

ARDEX AR 300

Multimortar

Multipurpose product for ramping, patching, rendering, repairing, filling, levelling

Installing building blocks, block work and aerated concrete blocks (AAC)

Internal and external walls and floors

For wall and floor tiling

Easy workability, easy to use

Water and weather resistant

For a thickness of 2 - 30mm

Walk on and tile over in 2 hours

Can be applied as texture, sponge or float finish



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ARDEX AR 300

Multimortar

DESCRIPTION

ARDEX AR 300 is a multi-mortar which offers a range of applications in internal and external situations.

- Levelling, filling and ramping floors in layers with a thickness of 2 30 mm, before installing tiles and paving.
- Patching, rendering and shaping walls in layers with a thickness of 2 30mm, before installing tiles.
- Filling holes, hollows, grooves and damage due to chipping.
- Installing aerated concrete blocks (AAC), common cement blocks/block work.
- Laying wall and floor tiles in internal and external applications.
- Can be used in conjunction with ARDEX and ABA liquid waterproofing membranes.

SUBSTRATES

Concrete (including early age concrete)

Early age concrete must be a minimum of 7 days old and no less than 20 MPa. Prior to tiling, remove any concrete sealers or curing compounds from the surface, e.g. resin, wax sealers or PVA sealers. Steel trowel finished concrete should be roughened mechanically to remove laitance and provide a good key for tiling. The surface should be true and level and pitched to drains where required. Smooth surfaces and/or dense concrete greater than 35 MPa must be mechanically roughened prior to tiling.

Renders and screeds

Cured for a minimum of 7 days. Wet render should be allowed to dry thoroughly or sealed with one coat of ARDEX WPM 300 at a coverage rate of $3.0m^2$ per litre and allowed to cure overnight.

Blockwork/brickwork

Including aerated concrete blocks (AAC)

SUBSTRATE PREPARATION

The substrate may be dry or damp, but must provide adequate grip and be firm, free of separating agents and stable. Surfaces that are not sufficiently firm, as well as loose render, old wallpaper, paint etc. must be removed. If necessary, smooth concrete surfaces should be mechanically roughened.

MIXING

ARDEX AR 300 powder is added to clean water in a clean container whilst stirring vigorously and mixed thoroughly to give a lump free easily worked mortar of a thick creamy consistency. Allow to stand for 1 minute. Restir the mixture thoroughly and the mortar is ready for use. A 25kg bag of ARDEX AR 300 requires approximately 6.0 – 6.5 litres of water. Do not add additional water.

The consistency of the mortar can be adjusted to suit site conditions and size, weight and type of tiles to be fixed. Do not apply at temperatures below 5° C. The pot life of the mixed mortar is approximately 45 minutes at 23°C and 50% relative humidity.

APPLICATION

To improve the adhesion of ARDEX AR 300, a thin layer of the mortar should first be applied to the substrate and scraped back with a trowel. The mortar can then be applied to the required thickness.

Ramping

Work the mortar into the prepared substrates with a trowel. If floor coverings are to be installed, ARDEX AR 300 must be left for 24 hours. Note: Exterior installations must be protected from direct sunlight and draughts which could lead to accelerated drying of the surface. ARDEX AR 300 sets by hydration and is dry enough after approximately 60 minutes for reworking, such as floating or sponging. After approximately 2 hours the mortar is hard enough for tiles to be installed.

Patching/Repairing

Apply the mortar with a trowel to holes, cracks and damaged areas, ensuring that the mortar "wets" the surface by trowelling in firmly, leaving the repair proud. After about 15 minutes trim off excess and finish off with a wet trowel, sponge or sponge float to obtain a smooth surface. ARDEX AR 300 sets by hydration and is dry enough after approximately 60 minutes for reworking, such as floating or sponging. After approximately 2 hours the mortar is hard enough for tiles to be installed.

Rendering

Apply the mixed mortar with a trowel to the required thickness up to 30mm. The material may be finished with a wet trowel after 15 - 20 minutes to provide a suitable finish. ARDEX AR 300 sets by hydration and is dry enough after approximately 60 minutes for reworking, such as floating, sponging or texturing. After approximately 2 hours the mortar is hard enough for tiles to be installed.

Installing Aerated Concrete Blocks (AAC)

If dry and porous, dampen the blocks by brushing or sponging the surface or applying a light mist spray of water to prevent rapid drying of the mortar. Apply ARDEX AR 300 mortar to the horizontal and vertical joints using a suitable notched trowel to achieve a thickness of approximately 2 mm. Blocks should be positioned and adjusted within approximately 10 minutes. The rapid hardening of ARDEX AR 300 allows further work to continue quickly, including smoothing surfaces or laying tiles.

Installing Building Blocks/Blockwork (Common cement blocks)

The mortar can be applied to the entire rear surface of the slabs (if their surface is even) or in points or strips (if their surface is uneven). The building blocks are then placed in position within the adhesive time of 10 - 15 minutes and tapped into place (follow recommendations of building slab manufacturer).

Tiling

Before fixing ensure the substrate has been prepared and the tiles are free from dust. Tiles should be fixed in accordance with AS 3958. Substrate surface, type and size of the tiles will determine the selection of the trowel. As a general guide use a $6 \times 6 \times 6$ mm notched trowel for walls and $10 \times 10 \times 10$ mm notched trowel for floor tiling.

The tiles must be pressed firmly into the freshly combed mortar bed to ensure good contact with the mortar. Slide the tile at right angles to the notch pattern to ensure 100% coverage on the back of the tile. Tiles with ribbed or keved back profiles should also be buttered to ensure complete coverage. Lift a tile from time to time to check that there are no voids beneath the tile. Do not spot fix. Any surplus adhesive must be removed from the surface of the tile and joints, before the adhesive sets. ARDEX AR 300 has an open time of approximately 15 minutes and an adjustment time of approximately 10 minutes. Please be aware of site conditions when considering these times and only spread enough adhesive so that the tiles can be fixed while the mortar is still wet. All tools should be cleaned with water immediately after use.

Wet-on-wet Tile Application

When ARDEX AR 300 has been used for any substrate preparation purpose (e.g. ramping), tiles can be laid into the freshly applied ARDEX AR 300 mortar. Using ARDEX AR 300 as the tile adhesive, gently spread the mix with an appropriately sized notch trowel and back butter the tile with a thin layer of mortar.

MOVEMENT JOINTS

Movement joints must be in accordance with Australian Standard AS 3958.

GROUTING

Grouting can proceed once the tile bed has hardened sufficiently so that tiles will not be dislodged. Light foot traffic may be allowed after approximately 2 hours and full traffic after approximately 24 hours at 23°C and 50% relative humidity. Allow longer for dense tiles/ substrates, humid climates and low temperatures. The tile joints should be grouted with the appropriate ARDEX grout. When grouting over early age concrete, mix the grout with ARDEX Grout Booster as per grout packaging instructions.

COVERAGE

General Usage

Approximately 1.2 kg powder per m² and mm of layer.

As a Tile Adhesive

25kg of ARDEX AR 300 is sufficient for approximately $10m^2$ on walls, using a 6 x 6 x 6mm notched trowel and $8m^2$ on floors using a $10 \times 10 \times 10mm$ notched trowel. The coverage will vary depending on substrate condition, tile type and application technique.

PACKAGING

ARDEX AR 300 is packed in polylined paper sacks – net weight 25kg.

SHELF LIFE

ARDEX AR 300 has a shelf life of 12 months when stored in the original unopened packaging, in a dry place at 23°C and 50% relative humidity.

PLEASE PAY ATTENTION TO THE FOLLOWING

Levelling layers must not be allowed to dry too quickly. Tiles can be installed after approximately 2 hours.

ARDEX AR 300 is not suitable for non-porous tiles larger than 400 x 400mm (<0.5% moisture absorption), such as fully vitrified porcelains in high traffic/commercial areas.

For setting of moisture sensitive natural stones, please refer to products in the ARDEX Natural Stone System.

In permanently immersed situations such as swimming pools, do not use ARDEX AR 300 as a tile adhesive.

SAFETY PRECAUTION

This product is considered non hazardous in normal usage. The presence of cement in the product gives an alkaline mortar which may cause some irritation if prolonged contact with skin takes place. Avoid contact with skin and eyes; in case of contact with the eyes, rinse immediately with plenty of water and seek medical advice; wear suitable gloves and eye protection and keep the product out of the reach of children. Avoid generation of airborne dust during mixing. If swallowed do not induce vomiting, give a glass of water and contact a doctor.

TECHNICAL DATA Colour:	Grey
Bulk density:	approx. 1.3 kg/l
Fresh mortar density:	approx. 1.5 kg/l
Coverage: For General Use:	approx 1.2 kg powder per m^2 and mm of layer
As Tile Adhesive:	approx. 2.5 kg/m ² powder using 6x6x6mm notch trowel
	approx. 3.1 kg/m ² powder using 10x10x10 notch trowel
Working time (+20°C):	approx. 45 - 60 minutes
Laying time (+20°C):	approx. 20 minutes (based on fresh mortar)
Adjustment time (+20°C):	approx. 10 minutes
Walkability (+20°C):	after approx. 2 hours
Laying tiles (+20°C) according to AS 4992:	after approx. 2 hours
Grouting time (+20°C):	after 24 hours
Compressive strength:	after 1 day: approx. 3 Mpa after 7 days: approx. 12 Mpa after 28 days: approx. 15 Mpa
Bending tensile strength:	after 1 day: approx. 1 Mpa after 7 days: approx. 2 Mpa after 28 days: approx. 4 Mpa

Suitable for floor heating: Yes

DISCLAIMER

The technical details, recommendations and other information contained in this data sheet are given in good faith and represent the best of our knowledge and experience at the time of printing. It is your responsibility to ensure that our products are used and handled correctly and in accordance with any applicable Australian Standard, our instructions and recommendations and only for the uses they are intended. We also reserve the right to update information without prior notice to you to reflect our ongoing research and development program. Country specific recommendations, depending on local standards, codes of practice, building regulations or industry guidelines, may effect specific installation recommendations. The supply of our products and services is also subject to certain terms, warranties and exclusions, which may have already been disclosed to you in prior dealings or are otherwise available to you on request. You should make yourself familiar with them.

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