

Sika® MonoTop®-615 HB

High Build Polymer Modified Repair Mortar

Product Description

Sika MonoTop-615 HB is a cementitious, polymer modified, one-component repair mortar containing reactive microsilica. Sika MonoTop-615 HB is part of Sika MonoTop system for concrete repair and protection.

Uses

- The lightweight nature of MonoTop-615 HB enables very thick layers to be applied in vertical and overhead applications
- It is ideal for use in repairing damaged and spalled concrete caused by reinforcement corrosion.
- Sika MonoTop-615 HB can be used for most types of general concrete repair and refurbishment work.

Advantages

- Excellent high build and workability characteristics
- Enables rapid repair work to be undertaken.
- One component-just add water and mix.
- Layer thickness up to 80 mm is possible in vertical application.
- Microsilica and polymer modified.
- Good resistance to water and chloride ion penetration.
- Improve sulphate resistance

Product Data

Form	Cement based Powder	
Colour	Grey	
Wet Density	Approx 1.8 kg/ litre of freshly mixed mortar	
Mix Ratio	Water : Powder = 1 : 7.3 – 8.1 parts by weight (i.e. approx 3,25 litre water per bag 25 kg)	
Material consumption	For 1 litre of fresh mortar: approx. 1.60 kg powder is required Material consumption depends on concrete surface and application method.	
Compressive Strength	1 day ~ 19 N/mm ² 7 days ~ 30 N/mm ² 28 days ~ 40 N/mm ²	(ASTM C109)
Modulus of Elasticity	~ 10'000 N/mm ²	(ASTM C348)
Flexural Strength	1 day ~ 5 N/mm ² 7 days ~ 8 N/mm ² 28 days ~ 10 N/mm ²	
Bond Strength	~ 1.5 N/mm ² (concrete failure, without using bonding slurry) ~ 2.0 N/mm ² (concrete failure, with using Sikatop 121 as a bonding slurry)	
Pot Life (30°C)	Approx. 60 minutes	



Table of Contents

Application Temperature	Minimum 5°C / Maximum 30°C
Application Thickness per Layer	Minimum 5 mm / Maximum 80 mm (Max 30 mm for overhead application up to 50-mm thick on small area application)
Storage	Store in dry, cool and shaded place
Shelf Life	9 months from date of production if stored properly in unopened original packing
Packaging	20 kg bag

Instruction for Use

Surface Preparation	<ul style="list-style-type: none"> ■ The concrete substrate must be sound clean and free from oils, grease or surface contaminants. All loose materials and surface laitance must be removed by high pressure water jet blasting or by other mechanical means. Small areas and spot repairs should be mechanically prepared by needle gunning, bush hammering or similar. ■ The prepared substrate should be dampened with clean water (SSD). Sika MonoTop-615 HB should be applied over a bonding coat slurry of SikaTop-121 or SikaTop Armatec-110 Epocem (refer to each data sheets). ■ All feathered edges around the area to be repaired should be squared off with an angle grinder and chiselled down to a minimum depth of 10 mm
Mixing	<ul style="list-style-type: none"> ■ Pour 3.5 litres of clean water into a suitable mixing container and slowly add all the powder while mixing continuously with a mixing paddle attached to a low speed electric drill (max 500 rpm, with power approx. 1000 watt). ■ Thoroughly mix until a smooth, lump free consistency is achieved. A minimum mixing time of 3 minutes is recommended. ■ The water can be adjusted \pm 10% to suit the consistency desired
Application	<ul style="list-style-type: none"> ■ While bonding coat of SikaTop-121 is still tacky, pack the mortar well into the cavity of repair. Use a placing rather than a rendering technique to fill all voids and ensure thorough compaction is achieved. ■ Force the Sika MonoTop-615 HB against the edge of the repair and progressively work towards the centre. ■ For repair in excess of 80 mm thick, apply in layers ensuring that each previous layer is sufficiently hardened and well keyed. If previous layers are over 48 hours old, scabble the surface and dampen. SikaTop-121 may be used as a bonding slurry between layers ■ Steel trowel the final layer if required to achieve a smooth, tight finish.
Curing	As with all cementitious based mortar, Sika MonoTop-615 HB must be protected against direct sunlight and wind while hardening. Cover all exposed mortar with wet hessian, plastic sheeting or use Sika curing compound
Handling Precautions	<ul style="list-style-type: none"> ■ Avoid contact with skin and eyes ■ Wear protective gloves and eye protection during work ■ If skin contact occurs, wash skin thoroughly <p>If in eyes, hold eyes open, flood with warm water and seek medical attention without delay.</p>

Legal Notes

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 product 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.

PT. Sika Indonesia
 Jl. Raya Cibinong- Bekasi km. 20
 Limusnunggal- Cileungsi
 BOGOR 16820 - Indonesia
 Tel. +62 21 8230025
 Fax +62 21 8230026
 Website : idn.sika.com
 e-mail: sikacare@id.sika.com

Branches
 Surabaya :
 Komp. Pergudangan Meiko Abadi III Blok B-52 & B-53, Ds. Gemurung,
 Gedangan, Sidoarjo 61254
 Tel : 031- 8911333; Fax : 031-8916333
 Medan :
 Jl. Serbaguna (Simp. Jalan Veteran), Kompleks Pergudangan Brayan
 Trade Center No. 34, Medan 20239
 Tel : 844 6697, 844 6997 ; Fax : (061) 844 6698
 Batam :
 Jl. Laksamana Bintan, Komp. Bumi Riau Makmur Blok E No.3, Sungai Panas
 Tel : (0778) 424928; Fax : (0778) 450189

