a.b.e.® Construction Chemicals

dura.®rep FC
Fairing Compound

SINGLE-COMPONENT, POLYMER-MODIFIED CEMENTITIOUS FAIRING COAT

DESCRIPTION

dura.®rep FC is a one-component, polymer modified cementitious blend, which only requires the addition of a minimal amount of clean water. Its unique formulation provides a fair-faced finish to concrete and masonry whether used as a fairing or to close blowholes prior to applying protective decorative coatings such as the **dura.®cote WB** range of **a.b.e.®** products (or similar).

USES

dura.®rep FC is used as a thin film coating to concrete and masonry surfaces which are not trafficked. It can be applied from feather edge to 3mm in thickness for applications such as:

- Fairing of concrete or masonry surfaces to receive protective or decorative coatings
- Ideal for use as a scraper coat and filling minor indentations
- Filing blowholes.

FEATURES & BENEFITS

dura.®rep FC is highly compatible with and bonds extremely well to concrete, masonry, and other **dura.®rep** mortars and can be over-coated with **dura.®cote** coatings.

dura.®rep FC is applied from a featheredge to a maximum thickness of 3mm. Deeper repairs need to be patched with one of the **dura.®rep** range of products such as **dura.®rep FR** prior to applying **dura.®rep FC**.

- Ready to use only requires clean water for mixing.
- Easy to apply.
- No primer or curing membrane necessary.
- Excellent bond to the concrete and masonry surfaces.
- Constant quality/performance (pre-blended).
- Contains no chlorides.
- Provides a consistently smooth finish, which enhances the appearance of protective coatings.
- Can be used on vertical and overhead applications.
- Will overcoat undulations and irregularities such as honeycombing.

TYPICAL PHYSICAL PROPERTIES	
Approx. fresh wet density	1935 kg/m^3
Approx. working time @20°C	20 minutes
Setting time @20°C	30 to 50 minutes
Coefficient of thermal expansion	9 to 12 x 10^{-6}/°C
WATER ADDITION	
Full bags only	7 – 8 litres per 25 kg

SURFACE PREPARATION

The substrate must be sound, firm, clean and free of oil, grease, loose particles, cement laitance, old layers of paint or other contaminants. In severe cases chemical or steam degreasing might be required. In addition or as part of the cleaning process ensure that the substrate is roughened to provide sufficient key for bonding. This can be achieved by light scarification or grit-blasting.

Where the effectiveness of the surface preparation is in question pull-off tests should be performed. No additional preparation prior to the application of **dura.®rep FC** onto **dura.®rep** repair mortars is necessary. When using compressed air for cleaning, the air must be clean and oil free.

BONDING/PRIMING

Priming is not required, but absorbent surfaces such as plaster or concrete must be thoroughly pre-wetted with clean water. Ensure that there is no free water on the surface prior to application.

a.b.e.® is an ISO 9001:2008 registered company
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DATE UPDATED: 18/10/12

MIXING

Forced action mixing is recommended for mixing large volumes of this type of product.

One-bag batches or smaller volumes may be mixed with a variable-speed (300-500 r/min) industrial drill with an approved spiral paddle. Very small quantities may be mixed by hand but extreme care should be taken to ensure that the product is mixed thoroughly. Small batches mix ratio can be measured by volume.

The mortar is gauged with an amount of water to match the consistency required for application. Consult the properties table for the correct water addition.

Pour the clean water into the mixer and with the mixer running, gradually add the **dura.®rep FC** to the water in the container. Mix for 3 to 5 minutes until the product is lump free, smooth and fully homogeneous.

Temperature can also influence consistency. Therefore, depending on the consistency required; the amount of water may be adjusted accordingly but should not exceed the maximum as indicated in the table.

COVERAGE

7 litres of water added to 25 kg of **dura.®rep FC** will cover approximately 16m² at 1mm thick.

APPLICATION

The mixed **dura.®rep FC** should be applied by trowel in as few applications as possible. The product can be applied a maximum of 3mm down to a feather edge. The coating must be allowed to set sufficiently before final profiling. Slight wetting can aid a smoother finish.

CURING

dura.®rep FC does not require any form of curing in moderate ambient conditions, but under strong drying conditions curing may be necessary. In this case, **dura.®rep FC** should be cured immediately after finishing in accordance with good concrete practice.

The use of **dura.®bond GP**, sprayed on to the surface of the finished **dura.®rep FC** in a continuous film is recommended. Large areas should be cured as trowelling progresses (0.5m² at a time) without waiting for completion of the entire area. In very fast drying conditions, supplementary curing with polythene sheeting taped down at the edges should be used.

In cold conditions, the finished application must be protected from freezing.

CLEANING OF EQUIPMENT

Before the mortar hardens, clean tools with water. Hardened material can only be removed by mechanical means.

PROTECTION/MAINTENANCE ON COMPLETION

Should rainfall be imminent, suitable protection must be provided until the product has cured.

For additional protection properties, **dura.®rep FC** is fully compatible with the **dura.®cote** range of protective coatings (or similar). Depending on ambient conditions the **dura.®rep** products can be over coated in 48 hours.

TEMPERATURE AND RELATIVE HUMIDITY

Surface and ambient temperature must be at least +5°C and rising, ideally between 20°C and 35°C.

At ambient temperatures above 35°C, the material should be stored in the shade and cooled water used for mixing.

MODEL SPECIFICATION

Polymer-modified fibre-reinforced cementitious fairing mortar for filling blowholes and as a thin skin fairing coat on non-trafficable surfaces.

The fairing mortar will be **dura.®rep FC**, a single-component, polymer-modified, fibre-reinforced, chloride-free compound applied in accordance with the recommendations of **a.b.e.® Construction Chemicals**.

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PACKAGING

dura.®rep FC is supplied in 25 kg polyethylene lined paper bags.

HANDLING & STORAGE

This product has a shelf life of 12 months if kept in a dry cool place in the original packaging. In more extreme conditions this period might be shortened.

HEALTH & SAFETY

Product safety information required for safe use is not included. Before handling, read product and safety data sheets and container labels for safe use, physical and health hazard information. The safety data sheet is available from your local **a.b.e.® Construction Chemicals** sales representative.

IMPORTANT NOTE

This data sheet is issued as a guide to the use of the product(s) concerned. Whilst **a.b.e.® Construction Chemicals** endeavours to ensure that any advice, recommendation, specification or information is accurate and correct, the company cannot - because **a.b.e.®** has no direct or continuous control over where and how **a.b.e.®** products are applied - accept any liability either directly or indirectly arising from the use of **a.b.e.®** products, whether or not in accordance with any advice, specification, recommendation or information given by the company.

FURTHER INFORMATION

Where other products are to be used in conjunction with this material, the relevant technical data sheets should be consulted to determine total requirements.

a.b.e.® Construction Chemicals has a wealth of technical and practical experience built up over years in the company's pursuit of excellence in building and construction technology.