

TMS Maritime is a leading UK specialist in marine civil engineering, ancillary floating plant and diving services

Client: City of Bradford Council

Duration: 5 Months

Project: Baildon Bridge Repair & Scour Protection

Description:

TMS were awarded a project by Bradford City Council to carry out repair and scour protection works on Baildon Bridge. The bridge was built in 1933 and is a main arterial route in to Bradford from the north and supports four lanes of traffic and public access.

The Full scope of the project included:

1. Dredging and excavation to remove silt and high riverbed areas to the north and south riverbanks to increase the river flow area.
2. In-fill of deep scour holes around the bridge piers to protect the piled foundations.
3. Masonry repairs of the bridge abutments and wing walls.
4. Underwater concrete repairs to the bridge abutments to infill undermining defects.
5. Underwater installation of concrete filled fabric formwork scour protection mattresses to the entire bridge footprint.
6. Structural concrete repairs to the reinforced concrete bridge soffit.

TMS were appointed as Principal Contractor to complete the works on the River Aire.

As an EA designated 'Main River', TMS procured the necessary Flood Risk Activity Permit on behalf of the client.

Using our specialist maritime experience and in-house dive capability, we opted to undertake all works using a 'wet' solution. This removed the need to complicated and expensive in-river temporary cofferdams to create a dry environment.

Following all the necessary repairs to ensure the longevity of the bridge structure, our dive team then laid individual mattress sections over the riverbed area, each zipped together to form a continuous invert mattress. The mattress was filled with concrete and rock armour was installed on the up and down-stream riverbed interfaces.

The scour mattresses were designed and fabricated by Proserve on our behalf as a 'design and install' solution.

