

# KLB-SYSTEM BALKON

# **BS 575 Top**

Rapid-setting, light and weather-resistant, flexibilised 2-component polyurea top sealer which can specifically be used for producing slip-resistant surfaces on balconies, loggias or pergolas

## **Packaging units**

Article no.	Content (kg)	Units/pallet
AK6146-60	5.00 kg	45



#### **Product characteristics**

Mixing ratio parts by weight	A:B=4:1	
Mixing ratio parts by volume	A: B = 100: 34	
Processing time	10 °C / 50 °F : 25 - 35 minutes 20 °C / 68 °F : 20 - 25 minutes 30 °C / 86 °F : 10 - 15 minutes	
Processing temperature	Minimum 10 °C / 50 °F (room and floor temperature)	
Curing time (accessibility)	10 °C / 50 °F : 6 - 8 hrs. 20 °C / 68 °F : 4 - 6 hrs. 30 °C / 86 °F : 2 - 4 hrs.	
Curing	2 days until mechanical load at 20 °C / 68 °F 3 days until chemical load at 20 °C / 68 °F	
Further coatings	After 4 - 6 hours, but after 24 hours at the latest at 20 °C / 68 °F. Protect scattered surfaces from rain.	
Consumption	Approx. 0.5 - 0.8 kg/m <sup>2</sup>	
Colours	Standard colours according to KLB colour chart, other colours available upon request! For scattered coatings using KLB coloured sand CQS-46xx, please observe the colour chart for coloured sands!	
Shelf life	12 months (originally sealed)	

#### **Product description**

**KLB-SYSTEM BALKON BS 575 Top** is a rapid-setting, coloured, solvent-free 2-component polyurea top sealer for the production of plain-coloured, light and weather-stable scattered surfaces on floors and plinths of balconies, pergolas or loggias in accordance with DIN 18531-5 Annex A.

**KLB-SYSTEM BALKON BS 575 Top** is used on weather-exposed areas and as a top sealer onto slip-resistant coatings, especially when a light-stable top layer is required.

In a system with KLB-SYSTEM EPOXID EP 52 RAPID and KLB-SYSTEM BALKON BS 570 WP, it is possible to install a balcony coating within 2 work days. BS 575 Top is rainproof after only 6 hours.

KLB-SYSTEM BALKON BS 575 Top is applied as a plain-coloured sealer on top of a scattered layer consisting of KLB-SYSTEM BALKON BS 570 WP.

To obtain a decorative flooring, the rapid-setting utility layer **KLB-SYSTEM BALKON BS 575 Top** can be scattered with coloured quartz sand **KLB-Colorqurzsand CQS-46xx**. Please refer to our CQS colour chart for the available base colours. The final sealing layer for the CQS coating is done with the light and weather-resistant

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top sealer **KLB-SYSTEM POLYURETHAN PU 484**. This results in an OS 11b conform balcony system in accordance with Rili SiB.

**KLB-SYSTEM BALKON BS 575 Top** is resistant to water, different household chemicals, numerous plasticicers as well as de-icing salts. This efficiently protects the underlying building fabric against the penetration of substances that attack concrete or promote corrosion, and improves resistance to mechanical impact.

**Note:** doormats or dirt-trapping mats, especially those with softeners, can cause staining on the flooring. Please use high-quality and plasticiser-free mats in case of exposure to weather and high temperatures.

#### Area of application

- As scattering layer for decorative balcony systems with coloured sand scattering in exterior areas.
- As top sealer for outdoor balcony systems that have been sealed with one colour.

#### **Product features**

- Total Solid according to GISCODE (Test method "Deutsche Bauchemie")
- · rapid-setting
- viscoplastic
- · resistant to abrasion and wear
- · good resistance to water and chemicals
- · quickly becomes rainproof
- · resistant to weather
- colour-stable
- · light-stable

#### Technical data

Viscosity - Component A+B	Approx. 1400 - 1800	mPas	DIN EN ISO 3219 (23 °C / 73.4 °F)
Solid content	> 99	%	KLB method
Density - Component A+B	1.45	kg/l	DIN EN ISO 2811-2 (20 °C / 68 °F)
Shore-hardness D	Ca. 70 - 75	-	DIN 53505 (after 7 days)

The values established in tests are average values. Deviations from the product specification may occur.

#### Included in systems

- · System O1 KLB Balcony PU Outdoor
- System O2 KLB Balcony DECOR PU Outdoor

Please visit our website to get more information about our KLB systems: <a href="www.klb-koetztal.com">www.klb-koetztal.com</a>

#### Tests

- Test report (system test): Performance characteristics test, for the use as a surface protection system/product following DIN EN 1504-2 "Products and systems for the protection and maintenance of concrete supporting structures, part 2: surface protection systems for concrete; German version EN 1504-2:2004", in consideration of DIN V 18026, "Surface protection systems for concrete from products according to DIN EN 1.5.2004-2" and in accordance with the DAfStb guidelines "Protection and maintenance of concrete components" and the TR maintenance directive.
- Declaration of performance in accordance with Appendix III of (EU) Regulation n. 305/2011 (construction product regulation), for the single products
- Slip-resistance according to DIN 51130 and BGR 181 for OS 11a/b available in R10 V4 and R11/V6.
- Product is compliant with DIN EN 1504-2:2004

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#### **Build-up of coats**

#### System O1 KLB Balcony PU Outdoor

- Prepare the substrate such as concrete, cement screed or similar mechanically, e.g. with shot blasting. Then vacuum off thoroughly.
- Apply the **EP 52 RAPID** primer, consumption approx. 0.3 0.4 kg/m<sup>2</sup>.
- Optionally: scratch coat made of EP 52 RAPID and mixed sand KLB-Mischsand 3/1 in a mixing ratio of 1:1 parts by weight. Consumption approx. 0.6 - 1.0 kg/m².
- Scatter the primer or scratch coat openly using quartz sand 0.3/0.8 mm, consumption approx. 0.5 - 1.0 kg/m².
- Apply the elastic base layer BS 570 WP filled with 30% of quartz sand 0.1/0.3 mm using the toothed trowel Toothed Blade RS4 or Pajarito 48, consumption approx. 2.6 - 3.0 kg/m².
- Scatter the entire surface using quartz sand with a grain size of 0.3/0.8 mm, consumption approx. 6 - 8 kg/m². Remove excess sand after curing, brush off loose grains and thoroughly vacuum off the entire surface.
- Apply the weather-resistant BS 575 Top top sealer, consumption approx. 0.5 -0.8 kg/m² using a foam rubber wiper, then uniformly distribute it in crosswise motion with a velour roller.
- Optionally, a transparent matt sealer such as PU 880 and PU 811 E or a pigmented matt sealer like PU 881 can be applied.

#### System O2 KLB Balcony Decor PU Outdoor

- Prepare the substrate such as concrete, cement screed or similar mechanically, e.g. with shot blasting. Then vacuum off thoroughly.
- Apply the **EP 52 RAPID** primer, consumption approx. 0.3 0.4 kg/m<sup>2</sup>.
- Optionally: scratch coat made of EP 52 RAPID and mixed sand KLB-Mischand 3/1 in a mixing ratio of 1:1 parts by weight, consumption approx. 0.6 - 1.0 kg/m².
- Scatter the primer or scratch coat openly using quartz sand 0.3/0.8 mm, consumption approx. 0.5 - 1.0 kg/m².
- Apply the flexible intermediate layer BS 570 WP filled with 30% of quartz sand 0.1/0.3 mm using the toothed trowel Toothed Blade RS4 or Pajarito 48, consumption approx. 2.6 - 3.0 kg/m².
- Scatter the entire surface using quartz sand with a grain size of 0.3/0.8 mm, consumption approx. 5 - 6 kg/m². Remove excess sand after curing, brush off loose grains and thoroughly vacuum off the entire surface.
- Apply the scattering layer BS 575 Top filled with 10% of mixed sand KLB-Mischsand 3/1 or 20% of quartz sand 0.1/0.3 mm using the rubber squeegee or trowel and uniformly distribute it in crosswise motion with a velour roller, consumption approx. 1.1 1.3 kg/m².
- Scatter the surface entirely with coloured quartz sand CQS-46xx consumption approx. 3 - 4 kg/m².
- Carefully remove the quartz sand excess with an appropriate vacuum cleaner. The surface should only be walked on by the coating installer, wearing clean, light-coloured shoes and clean clothing.
- Apply the non-yellowing PU 484 top sealer, consumption approx. 0.5 0.8 kg/m<sup>2</sup> using a hard rubber wiper, then uniformly distribute it in crosswise motion with a velour roller.
- Optionally, a matt sealer with PU 880 or PU 811 E can be applied.

#### **Substrate**

The substrate to be sealed must be free from all kinds of soiling. The product is usually used on surfaces scattered with quartz sand. Excess sand must be swept off, brushed off or vacuumed up so that no loose grains are left.

### The following generally applies for coating systems:

The substrate to be coated must be even, dry, free of dust, sufficiently resistant to tension and compression as well as be free from weakly-bonded components or surfaces. Materials impairing adhesion such as grease, oil, and paint residues should be removed with suitable measures. Observe the information issued by the trade associations, e.g. the current version of the KH-0/U, KH-0/S BEB worksheets as well as the notes in the product information of the recommended primer **EP 52 RAPID**. The substrates to be coated should be prepared mechanically, preferably by shot blasting. The prepared area must be saturated, pore-free and primed carefully. If the substrate has not been primed to be pore-free, bubbles and

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pores can develop in the coating due to air rising from the substrate. In case of doubt, we recommend testing on a trial surface. The surface can be scattered with approx.  $0.5 - 1.0 \text{ kg/m}^2$  of quartz sand 0.3/0.8 mm in order to improve adhesion.

#### Mixing

Combo-packaging will be supplied in the correctly measured mixing ratio. The package of Component A has sufficient volume for the entire packaging unit. Empty all of the hardener compound B into the resin component A. Blend with a slow speed mixer (200 - 400 r/pm) for at least 2 - 3 minutes until a homogeneous, streak-free compound forms. To prevent mixing errors, empty ("repot") the entire resin/hardener mixture into a clean container and mix it once again briefly.

Processing must take place immediately after mixing!

Addition of quartz sands or mixed sand 3/1: after components A and B have been mixed. Suitable is fire-dried quartz sand with a grain size of 0.1/0.3 mm or mixed sand KLB-Mischsand 3/1.

#### **Processing**

Scattering layer for CQS coverings: processing of the coating made of BS 575 Top and approx. 10% of mixed sand KLB-Mischsand 3/1 or 20% of quartz sand 0.3/0.8 mm is carried out immediately after mixing with a rubber squeegee or trowel by pulling out an even layer on the prepared substrate. The product is adjusted for optimum deaeration, however, rolling with a spiked roller is recommended to improve the wetting of the substrate, to optimise levelling and to remove remaining air bubbles. This should be carried out time-delayed after 5 minutes at the latest. In order to work seamlessly, always work "fresh-in-fresh" and define work areas before starting.

For reasons of deaeration, do not scatter too early with **CQS-46xx**; the optimum time is at 20 °C / 68 °F after 10 - 15 minutes. The product hardens quickly on the surface, especially in high humidity. Scatter with sand until the area is completely covered. Scattering too late may cause an uneven surface with bald spots to appear later on. The surface should only be walked on by the coating installer, wearing clean, light-coloured shoes and clean clothing; the vacuum cleaner should also be chosen accordingly to avoid stains or streaks. Protect scattered surfaces from rain!

**Top sealer for plain-coloured scattered coverings:** for scattered coatings, after the base coat has cured, remove any excess sand from the surface by sweeping and vacuuming until no more quartz grains loosen. The top sealer **BS 575 Top** is then applied as soon as all preliminary works have been completed and the working areas divided. The material is already sufficiently resistant to light rain after 4 to 6 hours at 20 °C / 68 °F.

The sealer is applied immediately after mixing. Watch out for rapid hardening, especially at higher relative humidities, and adapt your working method accordingly. Depending on the desired material quantity, the compound is then distributed with a smooth rubber trowel, foam rubber wiper, Kaup or steel trowel by evenly pulling it over the scattered surface. Ensure uniform application and avoid ponding. Rigid scrapers create smoother covering surfaces, while soft trowels create rougher surfaces. Slip resistance requirements must comply with the recommended consumption levels for the respective R class. Please seek advice from KLB Technical Sales Service if required.

To ensure an even distribution on the surface and to avoid balding and traces of build-up, the surface must be gone over with a roller immediately after application and the sealer must be distributed evenly. To avoid hardening, always work "fresh-infresh" and change rollers early after 20 - 30 minutes.

Floor and air temperature must not fall below 10 °C / 50 °F and humidity should not exceed 75 %. The floor temperature must be 3 °C / 5.4 °F above the dew point so as not to impede the curing process. If a dew-point situation arises, regular curing will not be possible with hardening problems and discoloration to occur (whitening, etc.). Do not work in strong sunlight or on strongly heated surfaces as this considerably

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shortens the processing time and possibly creates bubbling. When fresh, polyurethane coatings are sensitive to moisture, so it is essential to comply with the humidity specifications. Coating dew-damp substrates, using damp sand as well as perspiration lead to material foaming or hardening problems and must be avoided. Exposure to water should be avoided during the first 5-10 hours. The specified curing times apply for 20 °C / 68 °F; temperatures below this require longer processing and curing times, while higher temperatures require shorter times. If working conditions are not complied with, the technical properties of the end product may deviate from those specified. Exposure to water and chemicals should be avoided during the first 7 days.

<u>Special remarks:</u> coloured products should always belong to the same batch and be used on the same surface, as slight colour deviations in different batches cannot be excluded due to the raw material. The batch number is indicated on the container labels.

#### Cleaning

To remove fresh contamination and to clean tools, use **VR 28** or **VR 33** immediately. Hardened material can only be removed mechanically.

Separate cleaning and care recommendations are available for cleaning floors produced with KLB coatings and sealers.

#### Storage

Store in dry and if possible, at frost-free conditions. Ideal storage temperature is between 10 - 20  $^{\circ}$ C / 50 - 68  $^{\circ}$ F. Bring to a suitable processing temperature before application. Tightly re-seal opened packages and use up the content as soon as possible. Material can only be stored for a limited period. Opened containers harden within a few days.

# Special remarks

The product is regulated by the German Ordinance on Hazardous Substances (GefStoffV), the German Ordinance on Industrial Safety and Health (BetrSichV), and transport regulations for hazardous goods. The necessary information is contained in the DIN Safety Data Sheet. Observe all identification information on the container label! VOC content labelling: (EU Regulation 2004/42) Maximum Permissible Value 500 g/l (2010,II,j/lb): Ready-for-use product contains < 500 g/l VOC.

GISCODE: PU10

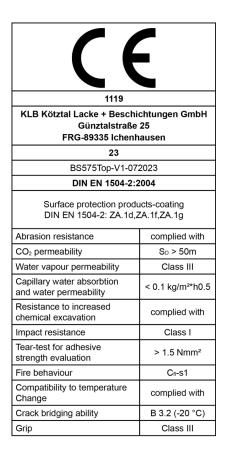
#### **Indication of VOC-content:**

(EG-Regulation 2004/42) Maximum Permissible Value 500 g/l (2010,II,j/lb): Readyfor-use product contains < 500 g/l VOC.

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#### **CE** marking





Please consider the latest version of this product information on our website.

All stated information is based on our experience and technical preparation. We guarantee the correct and proper quality of our products. We do not assume any responsibility for the work not carried out by us, since we have no influence on the processing or processing conditions. We recommend on-site trials to be conducted in individual cases. With the publication of this new KLB product information, all prior information loses validity. The latest version is available electronically on our website <a href="https://www.klb-koetztal.com">www.klb-koetztal.com</a>. In addition, our "General Terms and Conditions" apply.



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