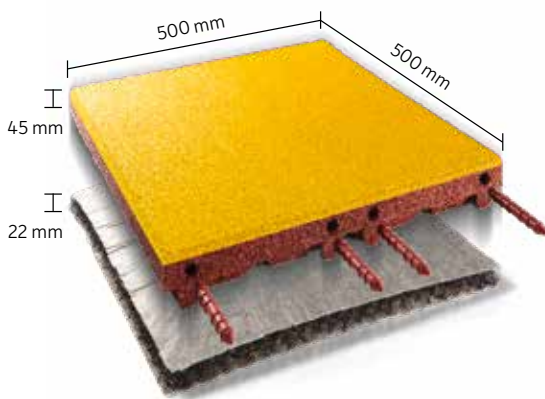




Terrasoft®

EPDM 45 | Safe System



Beautiful play areas can be designed with the Terrasoft EPDM Safe System 45. On a load-bearing layer of pure rubber granulate (1-3,5 mm, linear 2-5 mm, bound and coated with polyurethane) a top layer of PU-bonded EPDM is applied, which ensures bright colours and numerous combination options. The Terrasoft Slab is made exclusively in Germany and has, amongst others, shock absorbent properties (fall height: 2.00 m) for all applications. It is very durable, non-slip and quick-drying.

Moreover, you benefit from the currently most comprehensive overall program on the market: the numerous edge and corner profiles of the Terrasoft EPDM 45 Slab are also available as a Safe System.

ADVANTAGES

- Minimisation of risk of injuries and breakages
- Non-slip even in wet conditions
- permeable to water / fast-drying
- low maintenance
- barrier-free usable

APPLICATION

The Terrasoft Safe System EPDM 45 is available in six colours and can be used in outdoor areas, e.g. under playground equipment or in areas where a unique, colourful surface design is desired. Please observe the maintenance instructions aswell as the care instructions.



bevelled on one side
Item no. 151045yy3



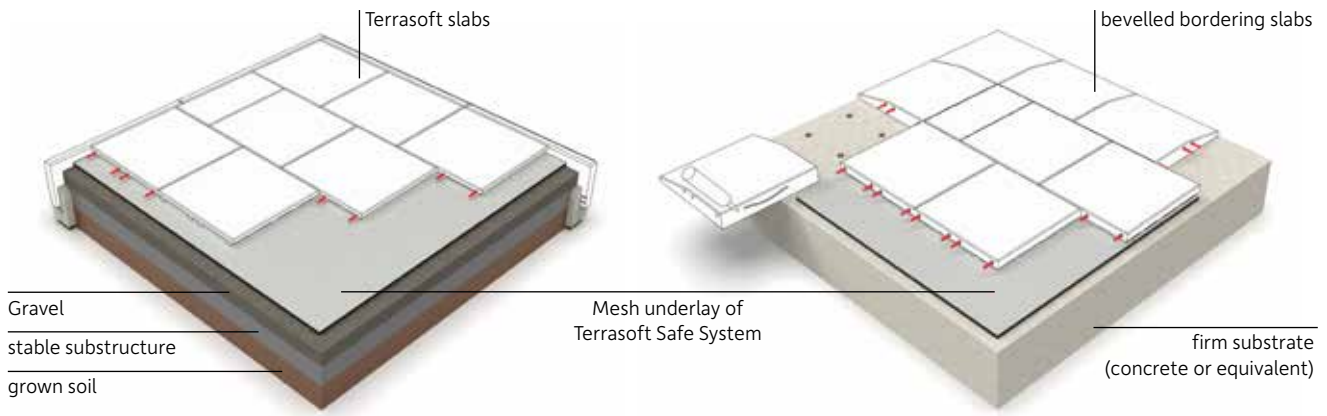
bevelled on two sides
Item no. 151045yy4



bevelled inside
Item no. 151045yy6



half slab
Item no. 151045yy2



The Terrasoft Safe system is positively connected by means of plug-in connectors and laid staggered on the plastic mesh.

INSTALLATION INSTRUCTIONS

Please follow the detailed installation instructions (page 226 ff) and consider the following information.

Dimensional tolerances may occur due to production. These will be compensated within 48 hours after installation. Please note that the final row in the installation plan will only be cut to the required size after the above-mentioned 48 hours have elapsed.

Laying on permeable substrate:

When laying on permeable substrates, we recommend the Terrasoft Edge Fastenings. In general, the panels are to be laid staggered by means of system plugs. A stable and frost-resistant substructure must be ensured.

Laying on firm substrate:

Bevelled edge panels are integrated staggered on solid surfaces and glued in addition. Additionally, a selective glueing of the individual slabs is recommended.

MAINTENANCE INSTRUCTIONS

Terrasoft flooring systems are non-hazardous in terms of the norm. The operator has to ensure a regular inspection of the area.

Visual inspection: weekly visual inspection to detect obvious hazards

Operational inspection: quarterly wear control to check the position and durability of the mounting and connector, elimination of possible tripping points, replacement of the slabs in case of damage or surface abrasion

Main inspection: annual intensive verification of the positional safety and operational safety of the fall protection, control of the strength of the connectors used and the enclosure elements. For inspection of equipment foundations, the slabs can be taken out of the connection and can easily be integrated again with the system plugs after the inspection. Please make sure the synthetic fibre layer is intergrated again in a form-locking way.

Colours



-31y signal-yellow
 -32y signal-green
 -34y signalred
 -30y orange
 -23y blue
 -26y black

Specifications



451015001
 System plugs

Spare parts



4525001x1
 glueing



IMPACT RESISTANT PLAYGROUND SURFACE

Correct implementation of European Standard EN 1176/1177

Playground surfacing systems are required to comply with product safety legislation.

Adherence to the safety requirements contained in this legislation must be verified in the form of a certificate from an approved test body following successful completion of testing. We have provided a simplified and summarized explanation of how to implement this standard for planners and decision makers who decide in favour of surfacing systems.

It may be assumed that the most serious of all probable accident risks occurring in children's playgrounds is that of head injuries. Consequently, priority has been assigned to the creation of a criterion to evaluate the efficiency of floor surfacing systems which minimize this injury potential.

As a consequence, not only test procedures but also criteria for the choice of playground floors are determined which represent the upper limit of capacity to avoid head injuries, applicable for play equipment installed in accordance with EN 1176.

As you have chosen in favour of impact protection systems, you will be aware that six individual certified height measurements exist for different fall heights from 3 m.

The relevant generally applicable certificate is provided overleaf. After selecting the right slab, what is important is the surface area from which use of the playground apparatus begins and which encompasses at least the impact area.

The impact area is the surface on which a user can land after dropping through the falling space.

The following points must be taken into consideration when defining this area:

Up to a free fall height (free fall height=pedestal height, upper rung or upper handle position for hanging apparatus) of 1,5m, an additional falling space length of at least 1.5m must be provided around the apparatus.

With a free fall height of more than 1.5 m the falling space to be protected with the relevant drop protection measures must be calculated as follows:

Required minimum falling space length:	$\frac{\text{free fall height} + 0,75 \text{ m}}{1,5 \text{ m}}$
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TECHNICAL INSPECTION AND MAINTENANCE

Controlling and Maintenance

In order to ensure the safety of the product in a responsible way, the plates installed need to be inspected and maintained in regular intervals. Due to their material quality Terrasoft impact-absorbing plates are designed for a long useful life with short maintenance intervals. Even so, the clear guidelines laid down in DIN EN 1176/1177 are also binding for Terrasoft elastic/safety slabs. To ensure the safety of the impact protection, the installed slabs require regular inspection and maintenance. Due to their high quality, Terrasoft impact protection slabs are designed for a long service life. The clear requirements of DIN EN 1176/1177 are binding for Terrasoft impact protection slabs. The external influence and impact on durability of impact protection qualities is not exactly foreseeable. External influences can be high exposure or high-risk locations regarding vandalism. Furthermore, weather conditions, UV radiation, high frequentation areas (i.e. under swings or seesaws), unregular maintenance etc. can influence the impact protection qualities. Dust loading of the air, locations near the coast with high salt concentration or sand areas nearby can have a negative influence if maintenance is insufficient. With regular maintenance and care, Terrasoft system's impact protection can be expected for up to 10 years. This outperforms the durability of all alternative impact protection systems by far, especially as the costs for maintenance and securing of impact protection are far lower compared to sand, bark mulch or wood chips.

Warning!

Maintenance intervals need to be shortened with high frequentation of the area, high risks of vandalism, extreme weather conditions or locations near the coast. This applies to different locations on play and recreation areas. High frequentation on the impact protection areas i.e. by teenagers, in entrance areas or dirt require respective maintenance intervals. In cases of abrasion i.e. with a punctual frequentation like under some playground equipment, slabs have to be replaced. For replacement or repairing, only spare parts of the manufacturer are to be used. Checking of maintenance intervals and controlling of professional execution of installation and repair works are duty of the operator, who generally is responsible for maintenance. During installation and maintenance work, the area has to be visibly closed for children.

It has to be ensured that the drainage system constantly works. Keep yourself informed about the resulting requirements and duties, like they are at least partly specified in EN 1176/1177.

SURFACE ADHESION

The surface adhesion is mainly for the fixation of solid rubber products.

Preparation of the subsoil

The concrete foundation must be rough, clean and dry. Please pay attention that the glueing areas are free of oil, greases and other residues e.g. colours, rubber abrasion, cement mist etc.

The surface and environment temperature must be at least 8°C resp. at least 3°C above the dew point temperature. Air temperature not higher than 80%.

Adhesion priming

Fill adhesion priming in another pot and apply thinly on the subsoil by rolling or painting.

If necessary, subsequently smooth put to avoid puddles.

The drying depends on the air humidity.

With a high air humidity the drying is delayed. In the drying time, a direct water admission should be avoided.

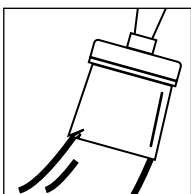
Under certain circumstances, it may be necessary to grind the dried adhesion priming. The grinding dust should be removed thoroughly.

Glueing process

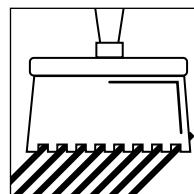
Admit 1.5 kg hardener to 10 kg glueing and mix it at a low rotative speed achieving a mass free of mist.

When glueing rubber on concrete, the glueing mass should be applied and compressed on the concrete surface with a toothed spatula (4 mm).

Please pay attention that the area is not stepped on for 48 hours.



adhesion priming



glueing process

JOINT FILLER

The joint filler is applied when already laid elements should be glued together upon the impact edges. This way, it is not possible to take away single elements.

Processing

With the supplied plastic nozzle, an exact dosage is achieved by simply pressing the middle of the bottle.

Please pay attention that the joint filler remains liquid during the processing period. The joint should not be larger than 3 mm.

Please pay attention that the surface is not stepped on for 48 hours.

CARE INSTRUCTIONS

A regular care of the layed slabs serves the security and increases its attractive appearance and the life span.

- The dust on Terrasoft areas can be swept off with a broom with hard bristles. The can also be cleaned with a high-pressure cleaner. This also removes dirt residues from the porous surface of the slabs.
- Depending on the degree of soiling, a deep cleaning, e.g. be carried out with a high-pressure cleaner.
- Coloured surfaces can be subsequently refined through application of a special spray coating. In the case of EPDM paving slabs, aggressive soiling due to environmental influences can be removed by sanding down the surface.
- Fouling with moss or grass in the joint area can lead to the panels being pushed apart or pushed up. Be sure to remove such growth early.
- Decolourations of the surface can occur through durable remaining ram moisture on the substrates as well as diverse plants in the direct surroundings of the slabs.
- External influences can have an effect on the condition of the surfaces. Weather, UV radiation, dust from the air, sites near the coast with high salinity or sand areas near the impact protection slabs can have a negative effect on lack of care.
- In cases of abrasion slabs have to be replaced