



Charles de Gaulle Airport

Textile floor coverings and reconstituted stone for the new departure hall at Paris

A hall “made in France”. This is the new S4 departure hall at the Paris Charles de Gaulle Airport that opened its doors last July after four years of intense work and an investment of 580 million Euros.

The hall is in Terminal 2E and is reserved for long-haul flights and long-range aircraft belonging to Air France and its partners in the Sky Team alliance.

The Parisian airports society ADP (Aéroports de Paris) wanted to create an area to the highest of international standards. Shopping, culture, fine dining and design: the new terminal offers “the best of Paris”. And from the end of 2013, there is also a museum exhibiting works of art on loan from the grand museums of Paris.

Everything has been organised for the well-being of passengers: natural light, a warm ambience, comfortable seats and a view of the aircraft. Thanks to the use of precious materials and natural elements such as trees,

walls covered with plants and walls of water designed by Taro Suzuki, the hall is an invitation to breathe an air of calmness and serenity.

Particularly special care was reserved for the air-conditioning systems, and to prevent energy losses they cool the air at passenger height. More than 16,000 m² of heated flooring have been installed, making the S4 hall the largest area with heated flooring in the whole of France.

A Terminal With High Environmental Quality

In line with the policy of sustainable development promoted by the ADP Group, the entire area has been constructed in compliance with the French protocol HQE (Haute Qualité Environnementale) that certifies the quality of the environment in buildings.

To meet the requirements of the technical specifications, the main contractor France

A FEW FIGURES

PARIS CHARLES DE GAULLE AIRPORT

61
million passengers in one
year (2011)

2nd
largest airport in Europe

7th
busiest airport in the world
for number of passengers

1st
hub in Europe

TERMINAL S4

7,8
million passengers per year

100,000 m²
over four levels

AND ALSO
25,000 m²
of boarding areas

6,000 m²
of shops, bars and restaurants

16
departure gates

4,000
seating places



» *Our technical specifications required products that respect the environment and the health of those who use them. Mapei was the only company able to supply a complete eco-sustainable system, and this was a determining factor in choosing our partner for this project”.*

Joaquim Coelho, Works Director for France Sols for the S4 Terminal project.



OPENING PHOTO. The terminal once work had been completed. The long-haul flights for Air France and partners of the Sky Team alliance depart from here.

ABOVE. Self-laying textile tiles were installed on the floors in the waiting hall using ULTRABOND ECO FIX.

BELOW. A view from above of the new terminal at Paris Charles de Gaulle Airport.

Sols chose eco-compatible products, opting for Mapei systems to prepare the substrates and bond the floor coverings: solvent-free products with very low emission of VOC (Volatile Organic Compounds) certified EC1 Plus by the German institute GEV.

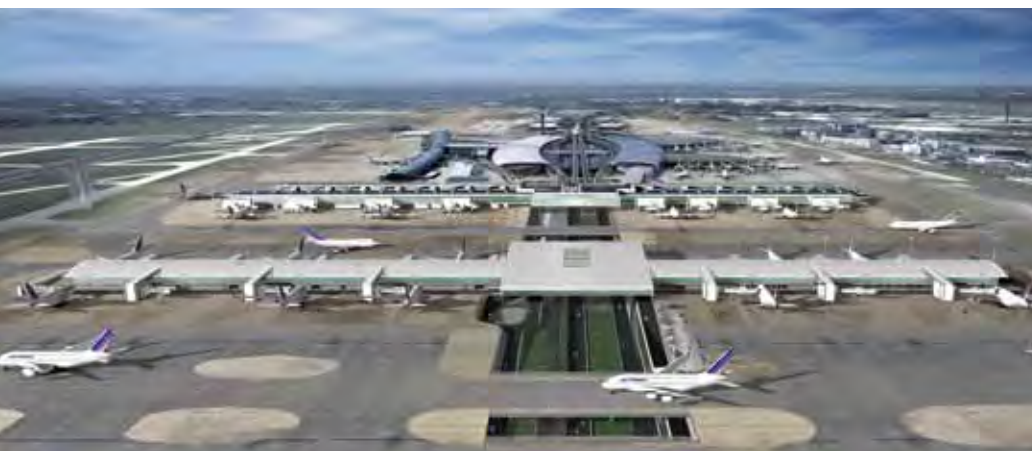
What is more, MAPECEM PRONTO, ULTRA-PLAN MAXI and GRANIRAPID, which were all used on this site, comply with the requirements of the French Building Centre CSTB

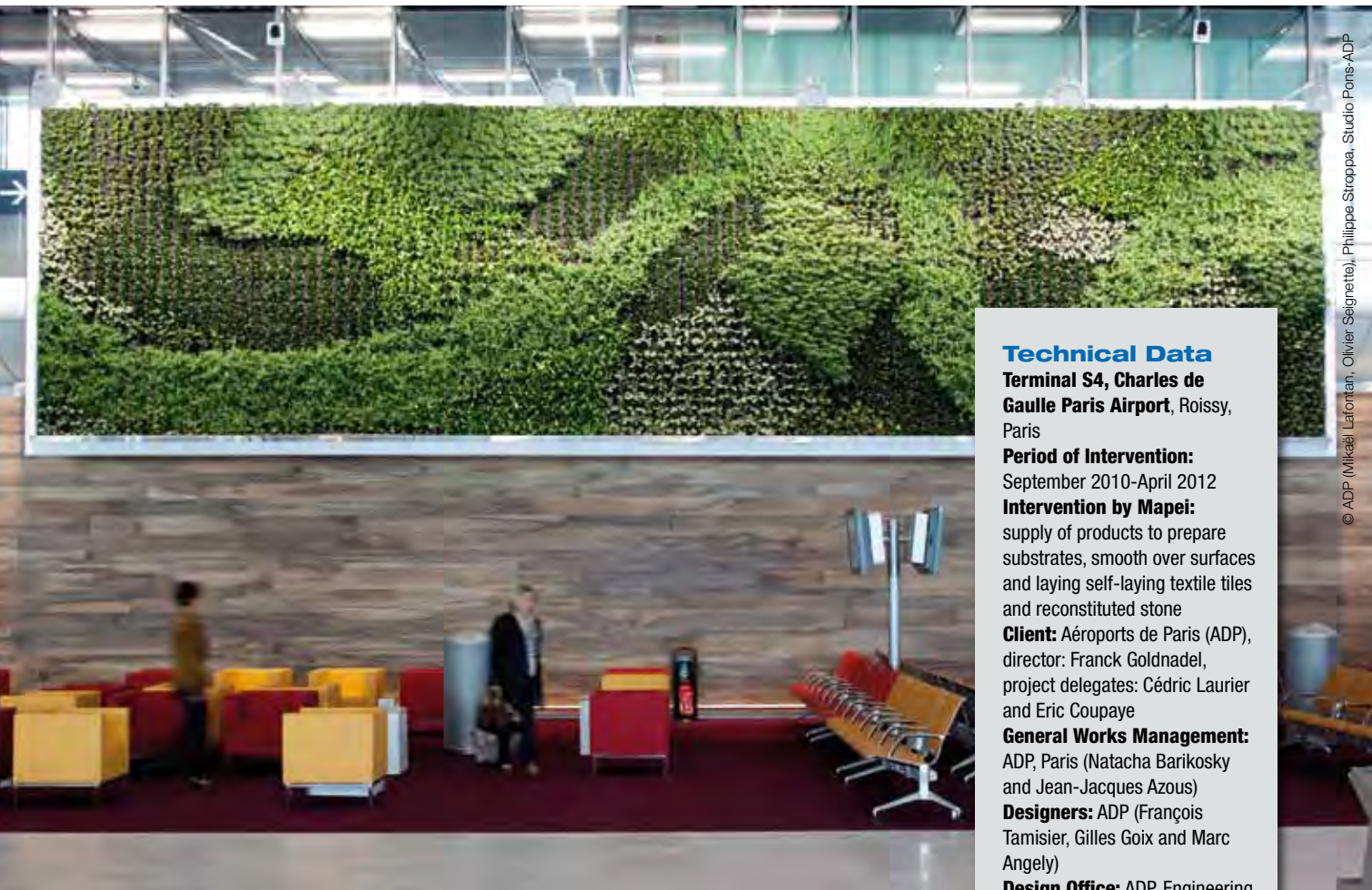
(Centre Scientifique et Technique du Bâtiment). These products, in fact, are approved by the Centre and may be used in areas classified as P4/P4S, that is, environments with intense traffic such as stations and, as in this case, airports.

IN THE SPOTLIGHT

ULTRABOND ECO FIX

It is a solvent free adhesive based on acrylic resins in water dispersion. It is used to laying self-laying textile tiles with all types of backing and venetian carpets on all normal substrates as long as they are moisture-stable and on existing floors of every type. When dry, the ULTRABOND ECO FIX film remains permanently tacky, even after repeated removal and successive relaying of the floor tiles. It can contribute up to **4 points** to obtain the **LEED** certification.





© ADP (Mikael Latortue, Olivier Seignette), Philippe Strappa, Studio Pons-ADP

Textile Floor Coverings

PRIMER G, a rapid-drying, synthetic resin-based primer in water dispersion certified EC1, was applied on the fluid cement-based, self-levelling floor slab (at level 1 of the terminal), the concrete (at level 2) and on the MAPECEM PRONTO.

To even out any differences in level between the floor slab and marble flooring installed around it, a 30 mm thick layer of ULTRAPLAN MAXI self-levelling smoothing compound was applied by pump.

Bordeaux self-laying, permanent-tack tiles measuring 50x50 cm were then laid. The adhesive used was ULTRABOND ECO FIX with very low emission of volatile organic compounds, particularly suitable for laying textile floor coverings. Thanks to its permanent tack, it is perfect for fixing tiles in position and stop them moving.

Reconstituted Stone for the Bathrooms

The first job in the bathrooms was to make a new rapid-setting and hardening screed using MAPECEM PRONTO.

ABOVE. The walls covered with plants are a reminder of the gardens of Paris and the Seine.

This ready-mixed, ready-to-use mortar allows flooring to be laid after just three hours and meets all the requirements for areas with intense traffic. 60x60 cm slabs of resin-based marble agglomerate were then bonded in place with GRANIRAPID cementitious adhesive. The joints were grouted with ULTRACOLOR PLUS high performance, rapid-drying and setting grouting mortar for joints from 2 to 20 mm wide. Both GRANIRAPID and ULTRACOLOR PLUS are certified EC1 R Plus which attests their very low emission of volatile organic compounds. Area S4, completed to perfection, is now ready to accompany passengers right up to take-off.

This article first appeared in edition No. 36 of Mapei&Vous, a magazine published by our subsidiary Mapei France. Our thanks go to Aéroport de Paris and the main contractor France Sols for their kind help.

Technical Data

Terminal S4, Charles de Gaulle Paris Airport, Roissy, Paris

Period of Intervention:

September 2010-April 2012

Intervention by Mapei:

supply of products to prepare substrates, smooth over surfaces and laying self-laying textile tiles and reconstituted stone

Client: Aéroports de Paris (ADP), director: Franck Goldnadel, project delegates: Cédric Laurier and Eric Coupaye

General Works Management:

ADP, Paris (Natacha Barikosky and Jean-Jacques Azous)

Designers: ADP (François Tamisier, Gilles Goix and Marc Angely)

Design Office: ADP, Engineering and Architectural Management

Control Office: APAVE, Paris (buildings and infrastructures), VERITAS, Paris (underground) and BEHI, Paris (environmental quality)

Main Contractor: France Sols (Spie Batignolles Group, Paris), works directors: Emmanuel Borie and Joaquim Coelho

Laid Materials: non-permanent self-laying textile tiles (Tecsom) and reconstituted stone (Quarella)

Mapei Co-ordinator: Michel Melao, Mapei France

Mapei products

Smoothing and preparation of the substrates: Mapecem Pronto, Primer G, Ultraplan Maxi

Laying self-laying textile tiles:

Ultrabond Eco Fix

Laying reconstituted stone:

Granirapid, Ultracolor Plus

For further information see the websites www.mapei.com and www.mapei.fr