

TECHNICAL DATA SHEET OF THE PRODUCT DIGNA PLUS INTERIOR

Thermo-reflective and thermal insulation coating for surfaces inside the construction works

Characteristics of the coating

DIGNA PLUS INTERIOR is a thermo-reflective and insulating coating that improves the heat distribution inside rooms, contributing to an increase in the temperature of the heated room by about 5°C (with the same heating parameters). It reduces the consumption of thermal energy for heating or cooling rooms by up to 40%.

DIGNA PLUS INTERIOR is a medium-viscous, water-dilutable dispersion coating, which is a homogeneous composition of appropriately selected inorganic fillers, pigment, fillers with high-quality acrylic copolymer dispersion and small additives modifying its rheological and functional properties and its microbiological resistance.

Walls and ceilings covered with the DIGNA PLUS INTERIOR coating limit the convective movement of air, which reduces the amount of dust, mites and pollen in the rooms and reduces the amount of electrostatic charges in the air. This causes better well-being and less allergic reactions of people staying in these rooms.

After applying the DIGNA PLUS INTERIOR coating, due to the use of the phenomenon of reflecting infrared radiation in all directions inside the room, the temperature difference in the rooms at the ceiling and the floor does not exceed 1.5°C.

An additional benefit of using the DIGNA PLUS INTERIOR coating is the process of preventing water vapor condensation on the so-called thermal bridges. As a result, mold and fungus spores do not form on the walls (e.g. in kitchens and bathrooms).

The DIGNA PLUS INTERIOR coating additionally exhibits high flexibility allowing for the correction of micro-cracks in the walls. At the same time, the coating, thanks to its good vapor permeability, ensures that the walls retain their parameters in terms of the necessary moisture penetration.



Usable features

The DIGNA PLUS INTERIOR coating is:

- ✓ ecological,
- ✓ water-soluble,
- ✓ waterproof,
- ✓ vapor permeable,
- ✓ flexible and resistant to microcracks and scratches
- ✓ resistant to water

Scope of application

DIGNA PLUS INTERIOR is a ready-to-use product intended for application inside buildings (on walls and ceilings as the last layer). The DIGNA PLUS INTERIOR coating reduces the absorption of thermal energy in the form of infrared radiation through walls and ceilings.

Technical properties of the coating

Density of the coating in 20°C - 0,40-0,65 g/cm³

Brookfield viscosity L3 RPM5 ca. 20 000

Thermal conductivity $\lambda = 0,0008 \text{ W/mK}$

Dry matter content >60%

Thickness of dry coating when painting twice 0,3 - 0,35 mm

Resistance to wet scrubbing Class 3

Matt coating

Efficiency when applied twice 2,5 m²/litre

The ability to reflect infrared radiation (thermo-reflection) for a white coating >92%

Substrate preparation

The substrate should be dry, frost-free, dust-free, free from efflorescence and algae, load-bearing, degreased, without cracks. Before applying the product, it is recommended to wash the surface with water, dry it and use a primer for acrylic paints or a priming auxiliary product DIGNA PLUS. After drying, apply a thermal insulation coating using a roller, brush or hydrodynamic unit (it is recommended to remove any filters from the device and the paint gun).

Preparation of the product for application

DIGNA PLUS INTERIOR must be thoroughly mixed with a mechanical stirrer at a maximum of 150 rpm. If needed, up to 5% distilled water can be added to make the mixing process easier.

Application of coating:

DIGNA PLUS INTERIOR should be applied to the walls twice to obtain a coating thickness of min. 0.3mm. The drying time of the first coat is about 3 hours for well-ventilated rooms, relative humidity below 60% and air temperature of about 15-30°C. Under other conditions, the drying time may be up to 24 hours. After the first coat has dried, a second coat can be applied.

Work should be carried out at an air temperature of 5°C to 35°C and humidity not higher than 60%.

Efficiency

Efficiency from 1 liter of the product is up to 3 m² of finished coating on the surface of walls or ceiling and depends on the type of substrate.

Additional information

DIGNA PLUS INTERIOR can be dyed with water-based dyes in any shade, with the best level of thermo-reflectivity achieved with white.

VOC content (according to Directive 2004/42 FE130g/l from 2010) maximum 9 g/l.

ATTENTION!

The product is sensitive to low temperatures! Store at a temperature of +5°C to +25°C in sunless places.

Shelf life

24 months from the date of production, taking into account the above-mentioned storage conditions and provided that the packaging is tight.

Information sheet drawn up for MAXISOTHERM sp. z o.o.