

Rasotech Plus 1-10 mm

RESIDENTIAL HIGH ADHESION MINERAL SMOOTH PLASTER FINISH, FIBRE-REINFORCED, VERY LOW ABSORPTION, GUARANTEED FOR THE CORRECTION AND SMOOTHING OF ABSORBENT AND NON-ABSORBENT SURFACES. IDEAL FOR RESTORATION WORK ON DEGRADED FACADES, EVEN IF DECORATED WITH COLOURED COATINGS. FOR THICKNESSES FROM 1 TO 10 mm. FOR INDOORS AND OUTDOORS.









TECHNICAL DATA SHEET - REV. 01/2024

DESCRIPTION

RASOTECH PLUS 1-10 mm is a highly workable, fibre-reinforced cement-based skimming plaster with excellent adhesion to the substrate, consisting of high-strength hydraulic binders, siliceous and calcareous aggregates and special additives. Mixed with water, it turns into a mortar of excellent workability for both vertical and horizontal applications. It has high adhesion characteristics on stable cementitious substrates, good adhesion also on plastic coatings provided they are well anchored, excellent compressive strength, high abrasion resistance. The hydrophobic treatment guarantees excellent resistance to weathering. It can be used for thicknesses from 1 mm up to a maximum of 10 mm without showing any shrinkage during curing.

Complies with European Standard EN 998-1 for general purpose mortars for internal/external renders (GP) · Compressive strength class IV (CS IV) · Capillary water absorption W 2.

FIELDS OF APPLICATION

RASOTECH PLUS 1-10 mm is used for levelling or smoothing cement-based plaster, for rectifying irregular external surfaces even decorated with synthetic coatings provided they are well anchored and resistant, for reconstructing edges and mouldings, for repairing surfaces covered with ceramic or glass mosaics, for smoothing prefabricated or cast-in-place concrete, for levelling surfaces made of cellular concrete blocks, for smoothing fibre cement or wood-cement panels. It can be used for restoring or preparing a non-planar substrate before laying a ceramic, parquet, resilient coating on the wall or floor or before laying decorative finishes.

SUBSTRATE PREPARATION

New substrates must be stable, non-deformable and have already undergone hygrometric shrinkage. The surfaces of smooth, compact and poorly absorbent substrates, such as old ceramic floor or wall coverings, cement tiles, polished cement screeds, must be mechanically roughened or treated beforehand, after specific cleaning, with GRIPEX water-based adhesion promoter. On the surfaces to be restored, carefully remove the degraded or detached substrate by mechanical action until the substrate is solid and consistent. Clean the surface of any residues of dust, lime, cement or anything else that might impair adhesion. Old paints, plasters, coloured finishes, adhesives, must be removed as much as possible. Particularly absorbent porous substrates must be treated with PRIMER A 16 water-based insulating primer to regulate absorption and promote adhesion. Porous and crumbling substrates with low consistency must be treated with a water-based mineral impregnating consolidating agent RASOTECH PRIMER CONSOLIDANTE for plasters or EKOMAS for screeds. In the case of restoring surfaces with little consistency, with diffuse cracks or with differing



thicknesses required to restore the necessary flatness, the interposition of ARMOFLEX 130 glass fibre reinforcement mesh is always recommended.

APPLICATION

Pour 6 litres of clean water per 25 kg bag of RASOTECH PLUS 1-10 mm into a container and mix until a homogeneous, lump-free mixture with a trowel-workable consistency is obtained. Allow to rest and stir briefly. Depending on the type of application, the mixing water can be adjusted to optimise the application. The mortar remains workable for at least 60 minutes. The applicable thickness is at least 1 mm up to a maximum of 10 mm. The application can be done manually with a trowel or spatula for grouting, sealing, squaring and repairing edges. As it is characterised by a high thixotropy, it does not require formwork and can be applied in one or more passes until the desired thicknesses are achieved. For interventions on large, thick surfaces, the insertion of anti-alkaline fibre reinforcement, ARMOFLEX 330, is recommended in order to make the response to any stresses between the substrate and the mortar used for restoration homogeneous. To ensure perfect adhesion, apply good pressure and rework the product with a trowel or smooth trowel to adjust the water absorption until perfect contact with the substrate is guaranteed, including the incorporation of any reinforcement. If a second coat needs to be applied, do so before the previous one has completed curing, but do not exceed 2-3 hours. If necessary, level using an aluminium straight edge. When setting starts, finish with sponge trowel, metal trowel or plastic trowel depending on the degree of finish required.

In the case of laying ceramic tiles, prepare a sufficiently flat surface, even if not finished, to ensure the anchorage of adhesives.

YIELD

1.5 kg/m² per mm of thickness.

RECOMMENDATIONS

- Do not apply on substrates subject to rising damp or on extremely flexible substrates.
- ♦ Do not apply on plaster or similar substrates, wood, metal, etc.
- For applications on old paint or plastic coatings, wash thoroughly beforehand and check for perfect adhesion to the substrate.
- Wash all the equipment used for preparation and application of the product with water before it hardens. After setting, the mortar can only be removed mechanically.

PACKAGING

RASOTECH PLUS 1-10 mm is available in 25 kg polyethylene coated paper bags on 1500 kg pallets. Store the product in a dry place and in its original packaging, well closed. In these conditions, its stability lasts at least 12 months.

SAFETY INSTRUCTIONS

The product contains cement that, in contact with body perspiration, produces an irritant alkaline and sensitizing reaction for the skin. Use suitable clothing, gloves and protective glasses.

Refer to the respective Safety Data Sheet for more information about how to use the product safely.

SPECIFICATIONS

Grinding and smoothing of absorbent and non-absorbent surfaces and restoration of degraded façades, even if decorated with coloured coatings, with a mineral skimming plaster with a high adhesion, fibre-reinforced, very low absorption, classified as general-purpose mortar for internal/external plasters (GP) class CS IV W2 by Standard EN 998-1, such as **RASOTECH PLUS 1-10 mm** by Colmef Srl.



TECHNICAL DATA

Compliant with Standard:	EN 998-1	
Class:	GP-CS IV W2	
Appearance:	powder	
Colour:	White	
Apparent specific weight (kg/m³):	1400	
Volume mass EN 1015-10 (kg/m³):	1675	
Mixing ratio:	~ 6 litres of water per 25 kg of powder	
pH value:	≥ 12	
Maximum grain size (mm):	0.6	
Mixture spread (%):	100	
Mixture pot life:	1 h	
Setting time between coats:	max 2 h	
Waiting time for laying ceramic material:	24-48 h depending on thickness	
Waiting time for the laying of parquet and resilient flooring:	28 days	
Moisture resistance:	excellent	
Resistant to ageing:	excellent	
Compatibility with adhesives:	excellent	
Acid resistance:	poor	
Allowed application temperature:	from +5 °C to +35 °C	

FINAL PERFORMANCE according to EN 998-1 Class GP-CS IV W2

	Requirements	Results	Test method
Compressive strength at 28 days (N/mm²):	CS I (0.4 to 2.5) CS II (1.5 to 5.0) CS III (3.5 to 7.5) CS IV (≥ 6)	≥ 28.9 (Cl. CS IV)	EN 1015-11
Flexural strength (N/mm²):	-	8.0	EN 1015-11
Adhesion to the substrate (N/mm²):	declared value and failure mode	≥ 0.5 (FP) A	EN 1015-12
Capillary water absorption (kg/m²min ^{0.5}):	W_{c} 0 (not specified) W_{c} 1 (c \leq 0.40) W_{c} 2 (c \leq 0.20)	W _C 2	EN 1015-18
Water vapour permeability coefficient (μ):	-	< 50.9	EN 1015-19
Thermal conductivity (W/mK):	-	$\lambda_{(10,dry)}=0,70$	EN 1745

DATA DETECTION AT +23°C - 50% R.H. AND IN ABSENCE OF VENTILATION

The information in this bulletin is based on our best experience. We cannot be held liable for any product misuse. We therefore recommend anyone who intends to use this product to assess whether it is suitable for the intended application and to perform preliminary tests in any case. Always refer to the latest updated version of the technical data sheet available at www.colmef.com.

FOR MORE INFORMATION OR PARTICULAR USES, CONTACT THE COLMEF TECHNICAL SUPPORT DEPARTMENT.