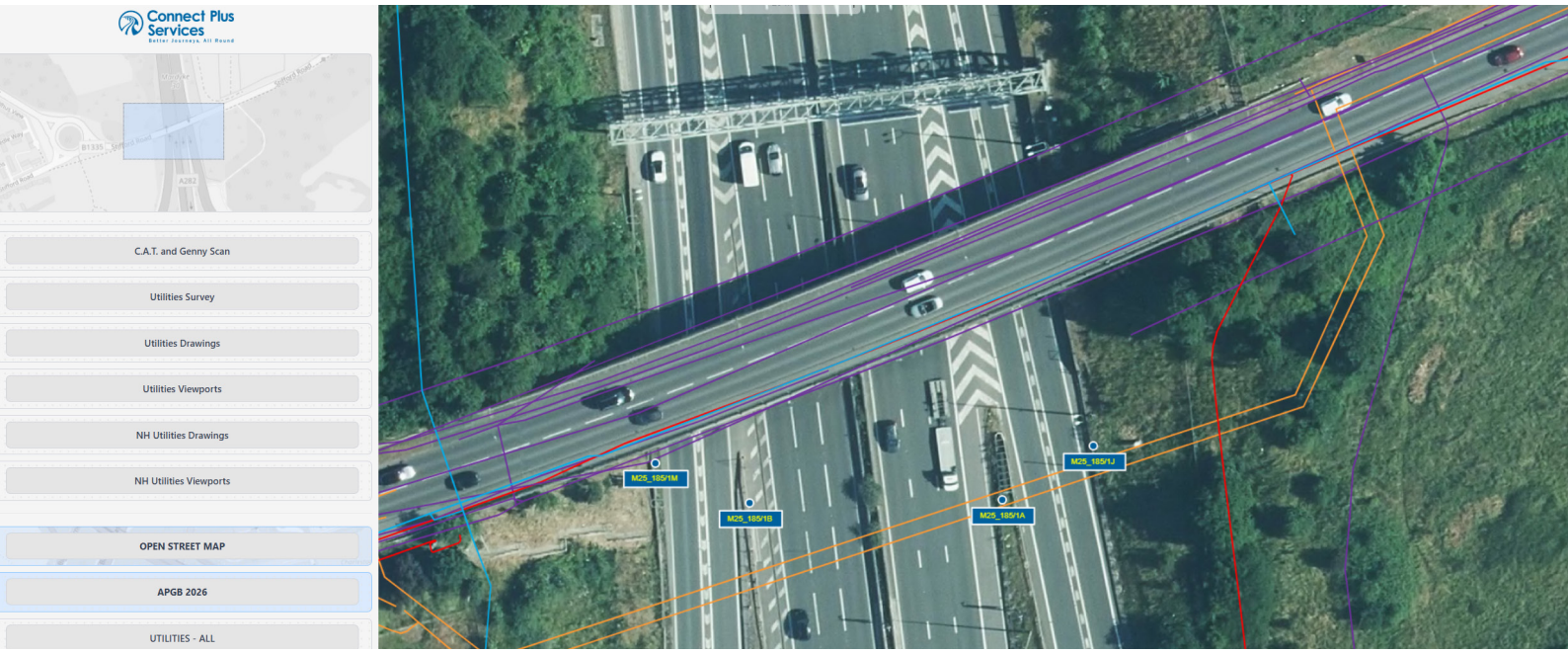
Case Study

GIM Technology



Client:

GIM Technology is a geospatial technology provider working within the National Highways supply chain, supporting tier one contractors on major infrastructure programmes, including the M25 Connect Plus Services (CPS) contract. GIM Technology accesses aerial photography via the Aerial Photography for Great Britain (APGB) resource through its work for National Highways (formerly Highways England), the UK Government body responsible for the strategic road network.

Industry:

Geospatial technology

Product:

Aerial Photography

"The improved aerial photography has significantly enhanced the accuracy of our utilities permit mapping and pre-construction planning. Having access to up-to-date, high-resolution imagery has helped us identify on-site assets with greater confidence, reduce site risks, and make more informed decisions before breaking ground. This has improved programme certainty, minimised unforeseen issues, and ultimately supported efficient project delivery."

Neil Davis,CPS Utilities Lead – M25DBFO

Summary:

GIM Technology uses Bluesky's high resolution aerial photography, made available through the Aerial Photography for Great Britain (APGB) resource, to provide contractor teams working on large-scale infrastructure projects, like the M25, with a clear and reliable view of complex infrastructure networks. By combining aerial photography with underground utility data within a digital platform, users can accurately identify assets, assess sites remotely, and produce consistent project documentation. The enhanced visual context improves safety during high risk activities, supports more informed decision making, and helps teams work more efficiently across the network.

Challenge:

Managing large-scale infrastructure projects like the M25 presents significant challenges due to the sheer size and complexity of the networks involved, making it difficult to access and assess every area. Accurately representing the location of underground utilities is also a key issue, as standard mapping can make locations hard to distinguish, particularly where junctions appear similar and marker posts provide limited context.

These challenges are further heightened during hazardous breaking-ground activities, where precise planning and reliable information are critical to ensuring safety. As a result, there is a strong need for a clear, high quality, and easily interpretable visual representation of the network, enabling on the ground teams to understand utilities in context and plan works safely and efficiently.

Solution:

GIM Technology developed a digital platform for tier one contractor delivery teams to use onsite, integrating Bluesky's high resolution aerial photography - made available through the APGB resource. The imagery provides a clear view of the network, delivering an on-the-ground perspective that is far more recognisable and reliable than standard mapping alone. Within the platform, users can accurately overlay utility data onto this visual context, enabling them to confidently identify underground assets and improve orientation when working in complex areas.

Accessible via tablets, the platform allows teams to zoom into highly detailed views of specific locations, with both photogrammetry and utility data becoming clearer at a closer scale. This enables a thorough assessment of each area without the need for additional site visits. When required, self-generated PDF outputs in A3 and A4 formats can be quickly produced, capturing the same location with different layers of information for use in permits and project documentation. By presenting consistent, high quality data in a format that is easy to navigate, share and print, the solution supports safer decision making and more efficient workflows for the tier one contractors working across the M25 network.

Results:

As a result, contractor teams working across the M25 network have been able to improve how they understand and interact with complex environments through the platform created by GIM Technology.

The use of high resolution aerial photography provides a level of clarity not achievable with standard mapping sources, particularly at scale or in printed outputs, ensuring teams are working with more accurate and reliable information.

Combined with integrated utility data, this enables users to confidently identify underground assets and plan works with greater precision, particularly in high risk areas such as breaking ground activities.

In turn, this has improved safety outcomes and streamlined workflows, while ensuring all stakeholders are working from consistent, high quality information that is easy to access, interpret and share across the project.

Specification		
Resolution	**5cm**	**12.5cm**
Coverage	Great Britain	Great Britain
Accuracy XY	± 10cm rmse	± 30cm rmse
Formats	Include: JPG, TIFF, ECW	Include: JPG, TIFF, ECW
Standard Projection	British National Grid	British National Grid
Tile Size	1km x 1km (20,000 x 20,000 pixels)	1km x 1km (8,000 x 8,000 pixels)
Metadata	Gemini 2.3	Gemini 2.3

Get in touch today at **support@apgb.co.uk**

At the time of publication all of the information was correct but could be subject to change.

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