Product description:
BITUMIX REP-04 is a fibre-reinforced, cement-based pre-mixed dry mortar products composed of Portland cement, pozzolans, polymer, plasifying and adhesion-improving additives, and oven-dried silica sand with a controlled grain curve. BITUMIX REP-04 is a dense concrete with minimal shrinkage and optimal adhesion and workability. BITUMIX REP-04 satisfies the material requirements of environmental class E (see DS 2426) and contains no corrosion-prone components. BITUMIX REP-04 is water and weather-resistant in its cured state.

Applications:
BITUMIX REP-04 is used for repairs of horizontal, vertical and bottom-to-top surfaces typically found in concrete constructions on wells, pipes, bridges, beams, slabs and pillars. BITUMIX REP-04 is used for repairs and renovation of wells, pipes, kerbs, balconies, facades and similar places with concrete surfaces. To achieve the best results, it is important to use skilled labour with knowledge of concrete technology and casting.

Preparation:
The surface must be well-suited and washed clean of any oil, grease, cement slurry and other loose particles. Prepare the surface by chipping, sandblasting or a similar technique. Any reinforced iron must be cleaned of rust and chlorides and may be brushed with a suitable primer. The surface can be dampened to ensure the best possible adhesion.

Mixing:
Add approx. 1.5 l BITUMIX REP-04 per 10 kg and 3.6 l cold water per 25 kg dry powder, and mix thoroughly in a suitable agitator mixer for 5 min. Manual mixing can be done with a low-speed drill connected to a two-bladed mixer or by hand-mixing. First pour the water into the tub, add the dry product, and mix thoroughly until you achieve a good, workable consistency. Allow to stand 5-7 minutes and remix.

Application:
Apply and thoroughly compress the premixed repair concrete. Application may be done by hand (remember gloves) or using suitable masonry tools. Avoid 0 transitions. A float can be used for finishing. Preparation time is approx. 30 min at +20°C. Higher temperatures will shorten, and higher temperatures will lengthen both the preparation and hardening times.

Aftercare:
BITUMIX REP-04 must not be subjected to loads in the first 24 hours of curing and must be protected from excess drying as soon as possible, using plastic film or suitable curing agent.

Limitations:
BITUMIX REP-04 should not be used at temperatures under +5°C. BITUMIX REP-04 does not tolerate frost during the curing and cementation period.

Cleaning:
Clean tools with water immediately after use. Hardened BITUMIX REP-04 can only be removed mechanically.

References:
Applicable safety data sheets can be downloaded from Bitusal.dk

Product Data
Manufactured for Bitusal ApS by: Marlon Termørtel A/S Virkelyst 20, DK-8740, Brædstrup
Material type:
Cement-based repair concrete type PCC.
Environmental class:
Extra aggressive.
Technical data
Compressive strength, 28 days > 45 MPa class R4
Chloride content ≤ 0.05 %
Adhesion ≥ 2.0 MPa
Carbonatization Passed
Elasticity modulus ≥ 20 GPa
Thermal compatibility Part 1 ≥ 2.0 MPa
Capillary absorption ≤ 0.5 kg·m⁻²·h⁻⁵
Hazardous substances Compliant with section 5.4
Fire-resistance Class A1
Cement type:
Portland cement, CEM I 52.5 N (LA).
Filler material:
Oven-dried and sorted silica sand, cf. E. 0.4 mm.
Additives:
Polymer, polypropylene fibre, plasticizer and adhesion-improving additives.
Added water:
1.5 l pr. 10 kg. 3.6 l per 25 kg.
Layer thickness:
Guideline 2-50 mm.
Consumption:
Approx. 2 kg dry powder product per m²/mm layer thickness.
Packaging type:
10 kg tub. 25 kg plastic sacs.
Storage:
12 months in dry and suited conditions in unopened packaging.