

PRODUCT DATA SHEET

Sikafloor®-29 PurCem® (AE)

HIGH STRENGTH, WATER-BASED POLYURETHANE HYBRID COVING AND DETAILING MORTAR AND COATING

DESCRIPTION

Sikafloor®-29 PurCem® is a multi-component, polyurethane hybrid mortar. It has high impact and mechanical resistance, good resistance against chemicals and wear. It is typically installed at 3 - 9 mm thickness. Suitable for use in hot and tropical climatic conditions.

USES

Sikafloor®-29 PurCem® (AE) may only be used by experienced professionals.
Sikafloor®-29 PurCem® (AE) is used as a coving mortar, detailing and vertical rendering with Sikafloor® PurCem® floor systems.

CHARACTERISTICS / ADVANTAGES

- Good wear resistance
- High mechanical and impact resistance
- High softening point
- Good chemical resistance
- Non tainting / odourless
- Fast curing
- Can be applied to substrates with high moisture content (7 days old or mature damp concrete)

SUSTAINABILITY

USGBC LEED® Rating. Confirms Section FQ (Indoor Environment Quality), Credit 4.2 Low Emitting Materials Paints and Coatings (VOC content ≤ 50 g/l).

PRODUCT INFORMATION

Composition	Water-based polyurethane cement hybrid	
Packaging	Part A	1.50 kg plastic drum
	Part B	1.40 kg plastic drum
	Part C	17.3 kg paper bags
	Part D	1.80 kg plastic pouch
	Part A + B + C + D	22.0 kg ready to mix units
Appearance / Colour	Part A	White liquid
	Part B	Brown liquid
	Part C	White powder
	Part D	Pigment
Shelf life	Part A	12 months from date of production. Protect from freezing
	Part B	12 months from date of production. Protect from freezing
	Part C	6 months from date of production. Must be protected from humidity
	Part D	12 months from date of production. Protect from freezing

Storage conditions The package must be stored properly in original, unopened and undamaged sealed packaging, in dry conditions at temperatures between +5 °C and +30 °C. Protect from direct sunlight, heat and moisture.

Density Mixed A + B + C + D: ~1.97 kg/l (+20 °C)

TECHNICAL INFORMATION

Shore D Hardness ~80 - 85 (ASTM D 2240)

Compressive Strength $\geq 25 \text{ N/mm}^2$ (28 d / +23 °C / 50 % r.h.) (BS EN 13892-2)

Tensile Adhesion Strength Concrete failure (EN 1542)

SYSTEMS

Systems As a coving mortar and render mortar in Sikafloor® PurCem® applications.

APPLICATION INFORMATION

Mixing Ratio Part A : B : C : D = 1 : 0.93 : 11.5 : 1.2 (packaging size = 1.5 : 1.4 : 17.3 : 1.8) by weight. Mix full units only.

Ambient Air Temperature +10 °C min. / +40 °C max.

Consumption ~2.0 kg/m²/mm

Layer Thickness 3 - 9 mm

Relative Air Humidity 85 % max.

Dew Point Beware of condensation!
The substrate and uncured floor must be at least 3 °C above dew point to reduce the risk of condensation or blooming on the floor finish.

Substrate Temperature +10 °C min. / +40 °C max.

Substrate Moisture Content Can be installed on substrates with higher moisture content. No ponding water. Check rising moisture. The substrate needs to be visibly dry and have adequate pull-off strength min 1.5 N/mm².

Pot Life	Temperature	Time
	+10 °C	~35 - 40 min
+20 °C	~22 - 25 min	
+30 °C	~15 - 18 min	
+35 °C	~12 - 15 min	

Curing Time Before overcoating Sikafloor®-29 PurCem® (AE) allow:

Substrate temperature	Minimum	Maximum
+10 °C	20 h	72 h
+20 °C	10 h	48 h
+30 °C	5 h	24 h
+35 °C	5 h	24

Times are approximate and will be affected by changing ambient and substrate conditions, particularly temperature and relative humidity.

APPLICATION INSTRUCTIONS

SUBSTRATE QUALITY / PRE-TREATMENT

The surface must be clean, rough, dry and free of all contaminants such as dirt, oil, grease, coatings and surface treatments, etc. All dust, loose and friable material must be completely removed from all surfaces before application of the product, preferably by vacuum. Pull of strength shall not be less than 1.5 N/mm².

If in doubt apply a test area first.

MIXING

Premix Part A with a low speed electric stirrer and then add Part B and mix for 30 seconds. For the colourpack version, premix Part A neutral with a low speed electric stirrer and add Part D to it. Mix until a uniform colour is achieved. Add Part B and mix for 30 seconds.

Use a double paddle (axis) mixer and gradually add Part C (aggregate) to the mixed resin. Allow Part C to blend for further 2 minutes minimum, to ensure complete mixing and a uniform moist mix is obtained. During the operations, scrape down the sides and bottom of the container with a flat or straight edge trowel at least once (Parts A + B + C + D) to ensure complete mixing.

Mixing Tools

Use a low speed electric stirrer (300 - 400 rpm) for mixing parts A and B. For preparation of the mortar mix use a double paddle mixer.

APPLICATION

Apply the mixed Sikafloor®-29 PurCem® (AE) onto the ready primed substrate and compact to the appropriate thickness, then finish the detailing profile with a coving trowel or steel float. Apply Sikafloor®-29 PurCem® (AE) while the primer is still tacky. If the primer becomes tack free, reapply the primer.

CLEANING OF EQUIPMENT

Clean all tools and application equipment with Thinner C immediately after use. Hardened/cured material can only be mechanically removed.

IMPORTANT CONSIDERATIONS

- Do not apply to PCC (polymer modified cement mortars) that may expand due to moisture when sealed with an impervious resin.
- Always ensure good ventilation when using Sikafloor®-29 PurCem® (AE) in a confined space, to prevent excessive ambient humidity.
- Freshly applied Sikafloor®-29 PurCem® (AE), must be protected from damp, condensation and direct water contact (rain) for at least 24 hours.
- Protect the substrate during application from condensation from pipes or any overhead leaks.
- Do not apply to cracked or unsound substrates.
- Always allow a minimum of 48 hours after product application prior to placing into service in proximity with food stuffs.
- Products of the Sikafloor® PurCem® product range are subject to discolouration when exposed to UV radiation
- Extend depends on colour. There are no measurable losses of any properties when this occurs and it is a purely aesthetical matter. Products can be used outside provided the change in appearance is acceptable by the customer.

- In some slow curing conditions, soiling of the surface may occur when opened to foot traffic, even though mechanical properties have been achieved. It is advised to remove dirt using a dry mop or cloth. Avoid scrubbing with water for the first three days.

BASIS OF PRODUCT DATA

All technical data stated in this Data Sheet are based on laboratory tests. Actual measured data may vary due to circumstances beyond our control.

LOCAL RESTRICTIONS

Note that as a result of specific local regulations the declared data and recommended uses for this product may vary from country to country. Consult the local Product Data Sheet for the exact product data and uses.

ECOLOGY, HEALTH AND SAFETY

For information and advice on the safe handling, storage and disposal of chemical products, users shall refer to the most recent Safety Data Sheet (SDS) containing physical, ecological, toxicological and other safety-related data.

LEGAL NOTES

The information, and, in particular, the recommendations relating to the application and end-use of Sika products, are given in good faith based on Sika's current knowledge and experience of the products when properly stored, handled and applied under normal conditions in accordance with Sika's recommendations. In practice, the differences in materials, substrates and actual site conditions are such that no warranty in respect of merchantability or of fitness for a particular purpose, nor any liability arising out of any legal relationship whatsoever, can be inferred either from this information, or from any written recommendations, or from any other advice offered. The user of the product must test the product's suitability for the intended application and purpose. Sika reserves the right to change the properties of its products. The proprietary rights of third parties must be observed. All orders are accepted subject to our current terms of sale and delivery. Users must always refer to the most recent issue of the local Product Data Sheet for the product concerned, copies of which will be supplied on request.

SIKA SOUTHERN GULF

UAE / Oman / SIC
Tel: +971 4 439 8200
info@ae.sika.com
gcc.sika.com

SIKA NORTHERN GULF

Bahrain / Qatar / Kuwait
Tel: +973 177 38188
sika.gulf@bh.sika.com
gcc.sika.com

SIKA SAUDI ARABIA

Riyadh / Jeddah / Damman
Tel: +966 11 217 6532
info@sa.sika.com
gcc.sika.com



ISO 9001: Sika UAE LLC,
Sika Gulf B.S.C. (c),
Sika Saudi Arabia Co. Ltd,
Sika Qatar LLC
ISO 14001: Sika UAE LLC,
Sika Gulf B.S.C. (c),
Sika Saudi Arabia Co. Ltd
OHSAS: Sika UAE LLC,
Sika Gulf B.S.C. (c)

All products are supplied
under a management
system certified to conform
to the requirements of the
quality, environmental and
occupational health &
safety standards ISO 9001,
ISO 14001 and OHSAS
18001.

Product Data Sheet
Sikafloor®-29 PurCem® (AE)
June 2018, Version 01.01
020814020020000037

Sikafloor-29PurCemAE-en-AE-(06-2018)-1-1.pdf

