

POLYSILICATE (LOW-ALKALINE)

NOVALIT F

Polysilicate facade paint



MAIN ADVANTAGES

- Mineral character
- Low-alkali reaction (pH 8÷9,5)
- Resistance to adverse atmospheric conditions
- Increased resistance to changes of atmospheric conditions during application and setting
- High dirt resistance
- Micro-porous texture which assures high vapour permeability
- Low surface absorption
- To be applied on both mineral substrates and polymer coated surfaces
- Protected against algae and fungi growth

AREAS OF APPLICATIONS

Mineral topcoat paint based on specially modified potassium water glass intended for performing decorative-protective paint coatings outside buildings, including **KABE THERM SM**, **KABE THERM SM RENO** and **KABE THERM AVANT** EWI systems based on EPS and **KABE THERM MW**, **KABE THERM IN MW** and **KABE THERM SG** EWI systems based on mineral wool. It is especially recommended for primary and renovation painting of mineral substrates (such as traditional lime renders, cement-lime renders and cement renders as well as thin coat mineral renders, silicate renders, polysilicate renders) and for the renovation painting of substrates with synthetic-based paint coatings when mineral paint coating is required. The polysilicate paint shows an essentially reduced alkalinity (at the level of acrylic products) thanks to which the impact of atmospheric conditions on the quality of created paint coating has been significantly reduced. Absorbent mineral substrates, prior to paint application require priming with **NOVALIT GF**.

TECHNICAL SPECIFICATION

Base binder: special modified potassium water glass;
Pigments: resistant to UV radiation and atmospheric conditions non-organic coloured colour pigments;
The content of volatile organic compounds VOC: cat. A/c. The product contains less than 40 g / lVOC;
Density: ca. 1.50 g/cm³;
Colours: natural white, colours from the KABE colour chart and selected NCS colours or samples provided (can be obtained by adding non-organic pigments);
Gloss level: matt;
Diluent: water;
Average coverage: ca. 0.33 l/m² (with double painting on a smooth substrate);
Temperature of application (air and substrate): from +5°C to +25°C;

Relative humidity: ≤75%;
Relative diffusion resistance of a layer with the thickness of 150 µm:
 $S_d = 0.04 \text{ m}$ (standard requirement $S_d \leq 2.0 \text{ m}$);
Surface absorption coefficient: $w = 0.05 \text{ kg/m}^2 \cdot \text{h}^{0.5}$
 (standard requirement $w \leq 0.5 \text{ kg/m}^2 \cdot \text{h}^{0.5}$).
Packaging: Single-use plastic packaging of 5 and 10 l.
Storage: The product should be stored in its sealed packaging in a cool, but frost-protected room. Opened packaging should be tightly closed and used as quickly as possible.
Shelf life: Originally sealed products have a 12-month shelf life from the date of production (this is printed on the side of the packaging).

APPLICATION METHOD

SUBSTRATE PREPARATION: Apply to a sound/stable and clean substrate (without cracks and delaminations), degreased, dry, and free of biological contamination or chemical efflorescence. In case of algae/fungi growth, the substrate should be cleaned mechanically and then wash with water and disinfect with **ALGIZID**. Any loose layers not bound to the substrate (i.e. 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. For uneven substrates, first use levelling compound and then level the surface with **KOMBI FINISZ** levelling/finish render. Small unevenness can be at once levelled out with **KOMBI FINISZ** levelling/finish render. Absorbent substrates should be primed before finish levelling and smoothing compound and/or levelling compound is applied. If paint is applied on new mineral substrates (such as concrete, lime, cement-lime and cement render), 2-week curing period is required. Before applying the paint in the **KABE THERM SM** and **KABE THERM SM RENO**, **KABE THERM AVANT** and **KABE THERM MW** EWI systems, all coats of the systems must be made in accordance with the technology of the External Thermal Insulation Composite Systems - ETICS. Polysilicate paint can be applied to thin-layer render only after 7 days of exposure (at +20 °C and 65% relative humidity).
PRIMING: Prior to paint application, the mineral substrates should be primed with **NOVALIT GF**. Primer should be dry before applying a paint, curing period lasts about 12 hours. **Note:** Substrates of low wettability (such as top coats based on polymers or dispersion coatings) should not be primed and should be only washed with water and **CLEANFORCE** cleaning agent.
PAINT PREPARATION: The packaging contains a ready-to-use product. If required, add a small amount of clean water (by adding to the first painting max. 10% of volume and to the second one max. 5% of water). Quantity of added water may vary depending on the substrate type, drying conditions and application method.
APPLICATION: Paint should be applied on the substrate in two layers with a brush, roller or by spraying (including also the 'airless' method). The second paint layer to be applied only after the first one dries completely, i.e. after min. 24 hours. Use mechanical spraying only in windless weather. It is recommended to use a special paint roller for facade paints made of woven polyamide with a bristle length of min. 18 mm.

Spraying parameters for an airless type device:

Manufacturer	Device	Nozzle	Pressure [bar]	Filter [mesh]	Dilution [%]	Usage [l/min]
WAGNER	ProSpray 3.21	0552-519	200	60	10÷20	1.25
TITAN	Titan 450e	661-519	200	60	10	1.25
GRACO	UltraMax II 795	PAA621	170	60	5	3.6

DRYING: approx. 3 hours for one paint layer applied to substrate (20°C, 55% RH). Complete setting (hardening) of paint coating made takes place after min. 24 hours. **Note:** Drying time may be longer due to low temperatures and high relative humidity. Protect the fresh coating against precipitation and condensation until it sets completely.
USEFUL HINTS: To avoid colour differences, a single batch product should be applied to entire facade or element in one working cycle. To be applied on dry days at temperatures between 5-25°C. All tools to be cleaned with water after finishing work. Application during direct exposure to sunlight, in strong winds or high air humidity is not recommended. To protect wet coating against inclement weather conditions, scaffolding should be covered with some protective netting.
ADDITIONAL OPTIONS: In order to increase the resistance of the paint coating to the growth of algae and fungi (especially while renovating EWI systems and while painting facades in shaded places of increased humidity and with high concentration of plants), it is recommended to apply a special protective substance along with the paint (additional service). If paint is applied on substrates covered with cracks with a width of up to 0.3 mm (such as e.g. small shrinking cracks of the top coat), it is recommended to use paint reinforced with microfibres for the first painting **NOVALIT PLAN**.