# Fosroc®
# Conbextra® EP10

constructive solutions

## A highly fluid epoxy grout for dynamic/ repetitive load applications gap width up to 10mm

## Uses

Conbextra EP10 is a low viscocity epoxy grout for situations where heavy dynamic or mobile loads are encountered. It is ideal for grouting in small gaps between a base plate and substrate which needs filling and the structural load be uniformly distributed. Typical applications are reciprocating machinery, testing equipment, heavy crane and transporter rails, high speed turbines, centrifuges and drop forges.

Also for use in conditions where chemical spillage may be encountered. Typical situations could be met in steelworks, refineries, electroplating works and chemical plants.

Due to the low viscocity of Conbextra EP10 it can be used to fill hairline cracks in concrete slabs from 0.2mm and larger on horizontal surfaces using a gravity fed method. Using suitable equipment, Conbextra EP10 can also be used to pressure inject cracks down to 0.10mm.

Conbextra EP10 can also be used for anchoring vertical starter bars and other vertical anchoring applications such as hold down bolts. Refer to the Fosroc Epoxy Anchoring Application Guidelines available on the Fosroc website.

## Advantages

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

## Description

Conbextra EP10 is a two component low viscosity epoxy system for grouting gaps up to 10mm and crack injection.

## Properties

| | |
|---|---|
| **Colour:** | Clear / amber liquid |
| **Density:** | 1060 kg/m³ |
| **Compressive strength:** | 57 MPa @ 1 day / 20°C<br>66 MPa @ 3 days / 20°C<br>83 MPa @ 7 days / 20°C |
| **Viscosity:** | 250 - 450 cps @ 10°C<br>150 - 200 cps @ 25°C<br>50 - 100 cps @ 30°C |
| **Indirect Tensile strength:** | 15 MPa @ 7 days / 23°C (AS1012.10-2000) |
| **Modulus of Rupture (Flexural Strength):** | 30 MPa @ 7 days / 23°C (AS 1012.11-2000) |

Note: Compressive strengths stated were measured using cube samples. Test results obtained will vary if testing is carried out to an alternative standard or sample dimensions are used.

### Pot life

Ambient temperature affects the time for which bulk material will remain fluid.

**Typical values in minutes are:**

| Temp. | 10°C | 20°C | 30°C | 40°C |
|---|---|---|---|---|
| Pot Life | 40 | 20 | 10 | - |

### Exotherm

All epoxy systems will develop a temperature rise on mixing. Its extent will be a function of the volume to surface ratio, the ambient temperature, as well as the mass and thermal conductivity of the surrounding materials. Once mixed, place Conbextra EP10 immediately - do not hold in bulk or re-lid the container of mixed product.

### Chemical Resistance

Conbextra EP10 is resistant to oil, grease, fats, most chemicals, mild acids and alkalis, fresh and sea water. Consult Fosroc Technical Services when exposure to solvents or concentrated chemicals is anticipated.

## Application Instructions

The following instructions for use should be used in conjunction with the Conbextra Epoxy Grouting Applications Guide available from the Fosroc website.

### 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. For maximum bond, surfaces should be abraded or roughened, preferably by mechanical means such as needle gun, grit blasting, grinding. All dust must be removed and bolt holes or fixing pockets blown clean of any dirt or debris.

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### Steel surfaces

All steel surfaces should be shot blasted free of rust, paint and flaky mill scale.

### Formwork

The formwork should be constructed to be leakproof as Conbextra EP10 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.

Forming materials should be coated with a release agent such as grease or wax material or a plastic coating. These coatings act as a bond breaker so that a smooth grout surface is achieved after form removal and the forms are protected for reuse.

### Mixing

Pour all the contents of the hardener pack into the base container. Mix using a slow speed power mixer until homogeneous.

For all products, mix using a slow speed power mixer for two minutes or until a uniform colour is achieved in the grout.

### Placing

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.

With the smaller 300ml kit size a nozzle is provided so that when mixed can be squeezed or poured into small gaps or hairline cracks above 0.2mm.

Please refer to the Conbextra Epoxy Grouts Application Guide for further information.

### Flow characteristics

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

### Cleaning

All tools and equipment should be cleaned immediately after use with Fosroc Solvent 10. Spillages should be absorbed with sand or sawdust and disposed in accordance with local regulations.

## Limitations

### During application

Conbextra EP10 grouting may be carried out without special precautions at ambient temperatures from 5°C - 25°C.

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### In service

Conbextra EP10 is resistant to frost and sub zero temperatures. It is also suitable in service up to 45°C.

## Supply

Conbextra EP10 is supplied in 300ml, 1.5L and 15L two component packs

| | |
|---|---|
| Conbextra EP10 Base of 300ml pack: | FC523125-200ML |
| Conbextra EP10 Hardener of 300ml pack: | FC523124-100ML |
| Conbextra EP10 Base of 1.5L pack: | FC523125-1L |
| Conbextra EP10 Hardener of 1.5L pack: | FC523124-500ML |
| Conbextra EP10 Base of 15L pack: | FC523125-10L |
| Conbextra EP10 Hardener of 15L pack: | FC523124-5L |

## Storage

Conbextra EP10 has a shelf life of 3 years from date of manufacture if kept in a dry, cool store in the original, unopened packaging.

**Important notice**

A Safety Data Sheet (SDS) is available from the Fosroc website. Read the SDS and TDS carefully prior to use as application or performance data may change from time to time. In emergency, contact any Poisons Information Centre (phone 13 11 26 within Australia) or a doctor for advice.

**Product disclaimer**

This Technical Data Sheet (TDS) summarises our best knowledge of the product, including how to use and apply the product based on the information available at the time. You should read this TDS carefully and consider the information in the context of how the product will be used, including in conjunction with any other product and the type of surfaces to, and the manner in which, the product will be applied. Our responsibility for products sold is subject to our standard terms and conditions of sale. Parchem does not accept any liability either directly or indirectly for any losses suffered in connection with the use or application of the product whether or not in accordance with any advice, specification, recommendation or information given by it.

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