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PRODUCT DATA SHEET

ARDEX A 55

Ultra Rapid Drying Self-Levelling Compound

Features

Ideal for rapid smoothing, patch repairs and renovations

Ready to receive floorcoverings in as little as 1 1/2 hours

Strong bond - priming rarely required

Free flowing

Apply from a feather edge to 10mm in a single application

Ideal for floors with underfloor heating

Ideal for use with ARDEX floorcovering adhesives

RAPIDRY FORMULA

What is the Rapidry Formula?

It is the ability of the mortar to totally bind the water used for mixing.

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ARDEX A 55

Ultra Rapid Drying Self-Levelling Compound

DESCRIPTION
ARDEX A 55 is an advanced sub-floor smoothing and patching compound with rapid hardening and rapid drying properties and is specifically designed for areas where speed is essential for rapid renovation and repair work prior to receiving floor finishes. Used in conjunction with either ARDEX P 82 or ARDEX P 51 primers for specific sub-floors, ARDEX A 55 can be applied to existing hard bases e.g. terrazzo, screeds, concrete, ceramic tiles, primed anhydrite screeds, etc.

ARDEX A 55 is a grey powder with special cements and dispersible synthetic materials. When mixed with water, an exceptionally fluid, flexible self-levelling mortar is produced which can be applied from a feather edge up to the required thickness in a single operation. For thicknesses greater than 10mm it is preferable, as well as advantageous, to incorporate an aggregate in the mixed material.

ARDEX A 55 can normally be walked on after approximately 1 1/2 hours at 20°C. ARDEX A 55 dries and hardens rapidly by hydration, binding in the water so that, providing the ARDEX A 55 layer has hardened sufficiently and the adhesive trowel does not damage the mortar surface, the floorcovering may be installed, even if the surface appears to be damp, typically after 1 1/2 hours at 20°C.

USE
ARDEX A 55 will level and smooth in a single application within the 15 minutes working time. Applications include rapid repairs and smoothing tamped, uneven, damaged or rained-on in-situ concrete, sub-floors, adjusting tolerances or camber problems between floors, slabs or pre-cast concrete, as well as smoothing old sub-floors and screeds in renovation projects prior to receiving resilient floorcoverings such as vinyl and carpet. ARDEX A 55 is not designed to be a wearing surface.

ARDEX A 55 is especially useful where the installation time of floor finishes must be kept to a minimum. Specific applications e.g. for resin, smooth and dense non-absorbent surfaces and anhydrite screeds will require priming.

SUBSTRATE PREPARATION

NOTE: Not suitable for asphalt sub-floors. For internal use only. Direct to ground sub-floors must be protected from rising damp.

The surface to be smoothed must be hard, sound and free of dust, dirt and other barrier materials, such as paint, lime coatings, plaster and excessive adhesive residues etc. Use ARDEX DGR to remove polish, wax, grease, oil and similar contaminating substances. Use appropriate mechanical preparation techniques for other barriers to adhesion, including surface laitance which should be removed from concrete surfaces. Direct to earth sub-floors must have an effective damp proof membrane, such as ARDEX DPM. Contact our Technical Services Department for further information.

High performance, high strength smoothing compounds such as ARDEX A 55 require a hard, sound, correctly prepared sub-floor. Adhesive residues vary considerably in their ability to support and restrain applied smoothing compounds so do not apply ARDEX A 55 over any more than traces of old adhesive residues. Any traces of adhesive that remain after surface preparation must be checked to ensure that they are not water softenable, soft or tacky and that they have sufficient cohesive strength to provide long term restraint for the applied smoothing compound, floorcovering and intended use. If in doubt, remove the old adhesive residues.

In many cases priming will not be necessary e.g. on thoroughly prepared screeds and concrete bases. However, for specific applications see below.

ARDEX P 82 primer is recommended for use on smooth, non absorbent sub-floors e.g. epoxy resin coatings.

ARDEX P 51 primer is recommended for anhydrite screeds and very porous surfaces to prevent air bubbles rising from the base and reducing the flow properties of the compound. See the Priming and Preparation leaflet for appropriate dilution ratios.

MIXING
To the required amount of clean water in a clean mixing container add the powder whilst stirring vigorously until a lump-free mortar is produced. The mixing proportions are approximately: -
6 to 6 1/4 litres per 22kg bag.
3 1/4 parts of ARDEX A 55 powder into 1 part by volume of clean water.
Use the minimum amount of water for thick applications or in cold conditions.

The use of an ARDEX mixing paddle with a 10mm chuck, slow speed electric drill (600 – 1000 rpm) makes light work of mixing. ARDEX A 55 should be applied within 15 minutes after mixing at 20°C. This time is extended at lower and reduced at higher temperatures.

APPLICATION
Pour the mixed ARDEX A 55 onto the prepared sub-floor. The mixed mortar will flow out to provide a flat surface during the 15 minutes working time. A steel finishing float is recommended to produce the required finish, or alternatively a long-handled ARDEX smoothing trowel can be used for finishing off. See the ARDEX Tool Catalogue for details. Apply at temperatures above 5°C.

THICKNESS
ARDEX A 55 can be applied from a feather edge up to 10mm neat; its optimum flow properties are found in applications of 2mm or above. When applying ARDEX A 55 at thicknesses over 10mm, incorporate up to an equal volume of 3mm single sized chippings e.g. ARDEX AGGREGATE. Mix the ARDEX A 55 as above and add the aggregate without further addition of water.

NOTE: Non-absorbent sub-floors must be levelled with at least 1.5mm of ARDEX A 55. Flooring grade asphalt must be levelled with at least 3mm of ARDITEX or ARDEX K 15, incorporating ARDEX E 25 admix as appropriate, but not exceeding 6mm in thickness.

COVERAGE
Approximately 1.5kg of powder per square metre per millimetre of thickness, i.e. one bag will cover approximately 9.8m² at 1.5mm thick.

PACKAGING
ARDEX A 55 is packed in paper sacks incorporating a polyethylene liner – net weight 22kg.

STORAGE AND SHELF LIFE
ARDEX A 55 must be stored in unopened packaging, clear of the ground in cool dry conditions and be protected from excessive draught. If stored correctly, as detailed above, the shelf life of this product is 6 months from the date shown on the packaging.

PRECAUTIONS
ARDEX A 55 is considered non-hazardous in normal usage. The presence of cement in the product gives an alkaline mortar which may cause some local irritation if prolonged contact with the skin takes place. Care should be taken to avoid inhalation or ingestion and prevent contact with the eyes.
For further information, consult the relevant health and safety data sheet.

TECHNICAL DATA

Bulk density of powder:	approx. 1.2kg/litre
Weight of fresh mortar	approx. 1.9kg/litre
Working time (20°C):	approx. 1/4 hour
Walkability (20°C):	approx. 1 1/2 hours
Ready to receive floorcoverings (20°C):	approx. 1 1/2 hours

Compressive strength:

after 1 day:	approx. 20 N/mm²
after 7 days:	approx. 30 N/mm²
after 28 days:	approx. 35 N/mm²

Tensile bending strength:

after 1 day:	approx. 6 N/mm²
after 7 days:	approx. 8 N/mm²
after 28 days:	approx. 10 N/mm²

Ball pressure hardness:

after 1 day:	approx. 40 N/mm²
after 7 days:	approx. 50 N/mm²
after 28 days:	approx. 60 N/mm²

Resistant to chair castors: Yes

Suitable for underfloor heating: Yes