

Abrasion and chemical resistant epoxy-based lining mortar

Description

Arki-Dur L is a two-component solvent-free epoxy resin based mortar formulated to provide an impermeable, chemically resistant protective lining for concrete, brick work steel etc. with excellent adhesion and resistance to mechanical damage.

Uses

Arki-Dur L can be used for lining of bricks or tiles in reaction tanks, floor, channels and towers etc., where more adhesion and high chemical resistance are required.

Due to its good resistance to bleach liquor it is also recommended for pulp & paper industries. It is also preferred in beverages plant, food and pharmaceutical industries.

Advantages

- Excellent abrasion resistance.
- Excellent resistance to a wide range of industrial chemicals.
- High resistance to low and high pH's.
- For both vertical and horizontal applications.
- Impervious finish; provides easily cleaned surface.
- Excellent resistance to mechanical damage.

Product properties*

Type:	Solvent free epoxy-based mortar
Mixing ratio:	Part 'A' : Part 'B' = 1:1 by weight or volume
Solid content:	100%
Specific Gravity:	1.95
Application thickness:	1 - 8 mm
Compressive strength (ASTM C579):	85 MPa
Flexural strength (ASTM C580):	35 MPa
Tensile strength (ASTM C307):	18 MPa

Pot life:	35 minutes @23°C 20 minutes @35°C
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Initial setting:	16 hours @23°C 12 hours @35°C
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Colour:	Grey
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Full cure:	7 days @23°C 5 days @35°C
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Chemical resistance:

Petrol, Detergents, Bleach, Kerosene, Brake fluid, Skydrol, Diesel, White spirit, oils, Hydrochloric acid 35%, Nitric acid 25%, Phosphoric acid 50%, Sulphuric acid 20%, Citric acid 80%, Lactic acid 20%, acetic acid 25%, Sodium hydroxide 50%, Saturated sodium chloride solution, Ammonia 35%.

Abrasion resistance

(ASTM D4060):	CS22 wheel, 1000 cycles, 1kg, 140 mg lost
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Bond strength

(ASTM D4541):	concrete failure
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Shore 'D' hardness:	~78
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* Values are valid at ambient temperature of 23°C and at 55% relative humidity.

Directions for use

Substrate preparation

All surfaces to receive Arki-Dur L must be structurally sound, dry, clean, roughened and free of surface contaminants. Proper surface preparation is an extremely important factor in the immediate and long-term successful performance of applied Arki-Dur L.

New concrete must be at least 4 weeks old and have a moisture content of not more than 5%.

Steel substrates should be grit blasted to surface quality of SA 2½ in accordance to BS 7079 and ISO 8501.

Mixing and Application

Check that the surface preparation is complete. Mix Arki-Dur L by pouring the entire content of the hardener container (Part B) into the base container (Part A) and mix thoroughly for about 3 minutes until the mortar thoroughly mixed. Place mixed material in area in which material is

to be used within the pot life of the mix.

Note: Epoxy materials will appear to be cured and dry-to-touch prior to full chemical cross-linking. Allow epoxy to cure 6-7 days prior to exposure to water or other chemicals for best performance.

Packaging

1.0, 4.0 Litre pack

Coverage

4.0 L pack of Arki-Dur L cover 2 m² at 2 mm thickness. This is an approximate spread rate given for estimating purposes only.

Cleaning

Clean up mixing and application equipment immediately after use with Arki-Solv 1.

Storage and shelf life

Arki-Dur L components have a shelf life of 12 months when stored in a dry place and good warehouse conditions in unopened, undamaged original packaging. If stored at high temperatures and/or high humidity conditions, the shelf life may be reduced.

Safety precautions

The three components of Arki-Dur L are non-flammable materials.

Spillages of component A and B should be absorbed onto earth, sand or other inert material and transferred to a suitable vessel. Disposal of such spillages or empty packaging should be in accordance with local regulations.

Arki-Dur L should not come in contact with skin or eyes. Avoid prolonged inhalation of vapours. Some people are sensitive to epoxy resins, hardeners

and solvents. Gloves, goggles and barrier cream should therefore be used. Ensure adequate ventilation and if working in enclosed areas, suitable breathing apparatus is recommended. If mixed material comes in contact with skin, it must be removed before it hardens with a resin removing cream or with soap and water. Do not use solvent. Contamination of skin with any of the Arki-Dur L components should be removed immediately with soap and water.

Should accidental eye contamination occur with any of the above products, wash well with plenty of clean water and seek medical advice. If swallowed, seek medical attention immediately. Do not induce vomiting.

Additional Arki products

Arki produces high quality products intended for use in construction activity, among these products:

- Admixtures for concrete and mortar.
- Surface treatments and primers.
- Engineering grouts.
- Concrete repair and restoration systems.
- Industrial flooring systems.
- Protective coatings and linings.
- Waterproofing materials.
- Adhesives and tiling systems.
- Construction sealants and joint fillers.

Product Quality

All Arki products are manufactured under quality management system independently certified to conform to the requirements of the international standards.



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Users should always refer to the most recent issue of the product technical data-sheet for the product concerned, copies of which will be supplied on request.
Arki products are guaranteed against defective materials and manufacture and are sold subject to Arki standard terms and conditions of sales.
Because the storage, handling and application of these products are beyond our control, we can accept no liability for the results obtained.