

Chelfix R200

Special cement based, thixotropic, polymer modified structural fine repair mortar



Product Description Chelfix R200 is a single component, special cement-based, thixotropic, polymer modified structural fine repair mortar.

Areas of Application

- Segregation repair mortar with low shrinkage properties.
- It is used in construction of all kinds of concrete after the mold is taken to repair the concrete.
- In filling air bubbles and gaps.
- Ports and marine structures.
- Concrete bridges.
- Repairing of corners and edges.
- For the repair of vertical and overhead elements.
- As a repair mortar for all structural elements in buildings, water retaining structures, prefabricated elements, industrial plants, bridges, etc.

Advantages

- Shrinkage controlled polymer modified structural plaster and repair mortar.
- Single component, easy to apply.
- Extremely low permeability to water, providing excellent protection to steel reinforcements and host concrete.
- Thixotropic properties allowing extra high build for vertical and overhead applications.
- Suitable for internal and external applications.
- Cost effective, hand applied no formwork is required.

Application Instructions

Surface Quality: The surfaces must be clean, smooth, solid, free from any antiadhesive substance such as dust, oil, dirt, rust, mold oil, detergent and waste. Weak parts on the surface should be removed. Surface Preparation: Cement slurry and weakened parts should be removed, and there should be no materials such as oil dirt and rust on the surface. Absorbent surfaces must be pre-wetted, but there should be no water accumulations. When adherence primer is required, CHELFIX AD is applied by brush and CHELFIX R200 repair mortar is applied on the surface before drying. Mixing: 4-5 it clean, clear water received from normal ambient temperature into a clean container which is free from all kinds of materials which prevent adhesion. CHELFIX R200 in 25 kg bag as powder is poured into a container filled with water. The product is mixed with a low speed mixer until a homogeneous mixture without lumps is obtained. Mixing time should be at least 5 minutes, the mortar obtained at the end of the process should be rested for 3 min. and mixed again until it becomes homogenous for 2 min. After the material has entered the reaction, it should not be mixed again with water.

Application Notes / Restrictions

- For outdoor applications, the first 3 hours of sunshine should be protected from rain and frost.
- In cement based products, reaction times are affected by ambient and ground temperatures. Reaction times are shortened in a hot environment, and extend in a cold environment.
- Remove all concrete from around exposed steel reinforcements by 10mm thickness.
- Do not add too much water as recommended.

Application Notes / Restrictions

- Do not use the material below the minimum permissible temperature to complete the setting. Low temperatures will slow down setting and high temperatures will speed up setting. The workability time will also vary depending on the temperatures.
- During the application of the product, work clothes suitable for occupational health and safety rules should be worn and appropriate glasses and masks should be used.
- The prepared area should be cleaned thoroughly by brush and /or compressed air.
- If necessary, clover is applied to ensure surface smoothness. Applications with wall thickness over 30 mm should be done in coats.
- It must be protected after application against adverse weather conditions such as direct sunlight, high air temperature (above +35°C), rain and frost. The product should be cleaned thoroughly with water and detergent before it is fully cured and hardened.
- Immediately after application, before hardened, the equipment should be cleaned with water. After the product is hardened, it should be cleaned by mechanical methods.

Technical Data

General Information	
Color	Grey
Shelf Life	12 months in unopened package in dry environment
Package	25kg kraft bag
Application Information	
Application Temperature	(+5° C) - (+35°C)
Mixture Ratio	4 - 5lt water / 25kg powder
Pot Life	Min. 30 min.
Grain Size	D _{max} : 0,007mm
Time to Put into Service	1 day
Application Thickness	min. 3mm, max. 30mm
Performance Information	
Flexural Strength (EN 12808-3)	≤ 7,0 N/mm ²
Concrete Adhesion Strength (EN 1542)	≤ 1,0 N/mm ²
Compressive Strength (EN 12808-3)	≤ 30 N/mm ²
Limited Shrinkage (EN 12617-4)	≤ 0,8 N/mm ²
Capillary Water Absorption Value (EN 13057)	≤ 0,5kg/m ² .h ^{0,5}
Temperature Resistance	(-30° C) - (+80° C)
Hazardous Substances	See the safety data sheet.
Fire Response	A1

Consumption Table

CHELFIX R200	Mixture Density (kg/lit)	1mm / 1m ² Powder Consumption (kg)	Mixture Water Amount (lit)
25 kg kraft bag	2.05	1.9	4 - 5

Curing

As Chelfix R200 is a cementitious based material, it should be cured in a similar method to concrete.

Packing

Chelfix R200 is available in 25kg bags.

Storage

Chelfix R200 has a shelf life of 12 months from date of manufacture if stored at temperature between 2°C and 50°C.

Fire

Chelfix R200 is nonflammable.
