Case Study:
The Edge 2, Peterborough

Client:
Persimmon Homes East Midlands

Sector:
Housing

Services Provided:
Piling & Smartfoot Foundations

Location:
Hempstead, Peterborough

Year:
2015

Persimmon Homes East Midlands appointed Van Elle to design and install the innovative Smartfoot® precast modular foundation system for the latest phase of their Edge development at Hempstead, near Peterborough.

Previous phases of this substantial development have utilised Van Elle’s Vemech® driven piling technique but the ground beams had been constructed using traditional, cast in situ methods.

Persimmon Homes, who have previously used Smartfoot® on sites in the North East and in East Anglia, recognised that utilising precast systems such as Smartfoot® allows rapid construction. Smartfoot® is at least 50% quicker to install than traditional methods, it only utilises as much steel and concrete as is required to carry to proposed loads and both direct & indirect cost can be significantly reduced.

Smartfoot® foundation designs are bespoke to each house type and so the engineered precast beams are always the perfect fit for each plot constructed. The post tensioning technology means that the installation process on site is completely dry with no requirement for cast in situ joints and intersections resulting in a true precast solution. This allows the follow-on trades to begin work as soon as the team have moved from the plot.

Discussing the benefits of working with Smartfoot®, Nick Phillips, Commercial Director for Persimmon Homes says: “Once we analysed the costs combined with the time saving benefits and the provision of a clean, safe working environment, it seemed like the ideal solution and has proven to work very well as we have progressed on site.” The current phase of the Hempstead project will deliver 40 units for private sale with subsequent developments nearby providing a further 800 units for both private sale and social housing rental properties.

Looking to the future, Persimmon Homes East Midlands are planning a further 1000 plots across 4 sites which will be constructed using Smartfoot® foundations.