

Chambers Wharf, Tideway East

Bermondsey, London

Client

Tideway East

Works Commenced

January 2019

Works Completed

April 2019

Concrete Removed

126m³ approx.



Aquaforce Concrete Services was engaged by Tideway East to undertake various hydro demolition works within the 28m diameter shaft being sunk at the Chambers Wharf site, Bermondsey, south of the river and close to Tower Bridge.

Chambers Wharf is one of Tideway's main drive sites and the shaft will be used to launch the Tunnel Boring Machine (TBM) Selina, which will travel 5km eastwards to the Abbey Mills Pumping Station. It will also be used to receive the TBM's Ursula from Tideway Central and Annie from the Greenwich connection tunnel.

The hydro demolition works were necessary to facilitate a number of modifications required to the diaphragm walls of the shaft at various depths as the excavation progressed.

Works commenced on site January 2019 when the shaft was at a depth of approximately 25m and continued into April 2019 with the shaft at a depth of 57m.

Prior to the works commencing, Aquaforce technicians undertook specialist tunnel entry training (City & Guilds 6151-02) to enable them the work within the shaft. Modifications were also made to the Multijet pump units to enable them to be lowered in and out of the shaft by the on-site gantry cranes.

Aquaforce teams worked day and night, as required by the Client to maintain the excavation programme, ensuring that the critical date for the installation of the TBM Selina within the shaft could be maintained.

The works involved the removal of high specification, high strength, heavily reinforced concrete on a number of sections of the diaphragm wall, carried out using traditional hand-lance hydro demolition methods, operating one of Aquaforce's Hammelmann Multijet pump units working at 1100bar

The works were completed to the Client's programme and satisfaction.