



*Pod-Trak undertook the construction of 5.5km of track foundation and bottom ballast as well as over 2km of track drainage.*

**Formation and Drainage through Tottenham Hale station**

**A**s part of the Railway Upgrade Plan, Network Rail are investing £170m for improvements across Upper Lee Valley between 2017 to 2019.

**Project Deliverables**

The upgrade entails 5.5km of new track which will allow an extra two trains per hour (during peak times) to run between Stratford and the new Meridian Water station, reducing congestion for passengers and supporting regeneration across the Upper Lee Valley area.

Pod-Trak undertook delivery of the civils aspect, this included:

- Reduced level dig
- Installation of 5.5km of a Primary Type 1 formation and structure transitions
- Removal and reinstatement of soft spots providing CBR, DIN and materials testing at 50 meter intervals.
- Installation of perforated and carrier track drainage systems and deep surface water drainage systems.



**Reduced level dig to accommodate the new track formation**

- 1 no. Drainage and 5 no. Utility UTX's.
- Culvert strengthening works
- 750 meters of elevated and concrete trough works
- 5 no. Gravity OLE Bases
- 5.5km of bottom ballast installation utilising 2D Dozers.
- Construction of 330 meters of reinforced earthworks formbund which acted as a noise barrier.
- Site wide hardscaping.

**Challenges and Solutions**

The site was divided into 9 zones, each zone with a different site access date (design). Pod-Trak, in collaboration with the client, rescheduled and accelerated available works to ensure sectional completion and more importantly, continuity for the Permanent Way team. Production was increased, regardless of the high volume of soft spots encountered. To mitigate this issue, we installed a geogrid combined with a PW1 Terram to achieve the required CBR at formation level, reducing the potential excavations by 50% and allowing works to proceed efficiently, meeting the key handover date.



**NOVEMBER 2017  
– OCTOBER 2018**

**VALUE  
£3.1m**

**LEA BRIDGE  
TO MERIDIAN  
WATER**

