

Lityofloor LSB 12

Construction Chemicals > Floor Coverings > Lithium Silicate-Based



Designed for application on concrete and cement-based floors, this product is a liquid surface hardener and densifier made from lithium silicate derivatives. Lityofloor LSB 12 reacts with free lime in concrete to form calcium silicate hydrate. These insoluble silicates increase the strength and water resistance of the concrete surface. The increased surface hardness reduces dusting and provides easier maintenance, creating a healthier environment. Compared to traditional sodium and potassium silicate hardeners, Lityofloor LSB 12 is easy and quick to apply.

■ Preparation of Substrate

- Factories
- Storage areas
- Garage floor concrete
- Aircraft hangars
- Shopping malls
- Parking lots
- Micro concrete applications

■ Advantages

- Single-component and easy to apply
- Reduces application time and costs in diamond polishing jobs
- Can be applied to both old and new concrete surfaces
- High abrasion resistance with hardness increasing over time
- Penetrates into the concrete and reacts with lime (calcium), preventing dusting and hardening the concrete
- Prevents dusting, ensuring adherence to the surface
- Increases water impermeability as the pores in the concrete fill up
- Water-repellent
- Has a transparent and glossy appearance
- Easy to clean
- Creates a shiny surface

1 Preparation of Substrate

The surface must be free of any residues that could prevent adhesion, such as dust, oil, and paint. Ensure the surface is dry before application, as this helps the product penetrate deeper into the concrete. In concrete polishing jobs, surface cleaning should be done after applying all sequential diamond grits and #50, #100, and #200 resin pads. Apply the product to the surface using a spray method and distribute it evenly with a short-fiber mop before it dries. Do not allow Lityofloor LSB 12 to pool; ensure it is spread evenly with the mop. Allow 1 day for the chemical reaction to complete after application.

2 Consumption

60-100 g/m² (Consumption may vary depending on surface porosity and concrete quality)

3 Packaging

5 kg Plastic can
10 kg Plastic can
30 kg Plastic can

4 Storage Conditions and Shelf Life

- Unopened packaging lasts for 12 months.
- The product should be protected from direct sunlight during storage and stored at 5-35°C.
- The product should be protected from freezing.
- The container should be tightly closed after use.
- The product should not be mixed with other chemicals.

5 Points to Consider

- Wear protective eyewear, gloves, mask, and clothing before application. Avoid contact with skin and eyes; if contact occurs, wash thoroughly with water and seek medical attention.
- Do not dilute the product with solvent or water.
- Do not use to restore crumbled, weakened concrete.
- Second and third layers can be applied to highly absorbent surfaces. However, these applications should be done wet-on-wet, without allowing the previous layer to dry.
- Desired shine can be achieved immediately with a polishing machine.
- The lithium silicate-based surface hardener is not harmful to health once it has dried.



TECHNICAL DATAS

Binder	Lithium Silicate Salt
Color	Transparent
Solver	Water
Odor	Odorless
Density	1,10 Kg/lit
pH	8,0
Full Drying Time	24 hours (24 °C Room temperature)
Solid Matter	12%
Flash Point	N/A
Freezing Point	+5 °C

Safety and Health Warnings

- Protective eyewear, clothing, and gloves should be worn. Avoid contact with skin, eyes, and clothing. Prevent the product from spreading into the environment.
- Do not eat, drink, or smoke during use.
- All packaging and containers should be carefully sealed to minimize spills.
- Containers should be securely sealed when not in use.
- Keep away from heat, sparks, flames, and hot surfaces.
- Broken packages should not be handled without protective equipment. Empty containers should not be reused.
- In the event of contamination of clothing, remove it immediately and wash before reuse.
- The product should be stored in clearly labeled containers.
- Keep out of reach of children. Keep away from food, drink, and animal feed.
- Keep away from oxidizing agents, heat, and flames.
- Only store in the original container.
- Containers should be stored upright, tightly closed, in a cool, well-ventilated area.
- Protect containers from damage.

Note

The information provided in this product data sheet is given in good faith based on current knowledge and experience. If you are not satisfied after conducting a surface test on a small area, please contact our technical service department immediately. The data on this page pertains only to the specified material and may not be applicable when used in combination with other materials or in other processes. Such information is accurate to the best of the company's knowledge as of the specified date.

As the conditions of use are beyond our control, all recommendations are made without warranty or guarantee of accuracy, reliability, or completeness. It is the user's responsibility to ensure the suitability and application of this information for their own use. The manufacturer's responsibility is limited to the replacement of products proven to be defective.