



# MC-Injekt 3000 HPS

Swelling-sealing, softelastic acrylate gel for injection into reinforced concrete, masonry and sealing of soil and joints

## Product Properties

- Very good injectivity due to very low viscosity
- Applicable in a wide range of temperature and at very low component temperatures
- Easily adjustable injection paths due to short, variable reaction time
- Reliable sealing due to high elasticity and good swelling properties
- Corresponds to building material class B2 in the fire behaviour according to DIN 4102 in the injection medium
- Fulfils the UBA guideline for seals in contact with drinking water
- High chemical resistance even in highly alkaline environment
- Waterproofing up to at least 7 bar water pressure
- Particularly powerful due to polymer reinforcement and high solids content

## Areas of Application

- Sealing of cracks in concrete and reinforced concrete according to EN 1504-5 U (S1) W (2/3/4) (1/40)
- Closing and sealing of cracks in concrete and reinforced concrete with general technical approval
- Sealing of cracks, joints and cavities in masonry by means of injection
- Injection of structural components - both dry and damp, water-bearing during injection as well as permanently exposed to water following injection from at least one side
- Area-measured sealing injection into structure spaces
- Area-measured sealing injection into building ground (veil injection)
- Injection of construction joints by means of injection hoses
- REACH-assessed exposure scenarios: long-term water-contact, periodical inhalation, application

## Application

### Preparative measures

Prior to application the injectivity of the structure or component must be checked in accordance with the state of the art and an injection concept is to be defined.

### Mixing of components

MC-Injekt 3000 HPS is a multi-component injection system. Component A (base) and B (starter liquid) are mixed from subcomponents in the mixing ratio 1:1 p.b.v.

Component A is mixed from subcomponent A1 and A2. Component A2 is poured into component A1 and mixed thoroughly using a wooden paddle.

Component B2 is dissolved in the polymer dispersion (component B1) in or water and mixed with a wooden paddle (maximum amount of B2 is 4 %). The reaction times of MC-Injekt 3000 HPS are dependent on the concentration of component B2 in component B1 or in water.

### Dosage of B2 in

102.6 kg B1

0,2 kg

0,5 kg

1 kg

2 kg

4 kg

### Reaction time

20 °C

water

8'36"

5'27"

3'48"

3'10"

2'30"

B1

10'

7'

4'40"

3'30"

3'

10 °C

water

17'

11'

6'30"

5'15"

3'45"

B1

32'

14'

9'27"

6'05"

4'15"

### Injection

Injection is carried out using a 2-component injection pump, e.g. MC-I 700. The mixing section in the mixing head of the pump must be at least 20 cm long if spiral mixers are used or at least 10 cm long if grid mixers are used. Injection packers should be chosen in accordance to the damaged area (e.g. MC-Injektionspacker DS 14).

### Cleaning of equipment

Within the pot life all tools and equipment can be cleaned with air or water. Partially or completely cured material can only be removed mechanically.



## Technical Data for MC-Injekt 3000 HPS

Characteristic	Unit	Value*	Comment
Mixing ratio	MT	1 : 1	A : B
	kg	119 : 6	A1 : A2 (drum)
	kg	23.8 : 1.19	A1 : A2 (canister)
	kg	102.6 : 0.5	B1 : B2 (drum) variabel
	kg	24.6 : 0.125	B1 : B2 (canister) variabel
Density			
Mixed density with B1	kg/dm <sup>3</sup>	1.04	DIN 53 479
Mixed density with water	kg/dm <sup>3</sup>	1.02	DIN 53 479
Viscosity	mPa·s	approx. 15	DIN EN ISO 3219 (with comp. B1)
	mPa·s	approx. 3	DIN EN ISO 3219 (with water)
Elasticity	%	approx. 270	DIN 52 455
Swelling ratio	%	approx. 100	water storage at 20 °C
Application time	minutes	2'30" to 10'	at 20 °C
	minutes	3'45" to 32'	at 10 °C
Application temperature	°C	+ 1 to + 40	air-, substrate und material temperature

\* All technical values relate to + 20 °C and 50 % relative humidity.

## Product Characteristics for MC-Injekt 3000 HPS

Colour	white
Delivery	component A1 23.8 kg canister / 119 kg drum component A2 1.19 kg canister / 6 kg canister component B1 24.6 kg canister / 102.6 kg drum component B2 box with 4 x 0.5 kg packs
Cleaning agent	Within the pot life all tools and equipment can be cleaned with water. Partially or completely cured material can only be removed mechanically.
Storage	Can be stored in original sealed packages, protected from UV-exposure, at temperatures between + 1 °C and + 25 °C in dry conditions for at least 1 year. The same requirements are valid for transport.
Disposal	Packs must be emptied completely.

### Safety Advice

Please take notice of the safety information and advice given on the packaging labels and safety information sheets.

**Note:** The information on this data sheet is based on our experiences and correct to the best of our knowledge. It is, however, not binding. It has to be adjusted to the individual structure, application purpose and especially to local conditions. Our data refers to the accepted engineering rules, which have to be observed during application. This provided we are liable for the correctness of this data within the scope of our terms and conditions of sale-delivery-and-service. Recommendations of our employees which differ from the data contained in our information sheets are only binding if given in written form. The accepted engineering rules must be observed at all times.

Edition 09/17. Some technical changes have been made to this print medium. Older editions are invalid and may not be used anymore. If a technically revised new edition is issued, this edition becomes invalid.