm of chlorine.)
- Maximum depth of sealant must not exceed 13 mm (1/2 in); minimum depth is 6 mm (1/4 in).
- Do not cure in the presence of curing silicone sealants.
- Avoid contact with alcohol and other solvent cleaners during cure.
- Do not apply when moisture-vapour-transmission condition exists from the substrate as this can cause bubbling within the sealant.
- Some minimal surface skinning of product may be present in bulk packaging (pails, drums) within its shelf life. Cut and discard cured material to expose the uncured product that still may be used.
- Use opened cartridges and uni-pac sausages the same day.
- When applying sealant, avoid air-entrapment.
- Since system is moisture-cured, permit sufficient exposure to air.
- White colour tends to yellow slightly when exposed to ultraviolet rays.
- Light colors can yellow slightly if exposed to direct gas fired heating elements prior to formation of initial skin.
- The ultimate performance of Sikaflex® 15LM depends on good joint design and proper application to properly prepared joint surfaces.
- The depth of sealant in horizontal joints subject to traffic is 13 mm (1/2 in).
- Do not tool with detergent or soap solutions.
- The ultimate performance of Sikaflex® 15LM depends on good joint design and proper application. With joint surfaces properly prepared and sealed, movement of 100% - 50% can be tolerated.
- Certain substrates require the use of a primer. Please consult the Sikaflex® Primers Product Data Sheet or Sika's Technical Services.

Caution

Avoid contact with skin. Wash hands thoroughly with warm water and soap, or use Sika® Hand Cleaner. According to FHSLA Toxicity rating, Sikaflex® 15LM is a skin irritant, an eye irritant, not toxic orally, not toxic by inhalation and not toxic dermally. Consult product label for additional information.

First Aid

In case of skin contact, wash with soap and water. For eye contact flush immediately with plenty of water for at least 15 min. Contact a physician. For respiratory problems, transport victim to fresh air. Remove contaminated clothing and wash before re-use.

For more information, consult Sika Material Safety Data Sheet.

KEEP OUT OF REACH OF CHILDREN
FOR INDUSTRIAL USE ONLY

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, within their shelf life. 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 recommendations, or from any other advice offered. The proprietary rights of third parties must be observed. All orders are accepted subject to our current terms of sale and delivery. Users should always refer to the most recent issue of the Technical Data Sheet for the product concerned, copies of which will be supplied on request or can be accessed in the Internet under www.sika.ca.

Sika Canada Inc.

601 Delmar Avenue
Pointe-Claire, QC H9R 4A9
Tel.: (514) 697-2610
Fax: (514) 697-3087

Ontario

6915 Davand Drive
Mississauga, ON L5T 1L5
Tel.: (905) 795-3177
Fax: (905) 795-3192

Alberta

18131-114th Avenue N.W.
Edmonton, AB T5S 1T8
Tel.: (780) 486-6111
Fax: (780) 483-1580

1-800-933-SIKA
www.sika.ca

An ISO 9001:2000 certified company
Pointe-Claire : ISO 14001:2004 certified EMS

