ECO CRACK REPAIR

Self-levelling, flexible floor coating for critical substrates

CT-C20-F7	20 N/mm²	5 mm	4 hrs
STRENGTH CLASS · EN 13813	COMPRESSIVE STRENGTH	CRACK DEPTH & WIDTH FILLED	WALKABLE

PROPERTIES AND BENEFITS

- Eco-Binder technology
- Flexible
- Fast curing and tension-relieved
- Polymer-modified
- Also processible by machine
- Environmentally friendly
- Very low emission EMICODE EC1^{PLUS}
- High flowability
- Easy application

DESCRIPTION

Self-levelling, flexible floor coating for critical substrates.

LOADABILITY

Walkable	after 4 hours
Light load	1 day
Fully loadable	4 days

Curing at 20°C.

RANGE OF USAGE

For indoor and outdoor use, for revision of concrete and screed, and for coating cracked surfaces as an intermediate layer for further processing with EcoSilicate floors.

Applicable across wide areas at 1 mm above floor level. Cracks up to 5 mm depth and width can be filled.

SUITABLE SUBSTRATES

Concrete; cement and calcium sulfate-based screed (heated and non-heated); self-levelling compounds and floor filling compounds; asphalt screed; stone, wood- or magnesia screed; wood substrates; dry screed; ceramic coverings.

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Technical information

STRENGTH AND CLASSIFICATION

Strength class, DIN EN 13813	CT-C20-F7
Compressive strength	20 N/mm²
Flexural strength	7.5 N/mm²
Application thickness	1–10 mm
Crack depth / width	up to 5 mm

DENSITY

Bulk density	approx. 1.1 kg/dm³
Fresh mortar density	approx. 2.0 kg/dm³

MIXING AND PROCESSING

Mixing ratio	4.75–5.0 L water / 25 kg powder
Processing temperature	min. +2 °C, max. +35 °C
Processing time at 20°C	approx. 25 min
Consumption	approx. 1.8 kg/m² per mm layer

PACKAGING AND STORAGE

Packaging	25 kg bag
Storage	12 months

Store in original packaging, in a dry, moisture-free environment.

The information above is given based on our experience. Adjustment may be required in case of object-specific fluctuations.

PREPARATION OF SUBSTRATE

The surface must be stable, with sufficient surface tensile strength, dry or matt damp, clean and free from debris. Mechanical surface preparation such as shot-blasting is recommended to improve adhesion. New concrete or screed should be at least 28 days old, with adhesive strength of at least 1.5 N/mm².

The substrate must be dried for 2 hours after priming with Eco Primer, adjusting substrate absorbency and avoiding air bubbles in the subsequent coating; a 1 m² test area is recommended on critical undergrounds. Coating work on the primer must be finished within 6 hours.

Edge joints must be prepared with a suitable expansion strip, with clean adhesion to avoid material flowing beneath it. After finishing all coating works, joints must be filled with a permanently elastic compound, with transitions and closing edges protected by end rails.

ECO CRACK REPAIR

Mixing and application

CRACKED SUBSTRATES

Crack patterns with a depth and width up to 5 mm can be covered by applying the material on the primed substrate and scraping it off as a scratch coat. Deeper ruptures and cracks over 5 mm must be filled with Eco Repair. For cracked tiled floors, pre-level with Eco Crack Repair using a toothed spatula or screed rake on the unprimed substrate, at least 1 mm above the tile surface, fully covering the joint profile; loose tiles or tiles over cavities must be removed. After curing for approximately 6 hours, further coating with EcoSilicate products is possible once the surface is re-primed with Eco Primer.

OTHER SUBSTRATES

Eco Crack Repair also coats critical surfaces such as asphalt, dry screed, and wooden substrates. On wooden subfloors, loose boards must be screwed down and the subfloor's impermeability ensured; butt joints and holes are filled with a commercially available acrylic sealant before the normal Eco Primer preparation.

MIXING AND APPLICATION

Mix using a mixing machine: add 4.75–5.0 L water per 25 kg powder (reducible to 4.5 L on slopes), then pour Eco Crack Repair in while stirring. Mix intensely for 2 minutes, let set for 2 minutes, then mix again for 1 minute. Apply as a scratch coat with suitable tools; absorbent substrates must be primed as described. For cracked substrates, apply material in excess to fill cracks effectively, re-filling any area that sinks while fresh.

Protect the coating from rapid drying, frost and rain for the first 24 hours. Do not cover the finished surface with foils or other materials.

HEATED FLOOR CONSTRUCTIONS

Downregulate underfloor heating to approx. 20°C at least 3 days before application. 48 hours after application, flow temperature can be increased stepwise (5°C per day) to the desired value. This applies to Eco Crack Repair only — refer to the relevant manufacturer's instructions for subsequently laid coverings.

COVERING WITH SUBSEQUENT COATINGS

A final topcoat should always be applied. Reworking with EcoSilicate products can be carried out after 6 hours once the dried mortar is ready for covering. Stated waiting times are valid at 20°C and 1 mm layer thickness; low temperatures (especially below 10°C) and permanently high relative humidity can extend them.

TOOLS AND CLEANING

Mixing device (drill mixer or pump), trowel, spiked shoes, spiked roller, and screed rake or pin leveller. All equipment should be washed clean and dried before and after application.

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Notes, safety and declaration of performance

NOTES

Due to the natural variability of cracked surfaces, no guarantee can be given for complete crack-free curing after application. Eco Crack Repair cannot be used to fill construction or expansion joints, and no moving cracks can be filled — these gaps must be sealed afterwards with a permanently elastic sealant, or with suitable joint profiles for structural or expansion joints.

SAFETY, ECOLOGY AND ELIMINATION

There is no mandatory hazard labelling for Eco Crack Repair. Avoid inhaling dust when opening packaging. Protect skin and eyes during mixing. Refer to the Material Safety Data Sheet (MSDS), available on request, for further information on safety during transportation, storage, handling and disposal. Follow instructions on the packaging.

DECLARATION OF PERFORMANCE

CE

CE — manufacturer details and Declaration of Performance on request from NBS Distribution

NO. ECO CRACK REPAIR · EN 13813

EN 13813 CT-C20-F7

Self-levelling fine flow screed. Hardens fast and tension-relieved, at a declared layer thickness of 5–70 mm.

Fire behaviour	A2
Compressive strength	C20
Flexural strength	F7
Release of corrosive substances	CT

AVAILABLE ON REQUEST

Material Safety Data Sheet (MSDS).

The content of this technical data sheet corresponds to the latest development and our applications experience. All information is based on ideal conditions and therefore does not apply for every application purpose. Due to different materials, substrates and different actual site conditions no warranty is given for the customer's application. In particular, we assume no liability based on this information or any verbal statements. The only exception is when we can be blamed for the case of intent or gross negligence. In that case the customer has to prove that he has transmitted all required information completely and in a timely manner for a proper and promising evaluation by NBS Distribution. Any further details regarding the application of our products have to be confirmed in writing by NBS Distribution. The customer must test the product's suitability for the intended application and purpose. We reserve the right to change the product specifications due to the ongoing development. Apart from that our general terms and conditions are valid. This data sheet supersedes all earlier technical data on this product.