28 June 2024

SMX-20 PLUS

Technical Data

Basis	SMX® Hybrid Polymer		
Consistency	Stable paste		
Curing system	Chemical curing		
Adjustable until	Approx. 25-20 minutes		
Open time (23 °C, 55 % RH)*	Approx. 25-20 minutes		
Density	Ca. 1.73 g/mL		
Can be loaded after*	Minimum 8 hours		
Sandable / Paintable after	Minimum 24 hours		
Resistance against aging	Good		
Consumption*	Trowel B3 Trowel B11	: :	700 – 900 g/m² 900 – 1200 g/m²
Temperature resistance**	-40 °C → 90 °C		
Application temperature	15 °C → 25 °C		

* These values may vary depending on environmental factors such as temperature, moisture, and type of substrates.

** This information relates to fully cured product

Product description

SMX-20 Plus is a solvent, and water-free universal timber flooring adhesive. Suitable for bonding engineered and various type of solid timber flooring with tongue and groove onto suitable indoor subfloors.

SMX-20 Plus contains no water or solvents, minimising the risk of deforming the timber flooring to a minimum. It is a chemical curing adhesive that forms an elastic layer which is resistant to moisture and heat.

SMX-20 Plus meets Timber Flooring Adhesive to ISO 17178:2013 – 4.4.

It is based on the unique SMX® Hybrid Polymer technology developed by Soudal.

Properties

- Flexible
- EC-1 Plus label: very low emission
- 1-component system ready for use
- Solvent free
- Contains no water
- Free of isocyanate
- Easy application
- Suitable for underfloor heating
- Suitable for subfloor heating
- Remains permanently elastic

Applications

- SMX-20 Plus is a timber flooring adhesive suitable for bonding of both engineered and solid timber flooring with tongue and groove.
- Solid timber flooring with a maximum width of 160mm and a minimal thickness of 14mm.
- Engineered timber flooring with a maximum width of 240mm and a minimal thickness of 14mm.

Packaging

Colour: light brown
Packaging: 600 mL sausage, 16lg bucket, 18 kg bucket (3 alu-bags)

Shelf life

12 months in original, unopened packaging in a cool and dry storage place with temperature between +5°C and +25°C.

Substrates

Substrate: Suitable for use on porous and non-porous substrates such as concrete, screeds, particle board, etc.
Nature: rigid, clean, dry, free of dust, grease, loose materials, paint and other contaminants.
Surface preparation: Irregularities such as remaining concrete leveling, old adhesives may adversely affect adhesion. These need preferably to be removed

SMX-20 PLUS

mechanically for example by sanding or blasting. The top layer of anhydrite subfloors has to be removed.

Before installation of the timber flooring, the substrate should be checked to ensure it is suitable. Check the moisture content throughout the entire thickness of the substrate with a carbide or electric hygrometer. Note that an electric hygrometer only gives indicative values.

For application on concrete subfloors a moisture content up to 6% or 95% RH without the use of a moisture barrier.

The moisture content must correspond the recommendation of the floor manufacturer (generally max. 2% for sand cement substrates and max. 0.5% for anhydrite, measured with a carbide hygrometer. For substrates with underfloor heating the values are resp. max. 1.5% and 0.3%).

The timber flooring must be acclimatised for several days in the area where it is to be installed. Leave the timber floor in its original packaging until installation to avoid any deformation. Check before installation that the moisture content of the wood is as recommended by the supplier, (generally 9% +/- 2%). If the humidity of the timber is more than 11%, installation is not recommended.

Allow a gap of 1 to 1.5 cm around the perimeter of the laid timber flooring, including any columns or structures, which penetrate the floor.

When installing a timber flooring floor on top of marble, terrazzo or ceramic tiles they must be first cleaned with caustic soda or another suitable cleaner. Once cleaned, rinse the tiles thoroughly with plenty of clean water. Ensure the floor is completely dry before applying the SMX-20 Plus.

Not suitable for PE, PP, PTFE (eg. Teflon®), bituminous substrates. We recommend a preliminary adhesion and compatibility test on every surface.

Timber Flooring

Timber Flooring Maximum Dimension	Max. Width x Min. Thickness
Solid timber flooring	160mm x 14mm
Engineered flooring	240mm x 14mm

Application method

Refer to the current Technical Data Sheet on our website prior to use.

SMX-20 Plus should be acclimatised to room temperature before installation. Apply the adhesive by means of Soudal notched trowel to the surface. Do not apply more to the surface than can be covered with timber flooring within 30 minutes. Slide the timber flooring onto the adhesive layer and tap into place or tamp down with a rubber hammer.

A minimum of 80% contact coverage is required to ensure the adhesion of the timber flooring. If necessary load the timber flooring with weight. Wait at least 24 hours before sanding and finishing the timber flooring.
Application method: With notched trowel B3 / B11
Cleaning: Clean with Soudal Adhesive Remover or with Soudal **Swipex**, immediately after use.
Cured SMX-20 Plus can only be removed mechanically.
Repair: With the same material.

Health- and Safety Recommendations

Take the usual labour hygiene into account. Consult label and material safety data sheet for more information. Use only in well-ventilated areas.

Remarks

- Minimum temperature of the substrate should be at least 15°C.
- Do not apply the adhesive when the relative humidity is above 75%.
- Never install flooring on a substrate which contains too much moisture or on substrates with a higher humidity value than recommended by the timber supplier.

28 June 2024

SMX-20 PLUS

- Never install wood which is too dry (<7% humidity). It can expand at higher humidity and cause damage.
- Do not install if the walls and ceilings of the area are not dry (e.g. after plastering or painting etc.)
- Do not dilute the adhesive.
- Never apply on a substrate which is not protected against rising damp. If necessary apply a moisture sealer. Contact Soudal for recommendations.

Environmental clauses

Leed regulation:

T-Rex Power Fast Grab conforms to the requirements of LEED. Low –Emitting Materials: Adhesives and Sealants. SCAQMD rule 1168. Complies with USGBC LEED 2009 Credit 4.1: Low-Emitting Materials – Adhesives & Sealants concerning the VOC-content.

Liability

The content of this technical data sheet is the result of tests, monitoring and experience. It is general in nature and does not constitute any liability. It is the responsibility of the user to determine by his own tests whether the product is suitable for the application.