EN

Grout Epo EB 490

Yapı Kimyasalları > Grout Harçları > Epoksi Esaslılar

Grout CB 484 Rapid is a single-component, fluid-form, non-shrink grouting mortar that eliminates shrinkage through internal expansion, provides very rapid strength gain, and is a ready-to-use, cement-based non-shrink grouting mortar.

Fields of Application

- On machinery installation plates
- In the mounting of machine tracks
- For securing anchor rods
- For filling voids and cavities
- For embedded anchoring
- For fixing foundation plates or supports
- In the gaps during prefabricated element installations

Advantages

- High load-bearing capacity
- Resistant to vibration effects
- Provides high and rapid strength
- Excellent adhesion to concrete and steel
- Resistant to chemicals and corrosion
- Waterproof
- Does not shrink or crack

1 Preparation of Substrate

The surface to be applied must be free of oil, dirt, rust, and all loose materials; if necessary, the surfaces should be cleaned with compressed air. The surface must have sufficient strength before application. It should not be applied to frozen surfaces. No additives or similar chemicals should be added to the prepared mortar.

2 Preparation of Mortar

Grout Epo EB 490 comes with its three components pre-packaged in the correct mixing ratios. Component B (hardener) is added to Component A (epoxy resin) and mixed with a mixer attachment at 400-600 rpm until a homogeneous mixture is achieved, which takes approximately 1-2 minutes. Finally, Component C (natural aggregate) is slowly added to the mixture while continuing to mix for 3-5 minutes until a uniform consistency is obtained. Do not prepare more material than needed for the working time of the mixture. The material should not be diluted in any way, nor should more filler be added than specified in the mixing ratio.

3 Application

A leak-proof formwork may be constructed around the voids as needed. To prevent the material from sticking to the formwork, polyethylene should be applied to the surfaces of the formwork. To prevent air bubbles due to the material's fluid consistency, the material should be poured slowly and continuously from a height of 15-20 cm from one side of the formwork. It is recommended that the application be continuous and that the hole diameter should be no less than 50 mm. For applications involving rod insertion, Component C (natural aggregate) can be reduced to achieve the desired fluidity and air venting. Grout Epo EB 490 is formulated to achieve thicknesses of 20-60 mm per pour.

4 Consumption Amount

For 1 mm thickness: 2 kg/m^2.
Note: Filled.

5 Points to Consider

- The product should not be applied at temperatures below +5°C or above +30°C.
- Below +5°C, the fluidity of the mortar decreases and the curing time is extended.
- For filling applications, the maximum thickness per layer should be 5 cm, with a waiting time of 4-5 hours between layers.
- The product must be mixed with a special mixer and should not be mixed by hand.

6 Packaging

Total 15 kg usage ratios are provided in ready sets (A + B) + C.
(2 kg tin can / 1 kg tin can / 12 kg tin can)

7 Storage Life

12 months when stored in unopened original packaging, in cool and dry environments, and protected from frost.

TECHNICAL DATAS

Structure of the Material	Component A: Epoxy Resin Component B: Hardener Component C: Natural Aggregate
Mixing Ratio	2 kg Component A (Epoxy Resin) 1 kg Component B (Hardener) 12 kg Component C (Natural Aggregate)
Unit volume Weight	~2,1 kg/l (20°C)
Application Surface Temperature	(+5°C) - (+30°C)
Pot Life at 20°C	30 min
Bond Strength to Concrete (according to EN 1542)	≥ 4 N/mm2
Adhesion to Steel	≥ 3 N/mm2
Compressive Strength (according to EN 12190)	≥ 80 N/mm2
Flexural Strength (according to EN 196-1)	≥ 35 N/mm2
Tensile Strength	30 Mpa
Full Cure Time at 20°C	7 Days
Service Temperature	-15 °C / + 65 °C