



The inner courtyard of the "Australiëgebouw" with Pitched and Flat Green Roof.

Project Data

Area: ca. 550 m²

Construction Year: 2005

Architect/Design:
DKV architects, Rotterdam

Contractor:
Roosendaal landscaping

Note:
In sub area, roof slope from about 30°

Coordinates:
52°22'33.84"N 4°55'34.86"E

Conception

This green roof project was part of a renovation of the 19th century warehouses located on the waterfront of "Het IJ" in Amsterdam. The old warehouse "Australië" was integrated into a new residential building and on a portion of this new building the green roof was created.

The green roof includes a flat section with trees and lawn and is located approximately 5 meters above ground level. It should be created a connection through

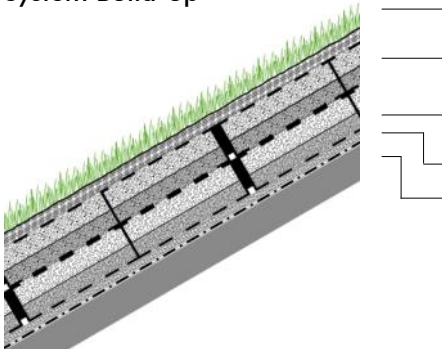
a sloped roof surface, which was also to be planted with grass. Installing lawn on the steep area was a challenge since a supply of nutrients and water must be ensured.

Therefore, two layers of Georaster® were installed to accommodate more substrate. Later after maintaining the lawn on the steep pitched area turned out to be too costly the lawn was exchanged by a low maintenance ground cover planting.



View from the Java island to the former warehouse.

System Build-up



- Plant layer
- 2. Layer Georaster® - infilled with System Substrate "Lawn"
- 1. Layer Georaster® - infilled with Mineral Substrat
- Protection Mat WSM 150
- Roof construction with root resistant waterproofing



The maintenance of the lawn turned out to be costly. Therefore it was exchanged by a low maintenance ground cover planting.



The proposed turf was intended to invisibly connect the pitched roof area to the flat roof area.



Two layers of Georaster® filled with substrate ensure proper supply of water and nutrients for the lawn.



The pitched roof shortly after installation of the turf. Skylights allow for natural daylight inside the building.