IZONIL LIGHT

Industrially dry-mixed 100% waterproof breathable plastering mortar with dehumidifying ability based on Portland cement, silica sand, unique natural admixture (Izocomponent) and reinforced with fibers for application on above-ground external / internal clay brick wall, concrete brick wall and concrete hollow block wall used as replacement for general purpose plastering mortar and diffusion-closed waterproof membranes and coatings.

DESCRIPTION

100% waterproof plastering mortar (resistant against heavy rain / monsoon rain with water penetration less than 1 mm) and dehumidifying plastering mortar (with high volume of micropores which allows permanent dehumidifying process of wet substrate). Provides long-term solution to a problem of water penetration to the wall and simultaneously provides long-term solution of ventilation and drying of wet walls. It does not contain any harmful or toxic ingredients.

ADVANTAGES

⊙ World-unique plastering mortar - simultaneously 100% waterproof, breathable and dehumidifying
⊙ Resistant against penetration of water from heavy rain / monsoon rain
⊙ Highly breathable (water vapor diffusion coefficient < 15)
⊙ Dehumidifying ability - constantly dries out moisture from inside the wall and allows it to evaporate outside
⊙ Excellent adhesion to the substrate with minimum waste during application
⊙ Resistant against salt crystallization and sulphur-resistant
⊙ Applicable on damp surface
⊙ Applicable manually or by plastering machine
⊙ Paintable with any type of masonry paint
⊙ Non-toxic

USAGE

Applicable on vertical surface - above ground only (clay brick wall, concrete brick wall, concrete hollow block wall) both for renovation of existing / historical buildings and new buildings:

⊙ External clay brick wall / precast concrete brick wall / concrete hollow block wall
⊙ Internal clay brick wall / precast concrete brick wall / concrete hollow block wall

TECHNICAL DATA

Appearance / color	Powder / grey
Chemical composition	Silica sand, Portland cement, natural admixture Izocomponent, PP fibers
Size of silica sand particles	0 - 0.6 mm
Packaging	25 kg plastic bag
Shelf life	Minimum 18 months
Water / powder ratio	3.7 - 4.0 liters of clean water / 25 kg of dry plaster
Pot life / workability	Minimum 3 hours (at temperature 20 °C)
Thickness of layer	10 mm - 20 mm

Coverage / consumption	At thickness 10 mm	1 m^2 = 12.5 kg of dry plaster 25 kg of dry plaster = 2 m^2
	At thickness 20 mm	1 m^2 = 25 kg dry plaster 25 kg dry plaster = 1 m^2
Depth of water penetration	< 1 mm (exposed to heavy rain / monsoon rain)	
Workable life of fresh mortar	≥ 180 minutes	
Bulk density of hardened mortar	1600 kg/m^3 ± 100 kg/m^3	
Compressive strength	6 - 8 N.mm^{-2}	
Flexural strength after 28 days	≥ 1.6 N.mm^{-2}	
Adhesive strength	≥ 0.3 N.mm^{-2}	
Water vapor permeability coefficient (μ)	≤ 12	

SURFACE PREPARATION

IZONIL LIGHT is designed to be applied on above-ground vertical substrates (clay brick walls, concrete brick walls, concrete hollow block walls).

Surface must be solid and without impurities, loose particles and contaminants such as oil, dust, grease, alcohol, etc. The substrate must be thoroughly moistened immediately before applying IZONIL LIGHT.

MIXING

It is advisable to use a gravity mixer (concrete mixer) or hand-held electric mixer to mix IZONIL LIGHT.

Water is always added first, 4.0 - 4.7 liters of water per 25 kg of IZONIL LIGHT. Nothing else is added into mixed composition.

Gravity mixer (concrete mixer): Add the prescribed amount of water into the mixer first, followed by IZONIL LIGHT powder and mix for at least 10 minutes in constant slowly mixing, into a homogeneous smooth slurry.

Hand-held electric mixer: Add the prescribed amount of water into a suitable mixing container, followed by powder mixture. Mix for at least 5 minutes with constant slowly mixing into a homogeneous smooth slurry. Then let the slurry rest for 5 minutes and then mix again for 1 minute. Mixed IZONIL LIGHT must be used within 3 hours.

APPLICATION

IZONIL LIGHT is applied manually (using standard tools for plastering) or by a plastering machine pump (it is important to set up and test fresh mixture for specific type of machine pump before application).

Although IZONIL LIGHT contains PP fibers for elimination of surface hairline cracks, it is recommended to use fiberglass mesh to prevent hairline cracks. Recommended specification of fiberglass mesh is 5 mm x 5 mm (size) and 145 g / m^2 (weight).

Fiberglass mesh is applied close to the final surface. First, approx. 70% of total thickness of IZONIL LIGHT is applied (e.g. 7 mm at 10 mm total thickness), then fiberglass mesh is gently pushed with trowel into fresh layer of IZONIL LIGHT and the rest 30% of total thickness of IZONIL LIGHT is applied immediately (e.g. 3 mm at 10 mm total thickness).

Surface of IZONIL LIGHT is finished in the same way as ordinary cement-based plasters by foam trowel.

CLEANING

Clear water is used for disposal of IZONIL LIGHT for the tools and equipment. Hardened material can be disposed only in a mechanical way.

CARE AFTER APPLICATION

It is necessary to prevent IZONIL LIGHT from too fast drying since the optimal moistness enables permanent hydration of cement materials and minimization of cracking. Protect freshly applied IZONIL LIGHT prior to rapid drying using appropriate protective methods for at least 48 hours, especially at dry and windy weather, or when exposed to direct sunlight.

FINAL COATING / PAINTING

Let IZONIL LIGHT to dry / harden at least 3 weeks before finishing the surface. IZONIL LIGHT can remain exposed without any final coating / painting. If final coating / painting is required, decorative coatings with high water vapor permeability should be used (highly breathable - diffusion-open decorative coatings / paints like silicate paints, cement paints, lime paints). If you are using a different type of paint, check its suitability with the distributor.

IMPORTANT

Individual parameters of preparation, mixing and application of the product stated in this data sheet could vary by country, conditions and climate where the product is used. It is important to adjust parameters for specific conditions of usage. Please contact us in case of any questions regarding the usage of IZONIL LIGHT (by email vietnam@izonil.eu or through website www.izonil.eu where you can also find video tutorials for preparation and application).

LIMITATIONS AND WARNINGS

⊙ No additives other than clean water are added to IZONIL LIGHT
⊙ IZONIL LIGHT is not applied at direct sunlight and / or strong wind or rain
⊙ IZONIL LIGHT is only applied on a solid, pre-prepared substrate
⊙ The freshly applied IZONIL LIGHT must be protected from rain for at least 24 hours (at 20 ° C)
⊙ If IZONIL LIGHT is applied inside, it is necessary to ensure proper ventilation of the room for optimum drying of the wall
⊙ Mixed IZONIL LIGHT can only be processed at air and substrate temperature above + 5 ° C
⊙ With the expected freeze, it is not recommended to use IZONIL LIGHT
⊙ Potable water is used for mixing of IZONIL LIGHT
⊙ Unused IZONIL LIGHT remnants are mixed with water, allowed to cure and disposed as construction waste
⊙ Contaminated packagings are disposed as hazardous waste (see safety data sheet)

LEGAL NOTICE

The information and, in particular, the recommendations relating to application and final use of IZONIL products are provided in good faith, resulting from the present knowledge and experience with the products when properly stored, handled and applied under normal conditions in accordance with the recommendations of RED LION COMPANY LTD. or its distributors. As long as the use and processing of the product is not subject to our direct influence, we will not be liable for any damages caused by its misuse. We reserve the right to make changes resulting from technical progress.

FIRST AID, SAFETY AND HYGIENIC RULES

Detailed safety and health information as well as detailed precautions are provided in the IZONIL LIGHT safety data sheet.

MANUFACTURER

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