

Low exotherm, epoxy resin free flow grout

Uses

Suitable for use where heavy, dynamic or mobile loads are encountered. Particularly well suited to applications where long working time and/or low exotherm properties are required.

- Grouting under reciprocating or rotating equipment
- Heavy crane/transporter rails
- High speed turbines and centrifuges
- Grouting over long distances or in thick sections
- All applications under conditions of high ambient temperatures

Advantages

- Low creep characteristics under sustained loading
- Resistant to repetitive dynamic loads
- Non-shrink & hence ensures complete surface contact & bond
- High compressive, tensile and flexural strengths
- Withstands a wide range of chemicals

Specification

Supplier specification

All epoxy resin grouting where shown on the contract documents, shall be carried out using Dynextra EP30 manufactured by Fosroc and used in accordance with the manufacturer's current data sheet.

Performance specification

All epoxy resin grouting where shown on the contract documents must be carried out with a factory packed product. Hardened grout must have strengths exceeding:

Compressive strength	: 80 N/mm ² @ 7 days
Tensile strength	: 15 N/mm ² @ 7 days
Flexural strength	: 28 N/mm ² @ 7 days

Note: The storage, handling and placement of the grout must be in strict accordance with the manufacturer's instructions.

Description

Dynextra EP30 is a low exotherm material which is particularly suitable where long working time is needed; for large gaps (up to 250 mm) or for grouting at high ambient temperatures (up to 45 °C). Dynextra EP30 is a three component system consisting of base resin, liquid hardener and specially graded inert fillers.

Properties (Typical results for hardened grout @ 23°C)

Compressive strength	: 70 N/mm ² @ 3 days
(BS 6319, Part 2:1983)	: 80 N/mm ² @ 7 days
Tensile strength	: 18 N/mm ² @ 7 days
(BS 6319, Part 7:1985)	
Flexural strength	: 30 N/mm ² @ 7 days
(BS 6319, Part 3:1990)	
Density	: 2000 kg/m ³
	: 25 minutes @ 40°C
Pot life	: 45 minutes @ 30°C
	: 65 minutes @ 25°C
Chemical resistance	: Oil, grease, fats, most chemicals, mild acids & alkalis, fresh & sea water.

Note: Consult the local Fosroc Office when exposure to solvents or concentrated chemicals is anticipated.

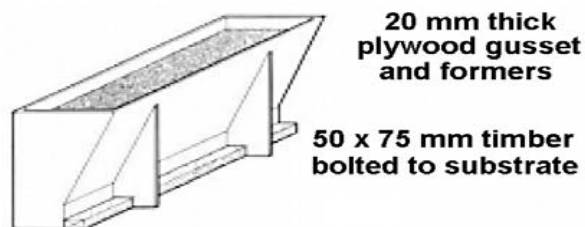
Instructions for use

Preparation

Foundation surface: All contact surfaces must be free from oil, grease, free standing water or any loosely adherent material. Concrete surfaces should be cut back to a sound base. All dust must be removed and bolt holes or fixing pockets blown clean of any dirt or debris.

Steel surfaces: All steel surfaces which will be in contact with the grout should be shot blasted free of rust and flaky mill scale. Cleaned surfaces may be protected by the application of any proprietary blast hold primer.

Formwork: Formwork should be constructed to be leakproof as Dynextra EP30 is a free flowing grout. Loss of grout once the material is placed, but not hardened, will result in incomplete filling of the gap. For free flow grout conditions it is essential to provide a hydrostatic head of grout. To achieve this, a feeding hopper system should be used.



Typical on-plate shutter system

Mixing & placing & cleaning

Pour all the contents of the hardener pack into the base container. Mix using a slow speed power mixer until homogeneous. Pour all the resultant liquid into a container with a capacity of 20 - 25 litres. Add all the filler provided and mix using a slow speed power mixer for two minutes or until a uniform colour is achieved in the grout. The mixed grout should be poured steadily from one side only to eliminate the entrapment of air. Continuous grout flow is essential. Sufficient grout must be available prior to starting. The time taken to pour a batch should be regulated to the time taken to prepare the next batch.

Flow characteristics: The maximum distance of flow is governed by the gap thickness, the head of grout applied and the ambient temperature.

All tools & equipment should be cleaned immediately after use with Fosroc Solvent 102. Spillages should be absorbed with sand or sawdust & disposed in accordance with local regulations.

Limitations (Temperature)

During application: At temperatures below 25°C the cure rate may be slow, but will go to completion provided the temperature remains above 5°C.

In service: Cured grout, which is resistant to frost and sub-zero temperatures, is most suited for ambient temperatures in the range 25° - 50°C.

Low temperature working

Whilst the performance of Dynextra EP30 at low temperatures is assured, application under such conditions can sometimes be difficult. It is therefore suggested that, for temperatures below 25°C, below guides are adopted:

- Store unmixed materials in a warm environment (preferably temperature controlled)
- Keep mixing and placing equipment warm, arranging protection if necessary. It is especially important to keep warm those surfaces of the equipment which will come into direct contact with the material itself
- Try to eliminate application in the coldest time of the day, and certainly avoid application at night
- Minimum temperature of mixed material to be 25°C, & loading shall only be allowed 72 hours after pouring.

Estimating & storage

Supply: Dynextra EP30 is supplied in 15 litre packs. All Dynextra EP30 has a shelf life of 12 months if kept in dry conditions at 23°C. If stored at high temperatures the shelf life will be reduced.

Precautions

Health and safety & fire

Dynextra EP30 contains resins which may cause sensitization by skin contact. Avoid contact with skin and eyes and inhalation of vapour. Wear suitable protective clothing, gloves and eye/face protection. Barrier creams provide additional skin protection. Should accidental skin contact occur, remove immediately with a resin removing cream, followed by soap and water.

Do not use solvent. In case of contact with eyes, rinse immediately with plenty of clean water and seek medical advice. If swallowed seek medical attention immediately - do not induce vomiting. Fosroc Solvent 102 is flammable. Keep away from sources of Ignition. No smoking. In the event of fire extinguish with CO₂ or foam. Do not use a water jet. For additional information see relevant Material Safety Data Sheet.

Flash point

Fosroc Solvent 102 : 33°C

↑ See separate data sheet

Important note

Fosroc products are guaranteed against defective materials and manufacture and are sold subject to its standard Conditions for the Supply of Goods and Service. All Fosroc datasheets are updated on a regular basis. It is the user's responsibility to obtain the latest version

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