



DRI-POXY INJECT 53

Low viscosity, epoxy injection resin

2-component, low viscosity, solvent-free epoxy injection resin with excellent adhesion to all types of substrates, including concrete, mortar, stone, etc. It may be used to fill and seal cracks / voids in various structures.

FEATURES/BENEFITS

- High strength
- Suitable to be used in dry and damp conditions
- No shrinkage upon curing
- High mechanical & adhesion strength
- Low viscosity & injectable with single component pumps
- Forms barrier against water infiltration

APPLICATION AREAS

- Void filling & crack sealing
- Construction joint sealing
- Bridges
- Industrial & residential buildings
- Foundation
- Floors & walls
- Water structures
- Refurbishment of concrete/mortar structures and elements

PRODUCT DATA

Packaging	15 kg set
Storage	12 months from date of production
Storage Condition	Store properly in original, unopened, and undamaged sealed packaging on pallets in dry conditions at temperatures between 5 – 35 °C. Protect from direct sunlight, rain and water.

TECHNICAL DATA

Origin	Epoxy resin
Mixed Density	Approx 1.06 kg/l at 20°C
Shrinkage	No shrinkage
Viscosity	~110 cps at 30°C
Pot Life	60 minutes at 20°C 30 minutes at 30°C
Bond Strength	On concrete: > 2.0 N/mm ² (concrete failure) at 10 days
Compressive Strength	Approx. 80 N/mm ² at 7 days

APPLICATION CONDITIONS

Mixing	A:B = 2:1 (by weight)
Yield	Approx. 0.9L resin per 1kg Dri-Poxy Inject 53
Substrate Temperature	Min. 20°C / Max. 40°C

MIXING

Add all of Part B to Part A. When mixing by parts, weigh Part A & B separately at a ratio of 2:1 by weight before mixing.

Mix parts A+B based on the mixing ratio for at least 3 minutes using an electric mixer at slow speed (max.250rpm). Avoid entraining air.

APPLICATION

Cracks in Horizontal Slabs: To fill horizontal cracks under gravity, construct a reservoir above the crack. Fill it with Dri-Poxy Inject 53 and allow to penetrate. Residual material may be ground off when fully cured. Cracks penetrating slabs into their soffit should first be sealed on the underside the previous day with a suitable epoxy mortar, such as Dri-Poxy EP 178 or Dri-Poxy UA 80.

Cracks in Vertical Structures: Dri-Poxy Inject 53 can be injected under pressure into the cracks using a single component injection pump. Injection packers are set at approx. 25cm intervals beside the crack. The crack(s) in between the injection packers are sealed with a suitable epoxy patching mortar, such as Dri-Poxy Inject 53, to prevent the injection resin from escaping during the injection process. Vertical cracks must be injected from bottom upwards. As soon as the injection resin exudes out of the next packer / injection port, the current packer should be sealed and the injection process continues from the next packer.

After the completion of injection process and Dri-Poxy Inject 53 has fully cured, the packers and sealing material between ports (packers) are removed.

CLEANING OF TOOLS

Uncured material can be cleaned from application tools using a solvent. Cured material may only be removed mechanically.

LIMITATIONS

- Cracks to be injected should be within the rate of 0.2 – 5.0 mm width.
- Dri-Poxy Inject 53 is not suitable to be used in wet injection conditions. Do not apply to surfaces with standing water or water saturated cracks.
- Dri-Poxy Inject 53 must be free from air bubbles to achieve maximum compressive strength.
- Do not thin or dilute Dri-Poxy Inject 53 with solvents as it may prevent proper cure and affects its performance and properties.
- Dri-Poxy Inject 53 is a highly reactive mixture which is exothermic. The reaction develops heat and if it is not allowed to escape, the temperature of the mixture will increase considerably. This may reduce its pot-life for quantities >1kg. Therefore, mixed resin should be injected as soon as possible & it is not recommended to prepare it in large quantities.
- The pot life decreases with increasing temperature. It may be required to pre-cool both components, e.g. using a cool box to approx. 10°C, during hot weather applications.
- Ensure that part A and part B components do not get wet or comes in contact with water before the injection process.
- The consumption varies depending on conditions and environment. It is recommended to carefully estimate the consumption before executing the work and to make sure that sufficient material is kept in reserve. When injecting load bearing cracks in reinforced concrete structures, care must be taken to eliminate the load causing the cracks, otherwise another crack in a different area of the concrete may appear.
- Injection with synthetic resin compounds requires experienced specialists & trained workers.

HEALTH & SAFETY

For information & advice on the safe handling, storage and disposal of chemical products, users shall refer to the most recent Material Safety Data Sheet containing physical, ecological, toxicological and other safety-related data.

LEGAL NOTE

The information, and, in particular, the recommendations relating to the application and end-use of these products, are given in good faith based on current knowledge and experience of the products when properly stored, handled and applied under normal conditions in accordance to the manufacturer 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. The manufacturer 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.