



TECHNICAL DATA ETNA

Issued on 03/04/2024 - Rev. n. 1 of 03.04.2024

Product description:

Etna® is a true revolution in the world of professional decoration that will change the habits of installers and the entire commercial chain, offering anyone an extra chance to contribute in a real way to the well-being of the planet, so as to promote the transition towards a circular.

From the REUCET 2018/2020 project (recovery and use of Etna volcanic ash) conducted by a group of scholars from the University of Catania and financed by the Ministry of the Environment.

Etna® is the new product for high professional decoration, composed of volcanic ash from the Etna eruption of 1669, which gives the product chemical-physical characteristics such as ease of application and resistance, thermal insulation properties, eco-sustainable, in addition to the treated surfaces with Etna® I am able to purify the air in your environment.

Etna® is a breathable product that reinforces, protects and restores the internal and external walls and floors of your home.

Fields of application:

Etna® is the ideal solution for:

- Creation of walls inside and outside of commercial establishments and residential environments, bars, cafes, restaurants.
- Creation of spatula-like, low-thickness material effects.
- Creation of walls and floors for kitchens, living rooms, bedrooms, bathrooms, doors and furniture.
- In all civil construction environments where there is a need for a smooth covering with a volcanic marble effect.

Preparation of the supports to be treated:

- The supports must be dry, solid, free of dust, paint, wax, oil, loose or loose parts.
- Appropriate surface preparation is essential to ensure excellent application and guarantee the best performance of Etna® by applying Primer NK and/or Primer Beton.

Preparation of 3D Cement in Etna®:

1. For 20 kg of product you need to pour 6 liters of drinking water into a clean bucket;
2. Add 4 kg of Etna® and mix;
3. Add the 3D Cement in small doses and mix carefully using a mechanical mixer until a homogeneous paste is obtained, Etna® is ready to be applied;
4. The yield of Etna® is approximately 14 m² in two layers;
5. Consume the mixed product within six hours.

Application of Etna®:

1. Spread a first layer of Etna® using a stainless steel trowel evenly over the entire surface and leave to dry for at least 12 hours (+20°C);
2. Apply a second layer of Etna® for approximately 4/6 m², go back and smooth the product by tilting the stainless steel trowel so as to make it smooth and uniform. Once the work is completed, leave to

Nikkolor Italia s.r.l.

V.le Vittorio Veneto, 186 - 96014 Floridia (SR)

+39 0931 941789 - www.nikkolor.net

- dry for at least 24 hours (+20°C) ;
3. Using an orbital sander with 180 grit abrasive discs, sand the surface without applying pressure so as to eliminate any product residues, dust the surface before applying the transparent protection.

Application of ProteKto EcoSilan on walls:

1. ProteKto EcoSilan is ready to use and does not need to be diluted.
2. Using a soft bristle brush, apply a first layer of ProteKto EcoSilan, using horizontal and vertical movements to allow the product to penetrate deeply.
3. Leave to dry for 12h (+20°C).
4. Apply a second layer of ProteKto EcoSilan within 24 hours of applying the first coat and not before 12 hours (+20°C).

Application of Vetroliquido PRP on walls and floors:

1. Apply a first layer of Vetroliquido PRP using a short-haired roller and immediately smooth the product with a stainless steel trowel to eliminate any bubbles.
2. Leave to dry for 12h (+20°C).
3. Apply a second layer of Vetroliquido PRP as done for the first layer and leave to dry for 24h (+20°C).

Warnings and recommendations:

- Avoid applying the product with relative air humidity above 80%;
- Do not apply on damp supports or where the presence of rising or infiltrating humidity has been ascertained;
- Measure with a carbide hygrometer at a depth of 4 cm to ensure that the humidity level is less than 3%;
- Cover fixtures, doors, etc. well;
- The floor will be suitable for pedestrian traffic only two days after the last layer of Vetroliquido PRP finish has been applied. For frequent washing and the installation of furniture it will be necessary to wait at least five days after the last layer of Vetroliquido PRP finish has been applied.

Implementation features:

- Operating temperature: +5°C and +30°C;
- Resistance to water and UV rays after the application of Vetroliquido PRP: ~2 days;
- Store the products in a cool, dry place away from the sun, +5°C and +30°C;
- Do not apply outdoors in the presence of strong sun, strong wind or near rain;

Performance Features:

- Tensile strength (EN 13892-2): 38 N/mm² after 28 days.
- Compressive strength (EN 13892-2): 38 N/mm² after 28 days.
- Flexural strength (EN 13892-2): 36 Nm at 28 days.
- Impact resistance (UNI EN ISO 6272-1): 0.500/m Nm/501.
- Resistance to permeability (UNI EN 1062-3): 0.0001 kg/m²*h0.5 at 5 days.
- Reaction to fire (EN 13501-1) CLASS 1 after 28 days.
- Adhesion resistance to concrete (EN 13892-8): 6 N/mm² after 28 days.
- Determination of the chair with wheels (EN 425): absolute absence of defects.
- Recommended minimum/maximum thickness for the application cycle is 3 mm. Consumption may vary depending on the consistency, porosity and condition of the surface, as well as the application method. The performance tests were carried out in our laboratories (laboratory temperature +21°C - humidity 65%).
- Slip: DIN 51097 Class A method 19° ≤ α < 27° - Anti-slip (DIN 51130): R11 - Environments for the production of food, kitchens of catering establishments, work environments with a strong presence of water and mud, clinics, laboratories, laundries, hangars.

Technical data and physical characteristics Etna®:

- Appearance: Granules
- Color: Characteristic
- Origin: Etna lava eruption
- Grain structure: irregular
- Grain shape: Rounded edges, hardness (according to Mohs scale): 7

Nikkolor Italia s.r.l.

V.le Vittorio Veneto, 186 - 96014 Floridia (SR)
+39 0931 941789 - www.nikkolor.net

- Characteristics: It is excellent for thermal and acoustic insulation, resistant to corrosion, adsorbent for pollution reduction purposes.

Technical data Cemento 3D:

- Appearance: Powder
- White color
- Dilution: 6 liters of drinking water in 20 kg of product based on the type of processing chosen
- Mixture pH: 12-14
- Two-layer coverage: 14 m²
- Apparent density: 1.20 kg/L
- Apparent density of the mix: 1.45 kg/L
- Thermal resistance - Operating temperature: -30°C ÷ +90°C.
- Storage in original, well-closed packaging and in a dry place between +5°C ÷ +30°C.
- Packaging: 20 kg
- Duration of the mix: (*) workable for 6 hours
- Application temperature: (*) +5°C ÷ +30°C.
- UFI Cemento 3D code: NC00-Y08C-J00G-9N29

(*) The times expressed are longer or shorter as the temperature decreases or increases. In compliance with the general principles - Principles of evaluation of the use of products and systems.

Test conditions: temperature 23±2°C, 50±5% R.H. and air speed in the test area <0.2 m/s. The data expressed may vary depending on the specific construction site conditions: temperature, humidity, ventilation, absorbency of the substrate.

Important Notes:

- Do not use on metal, rubber, vinyl, linoleum or PVC surfaces.
- In adverse environmental conditions such as; high temperatures, wind and near rain, the time of use can be very short, in these climatic conditions outdoor use is not recommended.

The indications and methods reported may be subject to additions and/or changes over time by Nikkolor Italia s.r.l.; for any such updates, you can consult the website www.nikkolor.net. Nikkolor Italia s.r.l. is therefore responsible for the validity, currency and updating of its information only if extrapolated directly from its site. The technical data sheet is drawn up based on our best technical and application knowledge. However, as we cannot directly intervene on the conditions of the construction sites and the execution of the works, they represent indications of a general nature which do not bind our Company in any way. We therefore recommend a preventive test in order to verify the suitability of the product for the intended use.