

PU FLEX MATT TOPCOAT 2K

Aliphatic Elastomeric Polyurethane Matte Topcoat

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DESCRIPTION

Elastomeric polyurethane-based low viscosity, colored, solvent-containing aliphatic matte topcoat paint.

APPLICATION AREAS

- Used as an elastomeric matte UV-resistant topcoat for sports surfaces such as fitness areas, children's play areas, basketball, volleyball, handball courts,
- Applied as a topcoat for athletic tracks and walking paths.
- Safe to use for repair or renovation of existing polyurethane-coated sports surfaces.

ADVANTAGES

- High elasticity, durability, and tear resistance.
- Easy application due to long gel time.
- Excellent adhesion as the final coat material for L'unicflex systems.
- High resistance to moisture and optimal curing time.
- High UV resistance providing an aesthetic appearance to the surface.
- Can be safely applied on sports surfaces in all weather conditions.
- When fully cured, it offers excellent mechanical strength and is resistant to water, sea water, wastewater, certain alkaline environments, diluted acids, mineral oils, and fuels.

Colors: RAL 2008, RAL 6000, RAL 3020, RAL 6011, RAL 6032, RAL 1013, RAL 5012, RAL 5015, RAL 5024, Oxide Red, White, and Black.

Special colors are available based on laboratory approvals, minimum production quantities, delivery times for production, and additional costs. For special color requests, please contact the BOYTEM TECHNICAL SERVICE DEPARTMENT.

PRODUCT DATAS (at 20°C)

Specific Weight (approx.)	1.42 gr/cm ³ DIN 5317
Solid Content (% by weight)	57
Viscosity	1300 gm
Gel Time	6-8 h
Theoretical Consumption	0.130 kg/m ² at 40 microns dry film thickness (1 Coat)
Intercoat Waiting Time	24 hours
Touch Dry	2-4 h
Full Drying	16-24 h
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Full Curing	7 days

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SURFACE PREPARATION BEFORE APPLICATION

PU Flex Matt Topcoat 2K is applied after the PU Elastic SL 2K application begins to cure. There is no need for any primer before application. The surface to which PU Flex Mat Topcoat 2K will be applied must be dry and clean. If more than 48 hours have passed since the PU Elastic SL 2K application, UNIPU 060 1K must be applied to enhance intercoat adhesion.

PU FLEX MATT TOPCOAT 2K APPLICATION

PU Flex Matt Topcoat 2K is a ready-to-use product for application. The optimal working temperature range is 15-25°C. Component A is opened in its packaging, Component B (Hardener) is added on top, and the two components are mixed homogeneously at recommended mixing ratios for 2-3 minutes using a slow-speed mixer at 300 revolutions per minute. This mixture is then transferred to another dry and clean container and mixed for an additional minute. Throughout the mixing process, attention should be paid to ensure that the mixing apparatus reaches the sides and bottom of the container.

The homogenized product is applied in two coats at a consumption rate of 0.130 kg/m² for each layer on a surface previously applied with PU Elastic SL 2K, using an airless/air-assisted gun or a short nap roller. In roller applications, if passing over the paint film a second time, quick action is advised. Although the volatile components of the product evaporate late, for a clean finish without roller marks, it is recommended to use a fresh roller immediately over the applied paint.

During the initial 12-hour period after application, the surface should be protected from direct water contact to prevent potential foam or cratering issues from water exposure. Avoid applying the product when surfaces are expected to be exposed to rain under atmospheric conditions.

In low temperature and humidity, the reaction rate decreases leading to an extended gel time and curing time. This should be considered for subsequent coat applications. At higher temperatures, the reaction rate increases, so necessary preparations should be made to ensure a swift application process.

If necessary, the product can be thinned with UP-002 Thinner solvent at a ratio of 10-15%.

CLEANING

Application tools that can be reused can be cleaned with UNIPU 002. Water- or alcohol-based solvents should not be used as cleaners.

WEATHER CONDITIONS

Avoid applying the product in rainy weather or while it is raining. Similarly, the surface temperature of the application should not be below 10°C or above 50°C.

INDOOR APPLICATION CONDITIONS

High relative humidity and low temperatures in enclosed space applications can extend the drying time of the coating.

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MIXING RATIOS

PU FLEX MATT TOPCOAT 2K Component A: 3.750 kg or 16 kg

PU FLEX MATT TOPCOAT 2K Component B: 1.250 kg or 4 kg

CONSUMPTION

Theoretical consumption: 0.130 kg/m² per coat (Depending on surface porosity and permeability). Do not apply the material at temperatures below 14°C or above 35°C.

IMPORTANT NOTE

Consumption rates may vary based on surface porosity, ambient temperature, and application technique.

SURFACE PREPARATION

The surface to be coated must be sound, dry, smooth, free from rubber residues that could weaken adhesion, oil, paint, and other contaminants. If more than 72 hours have elapsed since the PU Elastic SL 2K application, the surface should be mechanically abraded.

For old polyurethane-coated surfaces undergoing refurbishment or repair, an adhesion test must be conducted before application. Surfaces with worn-out paint and coatings can be coated with PU Flex Matt Topcoat 2K after mechanical abrasion and cleaning. The surface to be coated must have a temperature at least 3°C above the current dew point.

STORAGE

The product should be stored in its original sealed packaging, unopened, in dry conditions within a temperature range of 10-35°C and protected from freezing. The shelf life of the product is 6 months from the production date when stored in cool and dry environments.

SAFETY

PU Flex Matt Topcoat 2K in its cured state is not classified as hazardous and does not contain harmful components such as formaldehyde, asbestos, or mercury. For more detailed information, refer to the Material Safety Data Sheet.

Note

The explanations provided in this technical data sheet are based on test evaluations and results according to relevant standards with the intention of guiding applicators. Since factors such as workmanship, weather conditions, construction, equipment used, and other variables that may affect the outcome are beyond our control, UNICA does not provide any explicit or implied warranties concerning this material. UNICA solely guarantees that the material conforms to its product specifications, and its sole responsibility towards the buyer or user is limited only to the replacement value of the product in case of manufacturing defects. Under no circumstances is UNICA liable for any direct or incidental, special, or consequential injury, loss, or damage arising from the use of the material or work performed. The manufacturer is in no way responsible for any defects, alterations, or changes in the substrate to which the products are applied.