



CASE STUDY

THE HEIGHTS ACCOMMODATION - GREENWICH

Revolutionising urban construction with steel frame systems

In busy urban environments, construction projects often face numerous challenges - from tight spaces and limited access to increased environmental impact and the need for sustainable solutions. The Heights, Greenwich, a development of 48 new homes for private sale, was no exception.

Intrastack introduced its panellised light gauge steel frame system as a solution for The Heights, with the installation of the LGSF structure completed in only 12 weeks.

With the site located on a former car park, adjacent to a quarry, a train line and existing residential dwellings, the project required a flexible approach to overcome these obstacles.

The Intrastack system benefited the site's logistics by providing planned, sequenced deliveries of exact quantities, with limited vehicle movements required. Because of the site's restricted access, rigid lorries were required to make the panel deliveries, with a total of 432 panels being taken to site.

While the tight site layout posed challenges, Intrastack's easy-to-stack and store components made on-site storage and assembly efficient and straightforward. In terms of waste reduction, the Intrastack system ensured exact quantities were made and delivered, with the efficient cut-to-length and panellisation process resulting in minimal waste both on and offsite. The steel-based system allowed for a 50 per cent reduction in concrete deliveries to the project.

The Intrastack solution also helped to elevate the development's specifications, with a steel frame system that has the potential to deliver an impressive U-Value of 0.14w/M2K when specified in conjunction with other energy-efficient building materials.

The project's success

Intrastack Business Director, Andy Higson, commented on the project's achievements: "The Heights showcases the true potential of modern methods of construction (MMC) in addressing urban construction challenges. The project has proven that we can provide clients with high-quality construction solutions.



"The scheme was originally designed as a traditional RC (reinforced concrete) frame, however, following an appraisal of off-site options, Intrastack's panellised light gauge steel frame system was identified as a good solution for the project.

"The Intrastack system minimised disruption to the local neighbourhood through reduced site traffic. The efficient delivery, assembly and waste management processes truly set Intrastack apart as a viable solution for the way new homes are built in the future.

"The system was delivered in fewer loads and easily stacked and stored on the site, which was tight for space. Concrete deliveries to site were halved, and because of the way the frame is manufactured and delivered the amount of waste from site was also significantly reduced."

Project in numbers:

- LGSF structure installed in just 12 weeks
- 48 new homes built for private sale
- 432 panels delivered to site in rigid vehicles
- A total of 4,885m2 of Intrastack panels used

