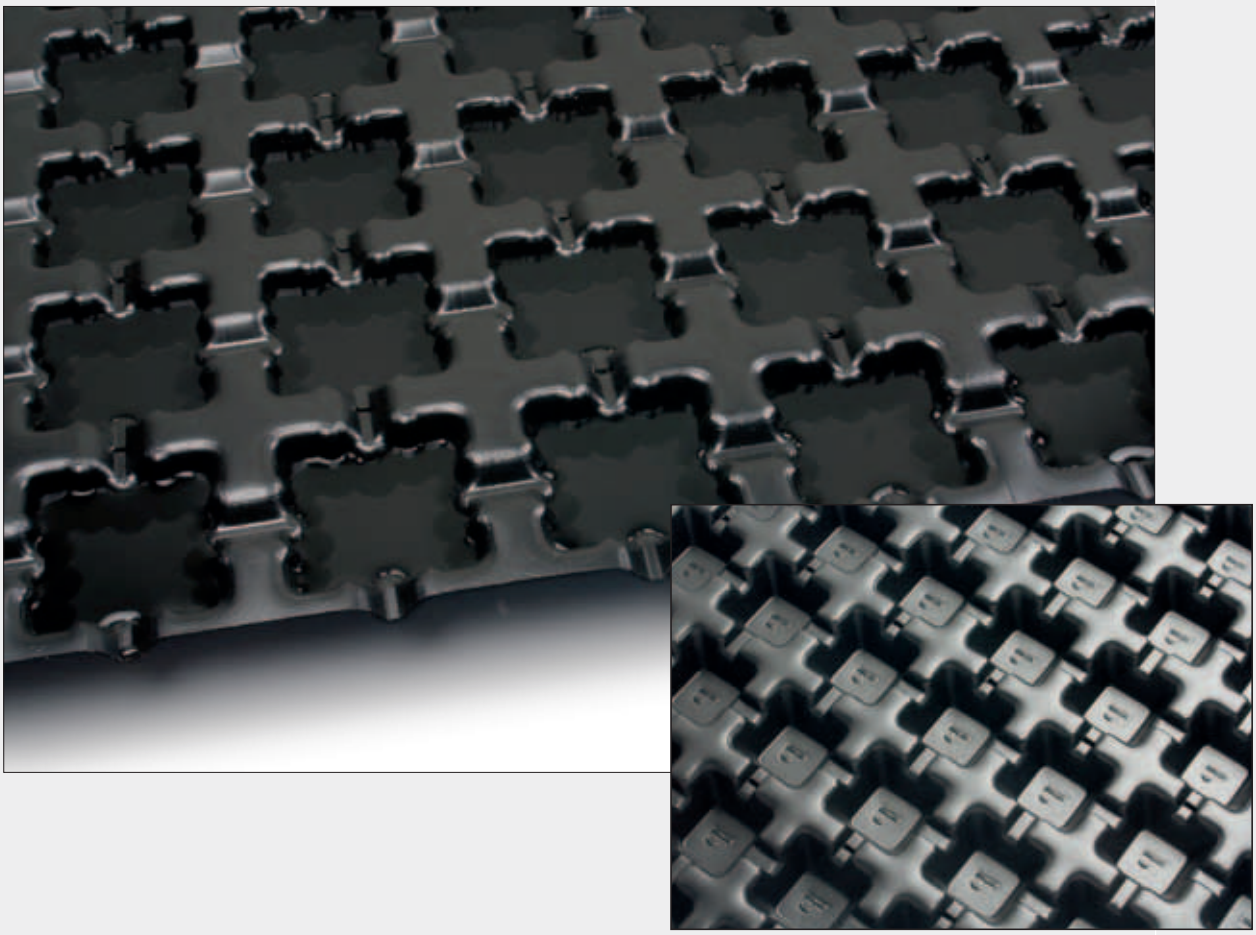
Platon® for Green Areas

Drainage and storage elements



- DE 40/500 – The Storage Giant
- DE 25 – The Universal Product

Dry and healthy buildings

Platon – The Original from the Inventor

Millions of square metres of green roofs

Green roofs have a long tradition in Norway. In the extreme climate, they have continued to show outstanding performance up until the present day.

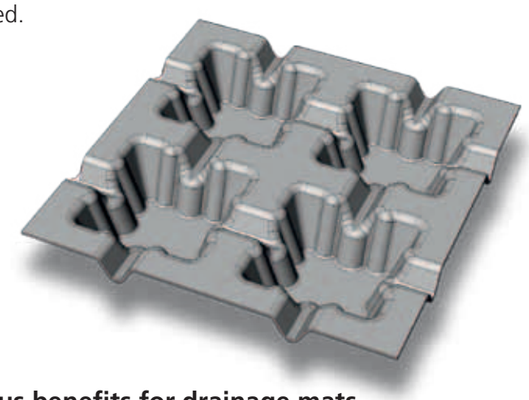
On many green roofs, not just in Scandinavia, the Platon system of studded mats acts as underlay for flat and sloping green roofs. Several million square metres are a positive indication of trust in our products among leading green roof suppliers and installers.

More than 50 years of quality

As the inventor of the studded membrane, Isola can show years of experience with the Platon system. A range of applications for floors, foundations, internal walls and other technical installation, not just in the area of green roofs, prove the reliability and durability of our products.

Valuable raw materials for lasting quality

Isola relies on high quality raw materials in order to achieve a long service life under the strain of climatic influences. Alongside virgin raw materials, internally recycled plastic from on our own production lines is also used.



Obvious benefits for drainage mats

You get all the benefits with a Platon drainage and storage mat from Isola. These solutions have distinct advantages, compared with traditional constructions using bulk materials.

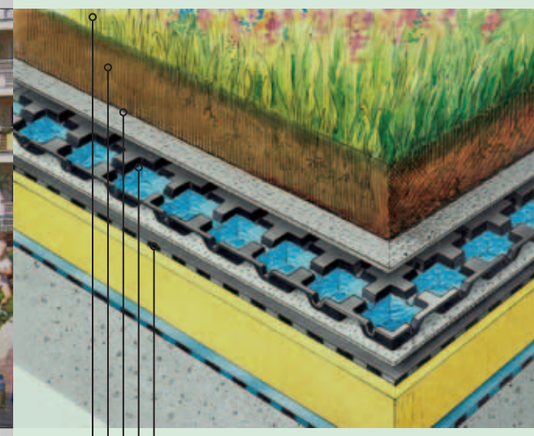
- **Much lighter**
- **Large water storage capacity up to 10 l/m²**
- **The smooth contact surface prevents damage to the roof waterproofing in contrast to sharp edged bulk materials**
- **Drainage and storage mat acts as a separation layer**
- **Less work due to fast and simple laying**

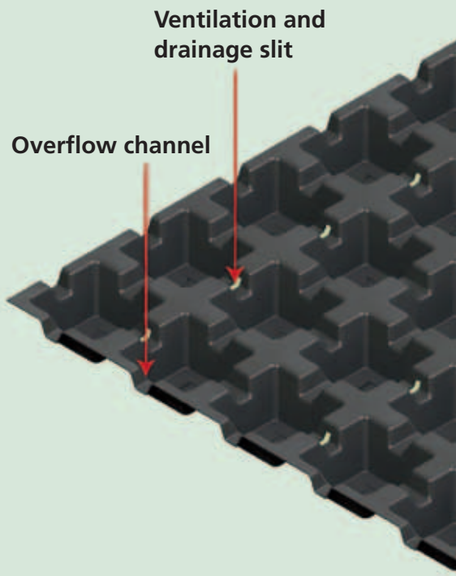
Two different requirements; two perfect solutions

Depending on the general climatic conditions, rainfall and the plants used, the storage requirements and the drainage performance of a green roof can vary greatly. With two storage and drainage mats, Isola offers perfect solutions for safe and compatible green roofs.

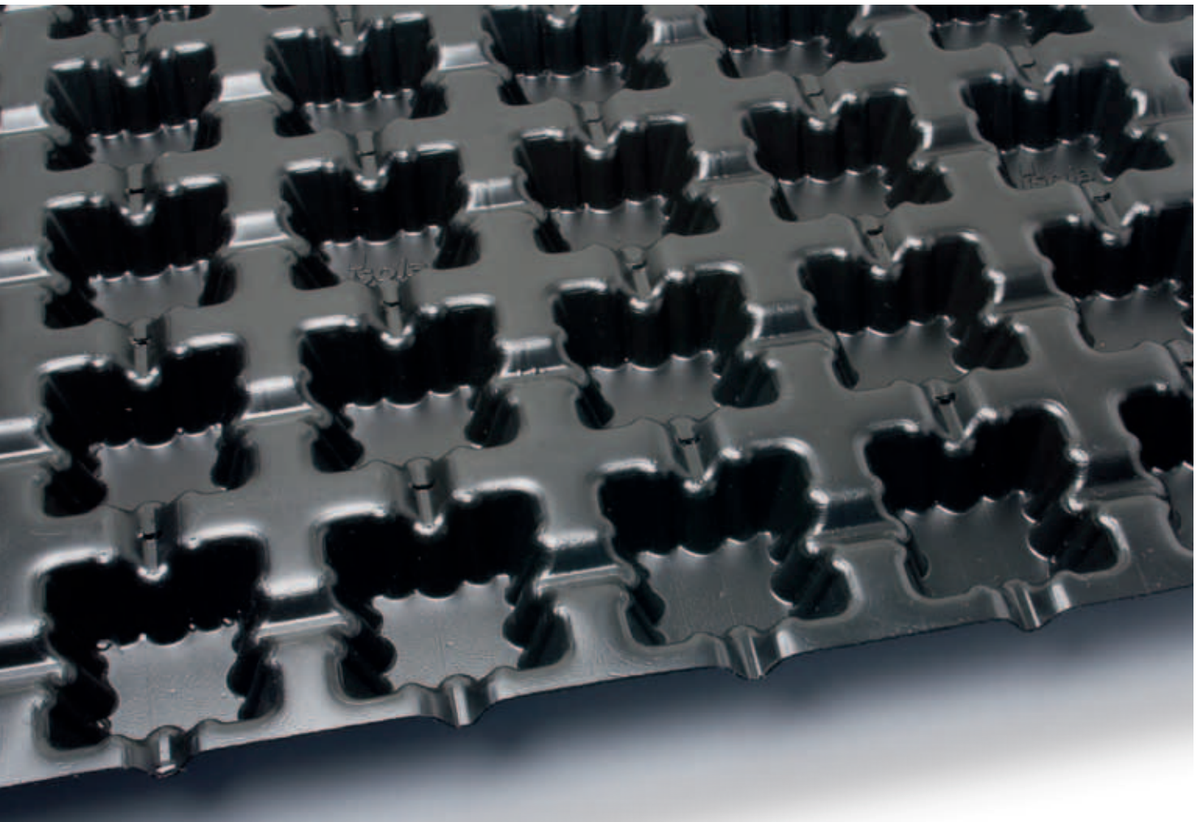
- **Platon DE 40/500 – The storage giant**
- **Platon DE 25 – The universal product**

Typical structure of a green roof





Platon DE 40/500 – The Pressure-Resistant Storage Giant



With a water storage volume of 10 l/m² and a stud height of 40 mm, the Platon DE 40/500 is the storage giant among green roof elements.

Platon DE 40/500 is capable of storing large volumes of water and discharging it over a period of time. The linked chambers ensure the optimal distribution of water and nutrients.

On extensive green roofs, it allows the use of plants with a low level of resistance to dry periods and extends the intervals between necessary watering.

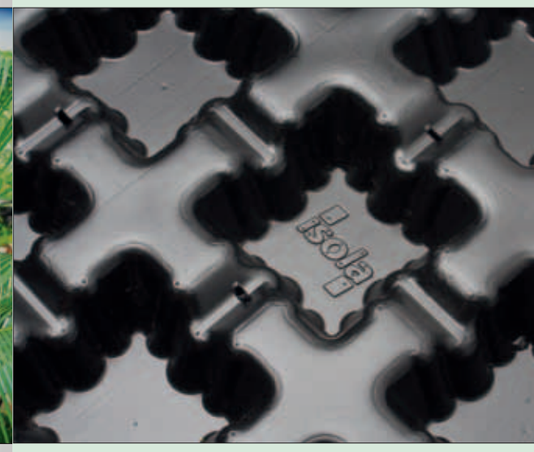
Outstanding drainage performance

On the underside of the mat, studs form a drainage layer that provides high drainage. Excess water may be safely drained without any problems.

With a drainage capacity of 3.85 l/(m·s) at 2% slope, the Platon DE 40/500 is clearly ahead of the competition.

Simple and fast processing

Platon DE 40/500 is supplied in sheets 1.29 x 2.23 m. This size ensures fast and rational installation. The product is packed flat, for easy handling on site.



Effective irrigation

The integrated channels of the DE 40/500 allow simple installation of irrigation systems. The chambers are thereby filled directly, ensuring effective irrigation with less water consumption.

High pressureresistance

Very high pressureresistance and stability is achieved due to the special design of the chambers.

This means that the load is distributed evenly over the whole surface, allowing roof structures with a higher applied loading.

As a permanent form in the construction, the DE 40/500 ensures continuous drainage over the whole roof surface.

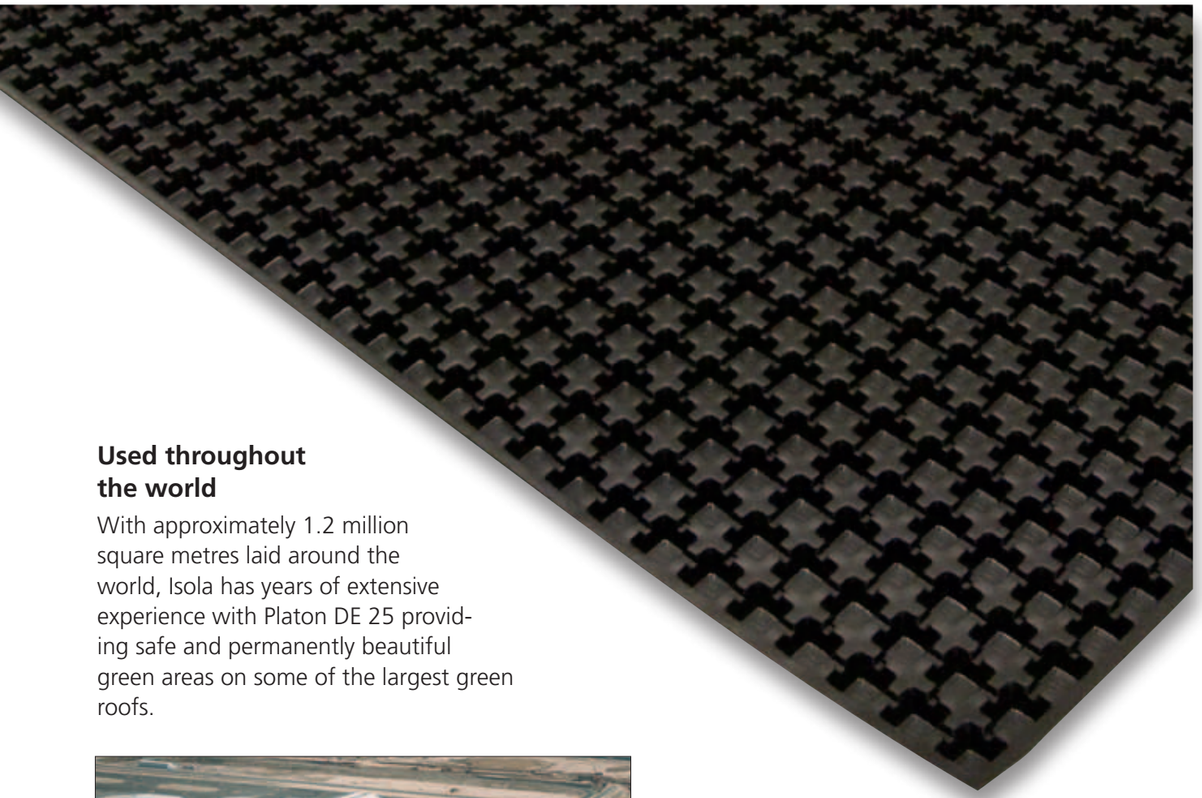
Functions

- **High performance water storage and drainage element**
- **Performs as a permanent form in constructions with foot or light traffic**

Advantages

- **Up to 10 l/m² water storage**
- **High pressureresistance of 615 kN/m² (filled)**
- **Suitable for intensive and extensive green roofs**
- **Free choice of vegetation layer**
- **May be integrated into different systems**
- **Compatible with drinking water**
- **Neutral to the environment**
- **Quick and simple to process**

Platon DE 25 – The Universal Product



Used throughout the world

With approximately 1.2 million square metres laid around the world, Isola has years of extensive experience with Platon DE 25 providing safe and permanently beautiful green areas on some of the largest green roofs.

As a storage and drainage element, Platon DE 25 provides sufficient irrigation to extensive and semi-intensive green roofs while draining excess water away . With a storage capacity of 6.1 l/m², Platon DE 25 represents the perfect solution under normal weather conditions and for plants with an average resistance level to dry periods.

A perfect correlation

Platon DE 25 consists of a network of chambers in which water and soluble nutrients are stored. The integrated channels ensure the even distribution of water over the whole surface area. Excess water is drained away through slits in the mat and over the edges of each sheet, and then along the drainage layer created underneath.

At the same time, the slits in the mat provide ventilation to the root area in the substrate from below.

Simple and safe installation

Platon DE 25 is supplied in sheets 1.33 x 2.22 m. In contrast to rolls, this saves space during transport, but also eases installation. With Platon DE 25 there is no need for flattening out the product.

Functions

- **Water storage and drainage element**

Advantages

- **6.1 l/m² water storage**
- **Suitable for extensive and semi-intensive green roofs**
- **Free choice of vegetation layer**
- **May be integrated into different systems**
- **Compatible with drinking water**
- **Neutral to the environment**
- **Quick and simple to process**

Platon® Green Roof Systems

Technical Data

	DE 25	DE 40/500
Material	HDPE (recycled)	HDPE (recycled)
Stud height	23 mm	40 mm
Material thickness	1 mm nominal	2 mm nominal
Weight	950 g/m^2	1900 g/m^2
Dimensions	1.33 m x 2.22 m	1.29 m x 2.23 m
Max. Pressureresistance (filled)	715 kN/m^2	615 kN/m^2
Max. Pressureresistance (unfilled)	75 kN/m^2	130 kN/m^2
Water storage capacity	6.1 l/m^2	10 l/m^2
Water drainage capacity	1.2 l/sm at 2% slope	3.85 l/sm at 2% slope

Dry and healthy buildings

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