

Kimicover 501

High-performance monocomponent acrylic resin for waterproofing balconies, terraces and occasionally walkable roofs



Scheda Tecnica rev.01_05/2025

DESCRIPTION

Kimicover 501 is a single-component product in water dispersion made out of acrylic elastomers. It is cold applied to waterproof new or restored roofs. It creates an elastic, continuous, colored membrane, with excellent resistance to thermal shocks, UV rays and acid rain. It adheres to concrete, brick, fiber cement, bituminous membranes, wood, cement plasters.

ADVANTAGES

- UV-crosslinking technology: UV rays, which generally deteriorate the protective coatings, in this case prolong the polymerization over time, lengthening and increasing the duration of the protective coating; excellent surface resistance; resistant to dirt retention; low superficial adhesiveness.
- Ideal for roofs of any size, even with an existing bituminous membrane.
- It can be applied by roller, brush or spray with an airless pump.

USES

Kimicover 501 is used to waterproof walkable roofs (both new and restored), gutters, fiber cement roofs, facades exposed to heavy rain, undertile waterproofing.

WORKS

Impermeabilización expuesta de cubiertas ocasionales transitable con sistemas acrílicos (SA21).

CERTIFICATIONS

It is CE marked as a protective coating according to 1504-2, intervention principles MC and IR.



APPLICATION

	Roller or brush application		Complete hardening time: 7 days
	Mechanical device application		Mixing water: 0,25 lt/ 5Kg 1,25 lt/ 25Kg
	Thickness per coat: 1-2 mm for horizontal application		

The substrates must be clean and mechanically consistent, any holes or irregularities in the substrate must be previously repaired with suitable Kimia products. In case of waterproofing of already tiled surfaces, remove the first row of wall tiles for a height of about 20 cm, perform an acid washing of the surface with Soluzione P.

In the case of degraded concrete substrates it will be necessary to check the depth of the degradation and proceed with a proper cortical restoration cycle.

Between 8 and 24 hours prior to the start of operations, the screeds must be treated with a coat of Kimicover FIX MV primer.

The points of contact between the screed and the collection wells, the tiles removed, the external edges of the joints, cleaned and possibly rebuilt, will be waterproofed by applying Kimicover JOINT P and application of Kimicover 501 reinforced with Kimitech 120 mesh.

The joints between the wall and the floor will be waterproofed by applying Kimicover JOINT and applying Kimicover 501 reinforced with Kimitech 120 mesh.

The joints will be waterproofed by laying Ethafoam, sealing with Tecnoseal 130 or Tecnoseal 88 (which must be left to cure at least 24 hours before laying Kimicover JOINT elastic strip. The distance between the joints must be evaluated on a case-by-case basis) of the type of substrates and the expected stresses.

Kimicover 501 is a single-component product ready to use with the addition of drinking water in the quantities shown in the table.

It is applied by brush, roller or airless pump in at least two

coats in 12 hours, impregnating in the first a layer of Kimitech 120 or Kimitech TNT mesh.

CONSUMPTION

1,5-3 Kg/m² depending on the porosity of the substrate.

PACKAGING

Con 5 Kg

Con 25 Kg

STORAGE

Product fears frost; store at a temperature above 5°C. Store in hermetic containers in a sheltered, dry place. In these conditions the products stability is 24 months.

CHARACTERISTICS	TYPICAL VALUE
Min. Application temperature	+10 °C
Dry to touch *	2h (+20°C, 50%) 1h (+30°C, 50%)
Rain resistance *	8h (+20°C, 50%) 4h (+30°C, 50%)
Hardening time *	4gg (+20°C, 50%) 2gg (+30°C, 50%)
Apparent dry bulk	1,35 ± 0,05 g/cm ³
En iso 2811 -1	7 days
Complete hardening 25°C	35 mins
Frosting time (200g at 20°C)	69 ± 1 %
Viscosity (at 20°C e 20r.p.m.) UNI 8490-3	500 - 1000 mpa·s
Standard colors	Grey, red, white

* This timing is approximate and can be influenced by changes in environmental conditions, especially temperature and humidity. Low temperature and high relative humidity slow down the hardening. On the contrary, high temperature and low relative humidity accelerate the hardening process.

CHARACTERISTICS	LIMITS EN 1504-2	TYPICAL VALUE
Concrete adhesion EN 1542	Flexible systems without trafficking >0,8 Mpa; with trafficking >1,5 Mpa. Rigid systems without trafficking >1 Mpa; with trafficking >2 MPa.	> 0,8 N/mm ²
Permeability EN ISO 7783-2	Class I (permeable to vapour) Sd < 5 m Class II 5 m ≤ Sd ≤ 50 m Class III (not permeable to vapour) Sd > 50 m	Class I
Capillar absorption and water permeability EN 1062-3	< 0,1 Kg/m ² ·h ^{0,5}	< 0,1 Kg/m ² ·h ^{0,5}
Fire reaction class	Declared value	F

WARNING

Product intended for professional use.

Given the possibility that different supplies of the same raw materials have slightly discordant colors, including a lot of production and the other may be minor color variations that do not affect in any way the technical performance of the products supplied.

Always check the integrity of the packaging before use and do not use the product with lumps.

Use all the material once the packages are opened.

The equipment used for the installation of the product can be cleaned with water before hardening.

Provide for vent chimneys properly placed according to the humidity of the substrate.

After evaluating the thermohygrometric conditions of the environment below the roof, apply an aerator:

- every 40 m² for environments characterized by low humidity and the presence of special layers of vapor diffusion;
- every 20 -25 m² for environments with average humidity;
- every 15 m² for environments with high humidity (swimming pools, environments with special processes, etc.).

Avoid applying the product at temperatures below + 10°C. Pay attention to the presence of condensation.

At low temperatures (below 10°C) the hardening is considerably delayed.

The substrate and the product must be at a temperature of at least 3°C above the dew point to reduce the risk of condensation or blistering of the membrane after laying. Take all necessary precautions for a good seasoning of the product.

If the application is carried out in conditions of low relative humidity, windiness and sunshine, it is advisable to protect the treated surfaces with protective sheets.

The treated surfaces must be protected from rain, fog or contact with water for at least the first 24 hours after laying.

For further information and advice on safe handling, storage and disposal of chemical products, the user must refer to the most recent Safety Data Sheet, containing physical, ecological, toxicological and other data related to safety. All technical data shown in this Technical Data Sheet are based on laboratory tests. Actual measurement data may vary due to circumstances beyond our control. The information and requirements indicated in this Technical Data Sheet are based on our current knowledge and experience and are to be considered, in any case, purely indicative. They cannot guarantee the final result of the applied product and they have to be confirmed by exhaustive practical applications; therefore the user must

test the suitability of the product for the intended application and its purpose. Users must always refer to the latest version of the local technical data sheet related to the product

TECHNICAL SPECIFICATIONS

SK21 - Impermeabilización expuesta de cubiertas ocasionales transitable con sistemas acrílicos

Cleaning (aimed at the total elimination of dust, grease, old varnishes, inconsistent parts, in detachment, with poor mechanical characteristics and any other material that could affect the good anchoring), cortical restoration and/or skimming, priming (in case of tiled surfaces, newly built screeds and/or laid on old membranes) with a coat of Kimicover FIX MV (to be applied between 8 and 24 hours before laying the acrylic coating), preliminary treatment of joints and fittings and subsequent waterproofing with resin based on acrylic elastomers Kimicover 501 reinforced with Kimitech 120 reinforcement mesh by Kimia SpA or similar products.

The single-component waterproofing resin in aqueous dispersion based on acrylic elastomers to waterproof roofs, terraces, balconies, occasionally walkable will be prepared and applied scrupulously following the indications reported on the technical data sheets provided by the manufacturer and must have the following characteristics:

- Dry to touch 25°C: 1 h;
- Complete hardening at 25°C: 7 days;
- Frosting time (200g at 20°C): 35 mins;
- Solids content UNI 8309: $69 \pm 1\%$;
- Viscosity (at 20°C and 20r.p.m.) UNI 8490-3 : 500 - 1000 mPa.s.

The product will be CE marked as a type C second protective coating according to EN 1504-2, MC and IR intervention principles.