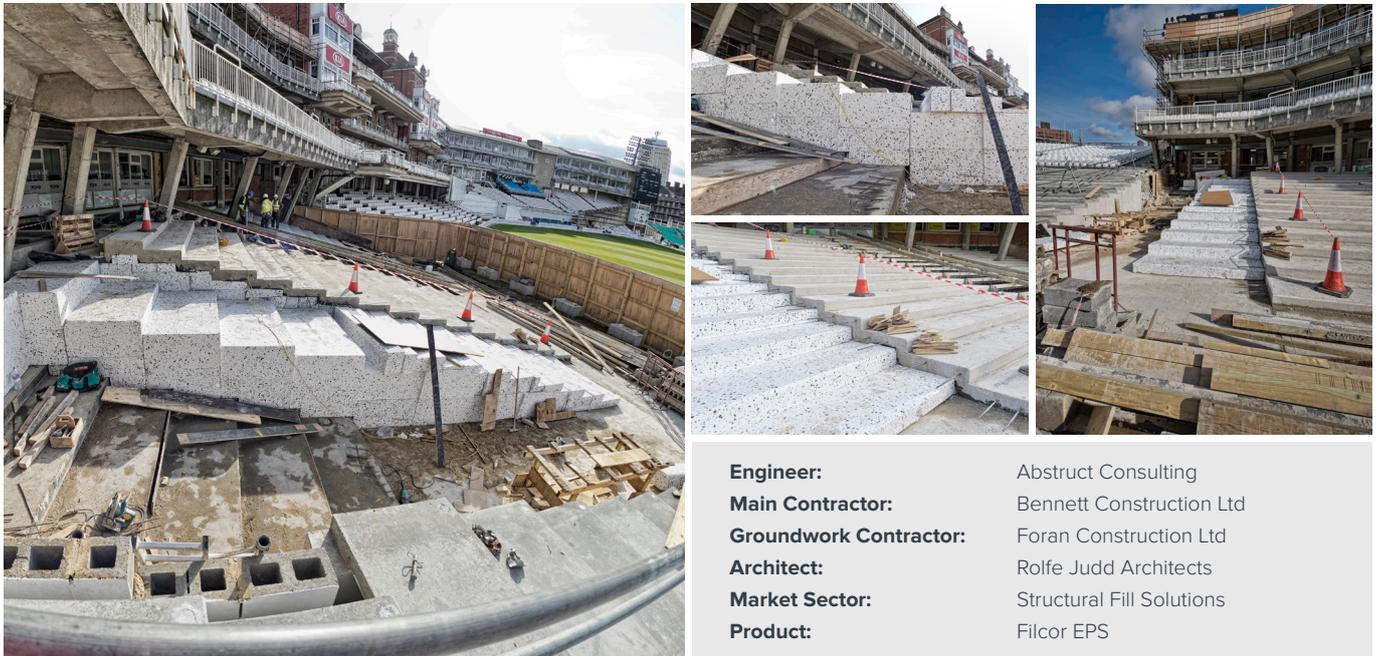


The Kia Oval - Peter May Stand

Kennington, London, SE11



Engineer:	Abstruck Consulting
Main Contractor:	Bennett Construction Ltd
Groundwork Contractor:	Foran Construction Ltd
Architect:	Rolfe Judd Architects
Market Sector:	Structural Fill Solutions
Product:	Filcor EPS

As part of the overall modernisation of The Kia Oval Cricket Ground, home of Surrey County Cricket Club, the new Peter May Stand was constructed in time for the start of the 2016 cricket season. The stand, designed by Rolfe Judd Architects, provides an additional 1,300 seats with ancillary welfare and bar facilities underneath and increases the grounds overall capacity up to 25,300 seats. Cordek was asked to provide a lightweight structural fill solution to raise the height of the newly constructed terraces, thus enabling additional rows of seating to be added.

Project Scope

In order to meet the challenging redevelopment programme, it was proposed that expanded polystyrene (EPS) structural fill be used. Abstruck Consulting specified Filcor EPS which would be laid over the existing terraces in order to form and support the new terraces. Cordek provided the contractors, Bennett Construction, with guidance on the buildability and suitability of Filcor 45 Expanded Polystyrene (EPS) for use as a quick and economical structural fill solution.

The Solution

The versatility of Filcor EPS means that virtually any shape, size or profile can be created with relatively short lead times. Compared to traditional fill methods it is lighter, quicker to install, requires no compaction and in most cases can be manually handled. It is also available

with a range of compressive strengths and thermal characteristics to suit the requirements of the specific application. In order to prove the suitability of the Filcor EPS for this project, Cordek used the anticipated depth of fill needed, combined with the loading requirements provided by Abstruck Consulting, to undertake a theoretical compression calculation. This allowed the project design team to determine the most appropriate and cost effective grade of Filcor EPS.

“ Loading restrictions on the old foundations as well as the complex relationship between the existing and new terrace geometries required a light weight structural fill which could be cut to suit on site. Filcor EPS was ideal for this and proved to be the most cost effective and quickest structural solution to install within the tight programme. An excellent product from Cordek.”
Adrian Boulton, Director at Abstruck Consulting

The Process

The 310m³ of Filcor 45 EPS lightweight fill was supplied as 2400mm x 1200mm x 600mm blocks which were cut to fit by the contractor using a Cordek 110v Hot Wire Cutter. Due to the lightweight nature of Filcor EPS, each block could be manually handled and positioned, prior to construction of a reinforced concrete terrace above.

Summary

The new stand was opened in time for the start of the 2016 cricket season and provided a welcome addition to the ground which serves as a venue for both domestic and international cricket matches.

Please contact us for more information
 ☎ 01403 799600
 ✉ info@cordek.com