

LIGHT MACHINE

KOMBI MTL

Light mineral levelling coat/dry mortar



MAIN ADVANTAGES

- High adhesion to substrates with high water absorption and to porous substrates
- Easy to process
- Reduction of substrate surface absorption
- Prolonged processing time
- Reinforced with microfiber
- Very good plasticity and processability

AREAS OF APPLICATIONS

Dry mineral mortar based on hydraulic binders and selected aggregates (including light aggregates) intended for the manual or machine application of top coats outside and inside buildings. It is especially recommended for applying on walls made of porous materials (such as cellular concrete) and absorbent ones (such as silicate brick) and intended for EWI systems, thin coat renders or paint coatings. It may be applied on all typical mineral substrates such as, e.g. concrete, light weight concrete, expanded clay aggregate, ceramic brick and silicate brick as well as porous ceramics. It is characterized by very good plasticity and processability, accordingly it is easy to process.

TECHNICAL SPECIFICATION

Base binder: hydraulic binders and modifying agents, includes cellulose fibers;

Grain size: to 0.8 mm;

Colour: natural white

Mixing ratio: 5,0÷5,5 liters of water per 25 kg of mortar;

Usage: after adding an appropriate amount of water it is possible to obtain around 19 liters of ready-to-use mortar from one packaging of the product;

Application time after adding water: not more than 2 hours;

Consumption: ca. 15 kg/m² per each 10 mm of the layer thickness;

Temperature of application (air and substrate): from +5°C to +25°C;

Compressive strength: cat. CS II;

Top coat mortar type according PN-EN 998-1: LW (light);

Gross bulk dry density: ≤ 1300 kg/m³;

Water absorption due to capillary rise: cat W0;

Adhesion: ≥ 0.5 N/mm²;

Water vapour permeability coefficient μ: ≤11;

Heat conductivity coefficient:

• λ dry, 10 = **0.33 (W/m*K) for P=50%**

• λ dry, 10 = **0.49 (W/m*K) for P=90%**

Reaction to fire: class A1;

Packaging: Disposable paper packaging containing 25 kg of product.

Storage: The product should be stored in its original sealed packaging, in a dry frost-protected room, on pallets.

Note: The product must be kept out of the reach of children.

Shelf life: 12 months from manufacture date specified on the packaging, provided that the storage requirements are observed.

APPLICATION METHOD

SUBSTRATE PREPARATION: Apply to a sound/stable and clean substrate (without cracks and delaminations), not frozen, even and dry, and biological or chemical efflorescence free. In case of algae/fungi growth, the substrate should be cleaned mechanically and then wash with water and disinfect with **ALGIZID**. The substrate in the building basement zone should be protected against the capillary action or against moisture permeating from the outside of the building. Any loose layers that are not bound to the substrate (such as loose render or flaked coatings) should be removed. Old and/or dirty substrates should be washed off and degreased with water and **CLEANFORCE** cleaning agent. In justified cases (for example, on smooth, non-absorbent substrates), apply a cement key coat. Substrates with high absorbency abundantly irrigate water before applying the mortar. Works related to the proper preparation of the substrate apply the principles of the art of construction.

PRIMING: Walls and ceilings made of absorbent materials should be primed with **BUDOGRUNT ZG/WG** or abundantly irrigated water before applying mortar. The binding time of the applied primer (at a temperature of + 20 °C and a relative humidity of 55%) is about 3 hours.

PRODUCT PREPARATION: Pour the contents of the packaging into a container with a measured amount of clean and cold water (5.0÷5.5 l per 25 kg of mortar) and thoroughly mix with a low-speed mixer fitted with a basket stirrer until homogeneous mixture is obtained. Then, leave the mortar for ca. 5 minutes. Before application, the product should be thoroughly mixed. Depending on the temperature and air humidity, the ready to apply product may be used for ca. 2 hours.

APPLICATION METHOD: When applying manually, it is necessary to put mortar onto the wall with a steel trowel and smooth it with a darby. After initial setting, the product applied should be rubbed with a trowel padded with a sponge or felt. If large areas are concerned, it is recommended to use a plastering/rendering machine. The recommended thickness for applying a layer for ceilings — min. 10 mm, for walls — min. 8 mm, outside the building — min. 15 mm (12 mm — if thin coat render is the finish coat). To avoid colour differences on large areas, layers > 20 mm to be applied twice. 'Wet on wet' method to be used. In the places where walls connect with other construction materials and in the places in which installation cavities are present, it is necessary to embed a reinforcing fibreglass mesh with the grain size of 145÷175 g/m² into the mortar. **Note:** The product is alkaline, therefore, it is necessary to protect eyes and skin. Safety clothing (PPE) must be worn while carrying out any installation work. In case of contact with eyes, immediately rinse them thoroughly with plenty of water. If irritation develops, seek medical assistance.

DRYING: Mortar applied on the substrate (drying in 20°C, 65% RH) may be subject to further processing assuming one day of drying per each 1 mm of the layer thickness. **Note:** Drying time may be longer due to low temperatures and high relative humidity. To assist the drying of the finish coat, the surface should be protected against precipitation and condensation.

USEFUL HINTS: In order to prepare the mortar it is not allowed to add any foreign admixtures and use only clean water for mixing. During the application and drying of the mortar, rainless weather should prevail, with an air temperature between + 5 °C and + 25 °C and the temperature of the substrate above + 5 °C. Drying time may be longer due to low temperatures and high relative humidity. All tools should be cleaned with water after work is completed. Application during direct exposure to sunlight or in strong winds is not recommended. To protect wet product against inclement weather conditions, scaffolding should be covered with some protective netting. The set mortar cannot be mixed again by means of adding water or fresh mortar.