

Project Report/June 2026

StoCretec Traffic Systems for the Refurbished Multi-storey Car Park at Sofia Airport Terminal 2



The operator of Vasil Levski Airport in the Bulgarian capital Sofia has comprehensively refurbished, modernised and expanded the underground car park at Terminal 2. In addition to the four existing underground levels, a new open parking deck was constructed. The facility now provides a total of 930 parking spaces for visitors and staff, as well as 30 designated spaces for disabled parking.

The project team employed state-of-the-art methods and technologies to ensure the long-term durability of the structure and to enhance its structural performance.

Greater Safety and Durability for Parking Structures

For the approximately 8,250 square metres of floor slab on the lowest parking level, as well as the 13 ramps, the expert team selected the **StoFloor Traffic Elastic 590 EP** coating system, which has been proven in use for over 10 years. This system is particularly suitable for floor slabs subject to rising damp from the substrate, as it allows moisture to escape without the coating delaminating. Unlike standard epoxy resin systems, no blistering occurs that could lead to defects and potential warranty claims over time.

Because of its elastic properties, the coating system also remains sealed even if cracks of up to around 0.5 millimetres develop in the substrate. Subsequent crack repair is not required. This reduces costs, avoids downtime, and ensures a visually uniform surface without visible repair marks. With its high robustness and flexibility, **StoFloor Traffic Elastic 590 EP** is also ideal for heavily used, crack-prone ramps.

By applying a broadcast of StoQuarz 0.6 - 1.2 millimetres, the surface achieves slip resistance class R13 and remains safe to drive and walk on even when wet.

Protective Systems for All Parking Levels

Parking levels B1 to B3 of the multi-storey car park – covering more than 17,850 square metres of floor area – are protected with **StoFloor Traffic Elastic EZ 500**. Due to their design, intermediate decks are prone to cracking. Fluctuating temperatures and dynamic loads from vehicles can further affect crack widths. The elastic OS 11b surface protection system reliably bridges these cracks and thus prevents the ingress of water and harmful substances into the concrete.

StoFloor Traffic Elastic EZ 500 is also highly wear-resistant and offers excellent chemical resistance. The slip resistance class on these parking levels is specified as R11.

Functionality Meets Design

The colour shade palettes of both system solutions include not only the light “traffic grey” used here for the driving surfaces. “Sky Blue” (RAL 5015), which was used for clear lane markings of the designated disabled parking bays, is also available within the extensive colour shade range. The sealing coat StoPox DV 502 was applied in “Traffic White” (RAL 9016) for the traffic and parking bay markings. The clearly visible markings improve orientation and thereby enhance traffic safety.

Further information on our traffic surface systems [StoFloor Traffic Elastic 590 EP](#) and [StoFloor Traffic Elastic EZ 500](#), please see the afore mentioned links leading to our StoCretec website.

Who & What

Name of the reference: Modernisation and expansion of the multi-storey car park at
Sofia Airport, BG

Building owner: SofConnect AD, Sofia, BG

Architecture: Eka Sudio, Sofia, BG

Location: Sofia, BG

Realisation: 12/2025

StoCretec proficiency: Basement level B4 with contact to ground

StoFloor Traffic Elastic 590 EP

Primer	StoPox GH 205
Coating	StoPox 590 EP
Broadcast	StoQuarz 0,3 - 0,8 mm
Sealing coat	StoPox DV 502

Ramps

StoFloor Traffic Elastic 590 EP (R 13)

Primer	StoPox GH 205
Broadcast	StoQuarz 0,3 - 0,8 mm
Coating	StoPox 590 EP
Broadcast	StoQuarz 0,6 - 1,2 mm
Sealing coat	StoPox DV 502/DV 508

Intermediate decks B1 to B3:

StoFloor Traffic Elastic EZ 500

Primer	StoPox GH 500
Coating	StoPur EZ 500
Broadcast	StoQuarz 0,3 - 0,8 mm
Sealing coat	StoPox DV 502

Markings

Sealing coat	StoPox DV 502
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CU: GBS Infrastructure Construction AD, Sofia, BG

Specialised trade : Map89 LTD, Botevgrad, BG

Photos: Mihail Tsvetkov



















