

HELICAL PILES FOR A TIMBER- FRAME HOUSE



STRUCTURAL SUPPORT PROJECT ON PILES

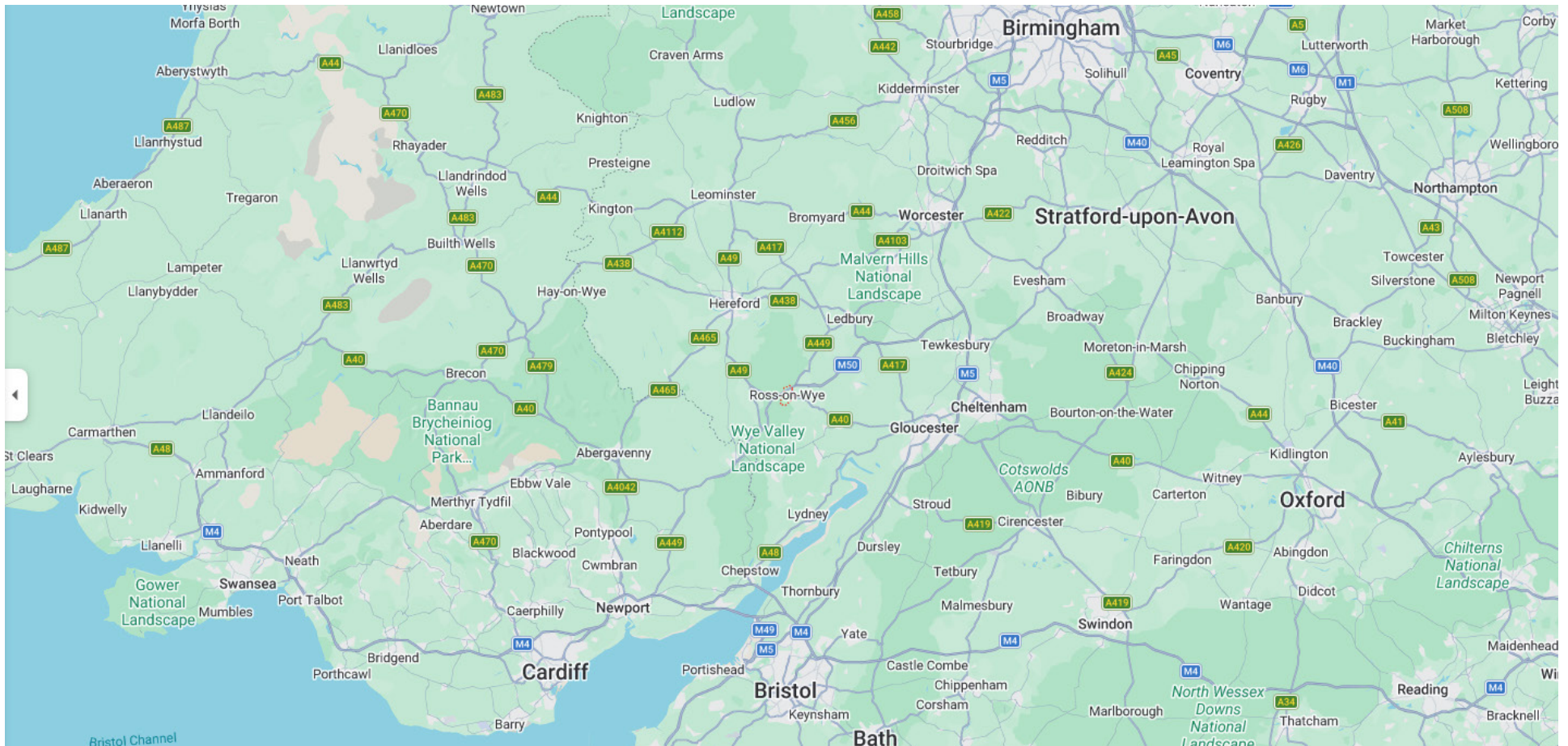
Type of Project

- Installation of helical piles by Techno Metal Post UK to support a 153 sqm single-storey timber-frame house in Ross-on-Wye, UK.



PROJECT LOCATION

Ross-on-Wye, Herefordshire, HR9 (United Kingdom)





CHALLENGES

- Rocky clay soil conditions located near a disused limestone quarry;
- High level of installation accuracy required, with minimal eccentricity tolerance to meet the timber-frame manufacturer's design requirements;
- Custom top plates required to ensure perfect integration with the timber-frame structure;
- Off-grid installation conditions requiring adapted equipment and site logistics.



SOLUTIONS

- Installation of **26 Techno Metal Post helical piles** (model P3 Ø 88.9 mm) and 4 Techno Metal Post helical piles (model P2.5 Ø 73 mm);
- Piles installed to an average depth of 5 metres, achieving working loads between 15 kN and 60 kN depending on structural requirements;
- Design and installation of custom top plates specifically adapted to the timber-frame manufacturer's specifications;
- Installation process adapted to challenging ground and off-grid site conditions while maintaining a high level of precision.



PROJECT





PROJECT





PROJECT





PROJECT





RESULTS / CONCLUSION

- Despite the rocky ground conditions and installation constraints, all 30 helical piles were successfully installed in just 3 days.
- The Techno Metal Post solution provided a precise, reliable and durable screw pile foundation system fully adapted to the project requirements. The completed installation now offers a stable and long-lasting base perfectly suited for the single-storey timber-frame construction.



DEALERSHIP:
TECHNO METAL POST UK