

Product Data Sheet
Edition 9.23.2014
Sikadur® 35, Hi-Mod LV LPL

Sikadur® 35, Hi-Mod LV LPL

High-modulus, low-viscosity, high-strength,
extended pot life, epoxy adhesive

Description	Sikadur® 35, Hi-Mod LV LPL is a 2-component, 100% solids, moisture-tolerant, low-viscosity, high-strength, multi-purpose epoxy resin adhesive. It conforms to the current ASTM C-881, Types I, II, and IV, Grade-1, Class-C** and AASHTO M-235 specifications. **except for bond strength
Where to Use	<ul style="list-style-type: none"> ■ Low pressure and high pressure injection of cracks in structural concrete, masonry, wood, etc. ■ Gravity-feed of cracks in horizontal concrete and masonry. ■ Epoxy resin binder for epoxy mortar patching and grouting. ■ Seal interior slabs and exterior above-grade slabs from water, chlorides and mild chemical attack; also improves wearability. ■ Epoxy resin binder for epoxy mortar repair for structural pile members.
Advantages	<ul style="list-style-type: none"> ■ Extended pot life. ■ Low viscosity and excellent penetrating ability. ■ Slow reaction rate and low exotherm. ■ Convenient, easy mix ratio; A:B = 2:1 by volume. ■ Unique, high-strength, structural adhesive for "can't dry" surfaces. ■ Deep, penetrating and tenacious bonding of cracks in structural concrete. ■ Excellent chemical resistance.
Coverage	1 gal. yields 231 cu. in. of adhesive and grout. 1 gal. of adhesive, when mixed with 5 gal. by loose volume of oven-dried aggregate, yields approximately 808.5 cu. in. of epoxy mortar. Typical coverage is 150-175 ft. ² /gal. (3.7-4.3 m ² /L) for surface sealing. Coverage varies with porosity and surface profile of substrate. Higher porosity concrete will reduce coverage.
Packaging	3 gal. units. 165 gal. units.

Typical Data (Material and curing conditions @ 73°F (23°C) and 50% R.H.)

RESULTS MAY DIFFER BASED UPON STATISTICAL VARIATIONS DEPENDING UPON MIXING METHODS AND EQUIPMENT, TEMPERATURE, APPLICATION METHODS, TEST METHODS, ACTUAL SITE CONDITIONS AND CURING CONDITIONS.

Shelf Life	2 years in original, unopened containers	
Storage Conditions	Store dry at 40°-95°F (4°-35°C). Condition material to 65°-75°F (18°-24°C) before using.	
Color	Clear, amber.	
Mixing Ratio	Component 'A' : Component 'B' = 2:1 by volume	
Viscosity (Mixed)	Approximately 250 cps.	
Pot Life	Approximately 90 minutes (250 grams). Approximately 40 minutes (250 grams) @ 100°F (38°C)	
Tensile Properties (ASTM D-638)	60°F (15°F)	73°F (23°F)
7 day Tensile Strength	7,200 psi (49.6 MPa)	7,500 psi (51.8 MPa)
Elongation at Break	4.0 %	4.8%
Heat Deflection Temperature (ASTM D-648) 7 day (Fiber Stress Loading = 264 psi)	120°F (49°C)	
Bond Strength (ASTM C-882): Hardened concrete to hardened concrete		
2 day (moist cure)	Bond Strength 1,100 psi (7.6 MPa)	
14 day (moist cure)	Bond Strength 1,300 psi (9.0 MPa)	
Water Absorption (ASTM D-570) 24 hrs. (24 hr. immersion)	0.35%	
Compressive Properties (ASTM D-695):		
Compressive Strength	73°F (23°C)	90°F (32°C)
1 day	1,450 psi (10.0 MPa)	7,100 psi (49.0 MPa)
3 day	9,600 psi (66.2 MPa)	10,000 psi (69.0 MPa)
7 day	11,800 psi (81.3 MPa)	11,100 psi (76.6 MPa)
28 day	13,000 psi (89.6 MPa)	11,300 psi (78.0 MPa)
Compressive Modulus 7 day	270 psi (1,863 MPa)	



PRIOR TO EACH USE OF ANY SIKA PRODUCT, THE USER MUST ALWAYS READ AND FOLLOW THE WARNINGS AND INSTRUCTIONS ON THE PRODUCT'S MOST CURRENT PRODUCT DATA SHEET, PRODUCT LABEL AND SAFETY DATA SHEET WHICH ARE AVAILABLE ONLINE AT [HTTP://USA.SIKA.COM/](http://USA.SIKA.COM/) OR BY CALLING SIKA'S TECHNICAL SERVICE DEPARTMENT AT 800.933.7452 NOTHING CONTAINED IN ANY SIKA MATERIALS RELIEVES THE USER OF THE OBLIGATION TO READ AND FOLLOW THE WARNINGS AND INSTRUCTIONS FOR EACH SIKA PRODUCT AS SET FORTH IN THE CURRENT PRODUCT DATA SHEET, PRODUCT LABEL AND SAFETY DATA SHEET PRIOR TO PRODUCT USE.

How to Use

Surface Preparation Surface must be clean and sound. It may be dry or damp, but free of standing water. Remove dust, laitance, grease, curing compounds, impregnations, waxes and any other contaminants.
Preparation Work: Concrete - Should be cleaned and prepared thoroughly to achieve a laitance and contaminant free, open textured surface by blast cleaning or equivalent mechanical means.
Steel - Should be cleaned and prepared thoroughly by blast cleaning or other equivalent mechanical means.

Mixing Proportion 1 part Component 'B' to 2 parts Component 'A' by volume into a clean pail. Mix thoroughly for 3 minutes with a low-speed (400 - 600 rpm) drill using Sika Paddle until uniformly blended. Mix only that quantity that can be used within its pot life.
To prepare an epoxy mortar slowly add 4-5 parts by loose volume of an oven-dried aggregate to 1 part of the mixed Sikadur® 35, Hi-Mod LV LPL and mix until uniform in consistency.

Application
To gravity feed cracks - Blow vee-notched surface of crack clean with oil-free compressed air. Pour neat Sikadur® 35, Hi-Mod LV LPL, into vee-notched crack. Continue placement until completely filled. Seal underside of slab prior to filling if cracks reflect through.
To seal slabs - Spread neat Sikadur® 35, Hi-Mod LV LPL over slab. Allow penetration. Remove excess to prevent surface film. Seal interior slabs and above-grade exterior slabs only.
For an epoxy mortar - Prime prepared surface with neat Sikadur® 35, Hi-Mod LV, LPL. Place prepared epoxy mortar before primer becomes tack-free. Place the epoxy mortar using trowels. Compact and level with vibrating screed or trowels. Finish with finishing trowel. Epoxy mortar is for interior use only.
To pressure inject cracks - Suitable for low or high pressure injection. Use automated injection equipment or manual method. Set appropriate injection ports based on system used. Seal ports and crack with Sikadur® 31, Hi-Mod Gel or Sikadur® 33. When the epoxy adhesive seal has cured, inject Sikadur® 35, Hi Mod LV LPL with steady pressure. Consult Technical Service for additional information.

- Limitations**
- Minimum application temperature 40°F (4°C).
 - Do not thin with solvents.
 - Use oven-dried aggregate only.
 - Maximum epoxy mortar thickness is 1.5 in. (38 mm) per lift.
 - Epoxy mortar is for interior use only.
 - Do not seal exterior slabs on grade.
 - Minimum age of concrete must be 21-28 days, depending upon curing and drying conditions, for mortar applications and to seal slabs.
 - Porous substrates must be tested for moisture-vapor transmission prior to mortar or sealing slabs.
 - Not for injection of cracks under hydrostatic pressure.
 - Do not inject cracks greater than 1/4 in. (6 mm) Consult Technical Service.
 - Not an aesthetic product. Color may alter due to variations in lighting and/or UV exposure.

PRIOR TO EACH USE OF ANY SIKA PRODUCT, THE USER MUST ALWAYS READ AND FOLLOW THE WARNINGS AND INSTRUCTIONS ON THE PRODUCT'S MOST CURRENT PRODUCT DATA SHEET, PRODUCT LABEL AND SAFETY DATA SHEET WHICH ARE AVAILABLE ONLINE AT [HTTP://USA.SIKA.COM/](http://usa.sika.com/) OR BY CALLING SIKA'S TECHNICAL SERVICE DEPARTMENT AT 800.933.7452 NOTHING CONTAINED IN ANY SIKA MATERIALS RELIEVES THE USER OF THE OBLIGATION TO READ AND FOLLOW THE WARNINGS AND INSTRUCTIONS FOR EACH SIKA PRODUCT AS SET FORTH IN THE CURRENT PRODUCT DATA SHEET, PRODUCT LABEL AND SAFETY DATA SHEET PRIOR TO PRODUCT USE.

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

For further information and advice regarding transportation, handling, storage and disposal of chemical products, users should refer to the actual Safety Data Sheets containing physical, ecological, toxicological and other safety related data. Read the current actual Safety Data Sheet before using the product. In case of emergency, call CHEMTREC at 1-800-424-9300, International 703-527-3887.

Prior to each use of any Sika product, the user must always read and follow the warnings and instructions on the product's most current Product Data Sheet, product label and Safety Data Sheet which are available online at <http://usa.sika.com/> or by calling Sika's Technical Service Department at 800-933-7452. Nothing contained in any Sika materials relieves the user of the obligation to read and follow the warnings and instruction for each Sika product as set forth in the current Product Data Sheet, product label and Safety Data Sheet prior to product use.

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 assumes all risks. Buyer's sole remedy shall be limited to the purchase price or replacement of product exclusive of labor or cost of labor. NO OTHER WARRANTIES EXPRESS OR IMPLIED SHALL APPLY INCLUDING ANY WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. SIKA SHALL NOT BE LIABLE UNDER ANY LEGAL THEORY FOR SPECIAL OR CONSEQUENTIAL DAMAGES. SIKA SHALL NOT BE RESPONSIBLE FOR THE USE OF THIS PRODUCT IN A MANNER TO INFRINGE ON ANY PATENT OR ANY OTHER INTELLECTUAL PROPERTY RIGHTS HELD BY OTHERS. SALE OF SIKA PRODUCTS ARE SUBJECT SIKA'S TERMS AND CONDITIONS OF SALE AVAILABLE AT [HTTP://USA.SIKA.COM/](http://usa.sika.com/) OR BY CALLING 201-933-8800.

Visit our website at usa.sika.com

1-800-933-SIKA NATIONWIDE

Regional Information and Sales Centers. For the location of your nearest Sika sales office, contact your regional center.

Sika Corporation
 201 Polito Avenue
 Lyndhurst, NJ 07071
 Phone: 800-933-7452
 Fax: 201-933-6225

Sika Canada Inc.
 601 Delmar Avenue
 Pointe Claire
 Quebec H9R 4A9
 Phone: 514-697-2610
 Fax: 514-694-2792

Sika Mexicana S.A. de C.V.
 Carretera Libre Celaya Km. 8.5
 Fracc. Industrial Balvanera
 Corregidora, Queretaro
 C.P. 76920
 Phone: 52 442 2385800
 Fax: 52 442 2250537



Sika and Sikadur are registered trademarks.
 Printed in Canada.