

Cuglacrete Epoxy Fix R4

UGLACRETE Epoxy Fix R4:


- is a solvent-free 2-component system consisting of:
 Component A: epoxy resin
 Component B: polyamine hardener
- complies with the requirements of the Building Materials Decree
- is suitable for indoor and outdoor applications

Application / properties

- Spreading crosscut edges of pre-stressed concrete beams
- Filling blowholes in concrete
- Carrying out minor repairs
- Gluing concrete, rubber and steel together
- Smoothing out contacting surfaces on slabs and supports

UGLACRETE Epoxy Fix R4 can be used for repair methods according to NEN-EN 1504-3 table 1:

- 3.1 Concrete restoration by applying mortar by hand
- 4.4 Structural strengthening by adding mortar or concrete
- 7.1 Increasing cover to reinforcement with additional cementitious mortar or concrete
- 7.2 Replacing contaminated or carbonated concrete

 0956	
UGLA BV Rudonk 6a 4824 AJ BREDA	
0956-CPR-0707	
NEN-EN 1504-3	
DoP: EC0320-02-10-2023	
Concrete repair mortar based on epoxy for constructional application	
Compressive strength	class R4
Chloride ion content	≤ 0,05 %
Adhesive Bond	≥ 2,0 MPa
Carbonation resistance	Passes
Elastic modulus	NPD
Thermal compatibility	≥ 2,0 MPa
Capillary absorption	≤ 0,5 kg/(m ² *h ^{0,5})
Dangerous substances	comply with 5.4
Reaction to fire	NPD

Directions for use

Cugla advises to do the concrete repair as described in **NEN-EN 1504-10** Products and systems for the protection and repair of concrete structures – Definitions, requirements, quality control and evaluation of conformity – **Part 10: Site application of products and systems and quality control of works.**

Pre-treatment

Before applying CUGLACRETE EPOXY FIX R4 ensure the surface to be covered is clean and dry, and remove all traces of grease, loose parts and cement coating.

Mixing

Add component B to component A. Mix to a homogeneous mixture, after that mix again to prevent insufficient hardening, or soft patches.

Apply Mortar

Minimum processing temperature and temperature of the surface 5 °C.

- **Apply manual**
Apply the mortar in layers and make sure the mortar is well compacted. After application the surface can be finished with a trowel.

Storage and shelf life

If stored in a dry place the product has a shelf life up to 12 months after production date, as stated on the packaging.

Health and environmental aspects

Cugla advises:

- To wear appropriate personal protective equipment (PPE).
- To avoid contact with eyes and skin.
- In case of contact with the eyes, rinse immediately with plenty of water and seek medical advice.
- In case of swallowing the product, immediately contact a doctor and show the package or the safety data sheet.

Safety data sheets, SDS, are available via our website www.cugla.com.

EC declaration of conformity

The undersigned declares that this concrete repair product, as mentioned in this technical data sheet, meets the requirements according to NEN-EN 1504-3.

The Factory Production Control (FPC) is evaluated by BMC Certificate Gouda The Netherlands. The EC certificate of conformity, number 0956-CPR-0707, is awarded by KIWA-BMC Certificate on 01-07-2013.

Breda, 02 Octobre 2023

I. Velthoen
Technical Director

Technical data at 20 °C and 65% r.v.

Property	Standard	Value	
Maximum grain	EN 12192-1	2,0	mm
Exposure class	EN 206-1	X0 till XA3	
Layer thickness		min	3
		max	20
Density	EN 12190	1700	kg/m ³
Initial setting time		30	min
Air content	EN 12350-7	NPD	%
Compressive strength	EN 12190	1 day	8
		7 days	50
		28 days	100
Adhesive bond		28 days	3,0
		Freeze-thaw (50 cycli with salt)	3,7
Carbonation resistance	EN 13295	0,0	mm
Elastic modulus	EN 13412	NPD	
Shrinkage	EN 12617-4	7 days	NPD
		28 days	NPD
Capillary absorption	EN 13057	0,003	kg/(m ² *h ^{0,5})

Adhesive bond under different circumstances

Treatment	Value	
Tile sandblasted / untreated	> 3,5	N/mm ²
Tile sandblasted / hydrofobing Protectosil BHN	> 3,5	N/mm ²
Tile not sandblasted / untreated	> 3,5	N/mm ²
Tile not sandblasted / hydrofobing Protectosil BHN	> 3,5	N/mm ²

Changes to this document will not automatically be issued. Any previous product information hereby becomes null and void. The above data is provided to the best of our knowledge. The tests have been carried out under laboratory conditions. We will not accept any liability for the results achieved on the work, now that we have no influence on the process nor the specific conditions of the work.

Our general sales, delivery and payment conditions apply to all our transactions and are available at www.cugla.com.