



BILIZO® SUPERCRETE

High Performance, Smooth Surface Finish, Polyurethane Concrete Coating Material

Product Description

BILIZO® SUPERCRETE is a solvent-free, 3-component, self-leveling, hygienic, dust-free, high resistance to aggressive chemicals, special polyurethane resin combined floor covering material.

Uses

- In all closed areas with forklift, pallet truck and vehicle traffic
- In environments that are frequently cleaned, where there are thermal shocks, solvents and chemicals that will cause corrosion
- In all chemical process areas and production facilities
- Food industry, heat treatment areas and cold rooms,
- Beverage facilities, water filling facilities, dining halls and laboratories
- Hygienic units, medium and heavy duty workplaces, warehouse and packaging areas
- It can be used in all areas where performance is expected such as textile industry, cosmetics industry, maintenance and repair, production areas, printing houses.
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Packaging

BILIZO® SUPERCRETE A+B+C consists of 23.14 kg set.

Advantages

- Ideal for load-bearing floors thanks to its excellent abrasion resistance and mechanical strength.
- It is not affected by heavy traffic conditions.
- Resistant to many chemicals. It is resistant to a wide range of organic and inorganic acids, alkalis, amines, salts and solvents. It is hygienic. It does not allow bacterial growth.
- Provides excellent thermal compatibility with concrete.
- Similar coefficient of thermal expansion as concrete allows it to move with the surface in normal thermal cycling
- Physical properties and properties in the temperature range of -15 °C / +80 °C maintains its performance. (+80°C for 6mm)
- Thanks to its very high impact resistance, it does not crack, does not separate from the surface, does not crumble.
- With its solvent-free (VOC=0) and odorless structure, it can be used in hygiene areas such as all food processing facilities, hospitals, laboratories.
- It creates safe usage areas with its non-slip surface structure.
- It has a wide usage area with its easy-to-clean structure that does not allow bacterial growth.
- It is easy to maintain.

Technical Data

Colour	Grey, Yellow, Green, Red, Beige
Contents	Polyurethane based
Mixture Density (20°C)	1.95±0.02 g/cm ³ (A+B+C mix,21°C)
Pan Life	8-12 minutes
Shore A Hardness	82-88
Adhesion (to concrete)	>2 N/mm ² (TS EN 1542)
Impact Resistance	10 Nm>Class I>4Nm no damage (TS EN 6272-1)
Compressive Strength	53 N/mm ² (DIN EN 196)
Flexural Strength	21 N/mm ² (DIN EN 196)
Tensile Strength	10 N/mm ² (DIN EN 196)
Abrasion Resistance	Taber H22: 680 mg
Modulus of Elasticity	16.000 N/mm ² (DIN EN 13412)
Heat Resistance	-60 °C- +80 °C
Time to Open to Light Traffic	24 hours
Full Curing	48 hours
Application Thickness	3mm – 10mm
Ambient and Surface Temperature	+12 °C / +30 °C
Application Surface Moisture	<6% Tramex
Air Relative Humidity Level	Max.80%

PS: The informations above is given according to +23 °C and 50% humidity. High temperatures shorten the curing time and low temperatures increase the curing time.

Application

The tensile strength of the surfaces on which BILIZO[®] SUPERCRETE will be applied must be a minimum of 1.5 MPa. After curing for at least 7 days, fresh concrete can be applied by checking that it has reached the required tensile strength. There should be no water on fresh or old concrete surfaces. In cases where water comes from the ground, the water must be cut off first. The concrete floor on which the application will be made must be free of foreign materials, dust, dirt, grease and other impurities, irregularities and looseness that will reduce adherence. The grout layer that occurs naturally on the new or old concrete surface should preferably be removed with shotblasting (sandblasting) machines and/or suitable abrasive equipment. Gaps, holes and cracks on the concrete surface should be repaired with suitable primers or by filling with BILIZO[®] SUPERCRETE.

Temperature / Humidity: During the application, the ambient and ground temperature should be between +12 °C and +30 °C. This temperature range should be maintained for one week following the application. Priming the surface: BILIZO[®] SUPERCRETE can be applied without a primer depending on the quality of the concrete surface to be applied. When using epoxy primer, the surface must be sandblasted. Depending on the surface condition to be applied, BILIZO[®] SUPERCRETE with a thickness of 1-2 mm can be applied as stripping. The times specified in the user manual of the primer used for the surfaces primed with epoxy primer should be followed. In case of using BILIZO[®] SUPERCRETE as a primer, 24 hours should be waited for a top layer application.

Application Method: The BILIZO[®] SUPERCRETE application process consists of the steps of homogenizing the A component, mixing the A and B components with each other, adding the C component to the A-B mixture, pouring the material on the floor, spreading it with the help of a trowel and removing the air with a spiked roller. BILIZO[®] SUPERCRETE is a material whose application time is affected by temperature and whose application is short. From the start of mixing the A and B components with each other, the mixing, pouring, spreading, combining, rolling processes should be finished quickly. In order for the next set of material to be combined in a way that hides the joint with the previous one, the whole work should continue at a rapid pace and as uninterrupted as possible, there should be no waiting between the end of the practice of one set and the pouring of the next set on the ground. Therefore, mixing, transport and spreading teams should be formed and these teams should move at a harmonious pace. BILIZO[®] SUPERCRETE A component must first be mixed with a mixer for 30 seconds so that it is homogeneously dispersed within itself. Then, components A and B are transferred to a suitable sized mixing bowl and mixed for 30 seconds with a professional type double mortar mixer with speed adjustment. Then, stirring is continued and component C is added to the resin mixture. Component C should not be poured all at once. Mixing is continued until the mortar is completely homogeneous and wet, and the materials adhering to the bottom and walls of the mixing bowl are fed into the mortar with the help of a trowel. Mixing process should take 3 minutes between 10-20 °C and 2 minutes if it is above 20 °C. Care should be taken that no unmixed material remains at the bottom and around the box. In order to adjust the consistency, water or solvent should not be added, C component should not be mixed incompletely. Properly mixed BILIZO[®] SUPERCRETE is poured onto the prepared surface, and a triangular toothed trowel is spread evenly on the floor according to the desired thickness. In order to avoid joint traces, care should be taken to combine the spreading mortar before it starts to harden. BILIZO[®] SUPERCRETE, which is spread on the surface, should be passed with a spiked roller to help remove the air entrained into the material during the mixing process. Hedgehog roller application should be done with a hard spiked roller at the latest 2 minutes after the mortar is spread on the surface.

Cleaning of Tools: Tools and equipment used after the application can be cleaned with cellulosic or polyurethane thinner.

Considerations: • BILIZO[®] SUPERCRETE is ready for application and should not be diluted with any liquid.

- Components A, B and C are sold as a set. A, B and C component weights were arranged by calculating the required mixture amounts.
- The components in the kit must be mixed with each other completely.
- Do not apply on very humid (relative humidity above 6%) and wet surfaces.
- The bonding process should be done within the usage period of the coating materials to be adhered.
- In systems with underfloor heating, heating must be turned off before application.
- Contact with water should be avoided during the first drying period after the application.
- The material contaminated on the coating surface during the application should be cleaned immediately before it dries.
- During the application, the ambient temperature should be above +12 °C and the ambient humidity should be less than 80%.
- Products with the same serial number should be grouped separately to maintain stability in color tone.
- Wait at least 3 days before contacting with foodstuffs.
- Application should not be made in areas where air flow is in question.
- It should be protected against water for 24 hours from the application.

Storage

It should be stored in its unopened original package, in a cool and dry environment at a temperature of + 10 to + 35 degrees, protected from frost. In short-term storage, maximum 3 pallets should be placed on top of each other and the shipment should be made with a first-in, first-out system. In long-term storage, pallets should not be placed on top of each other. Under proper storage conditions, the shelf life is 1 year from the date of manufacture.

Safety Measures

Refer to Material Safety Data Sheet (MSDS) prepared as per the related EU directives before use.