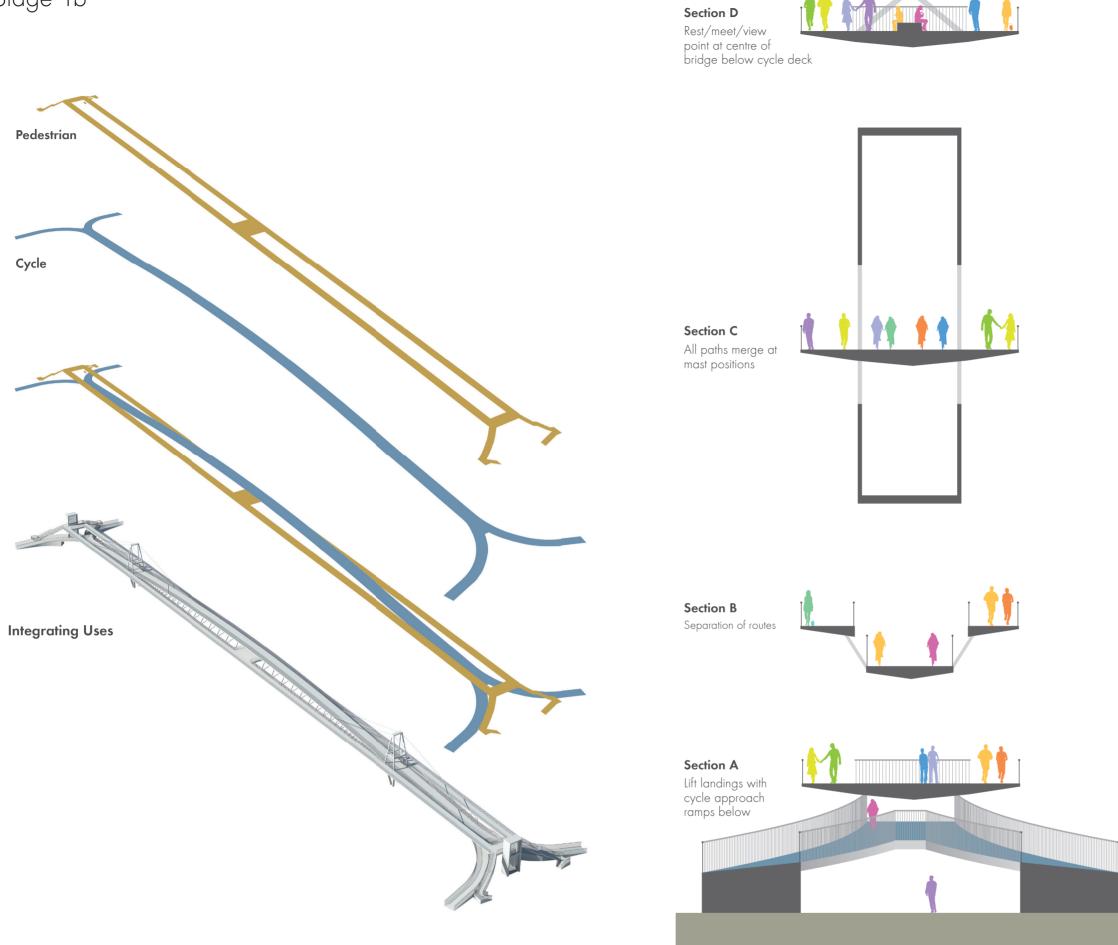
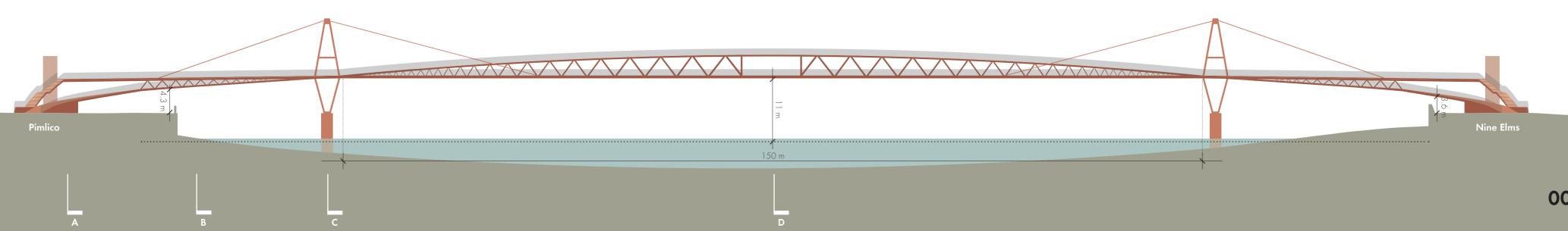
## **NINE ELMS - PIMLICO BRIDGE** DESIGN COMPETITION

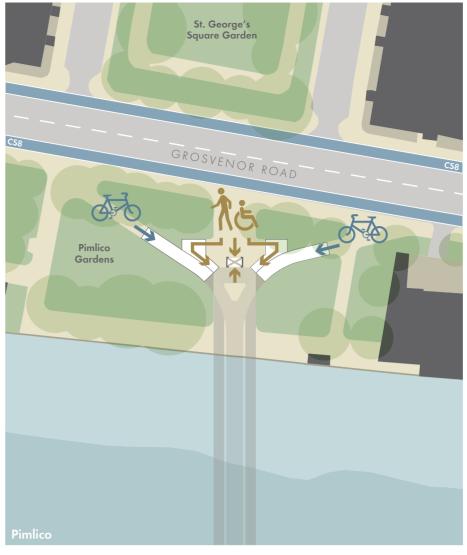
## Stage 1b

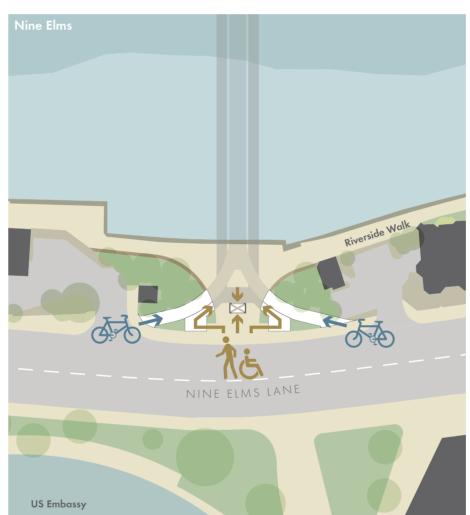
Cycle



**Cross Sections** 







Place Making



Mast assemblies put together on-shore and then lifted into place using cranes on jack-up barges
Pier deck sections lifted into place and fixed to masts



- Back spans of bridge assembled on-shore and then craned into place.
  Shore end of back span supported on temporary props

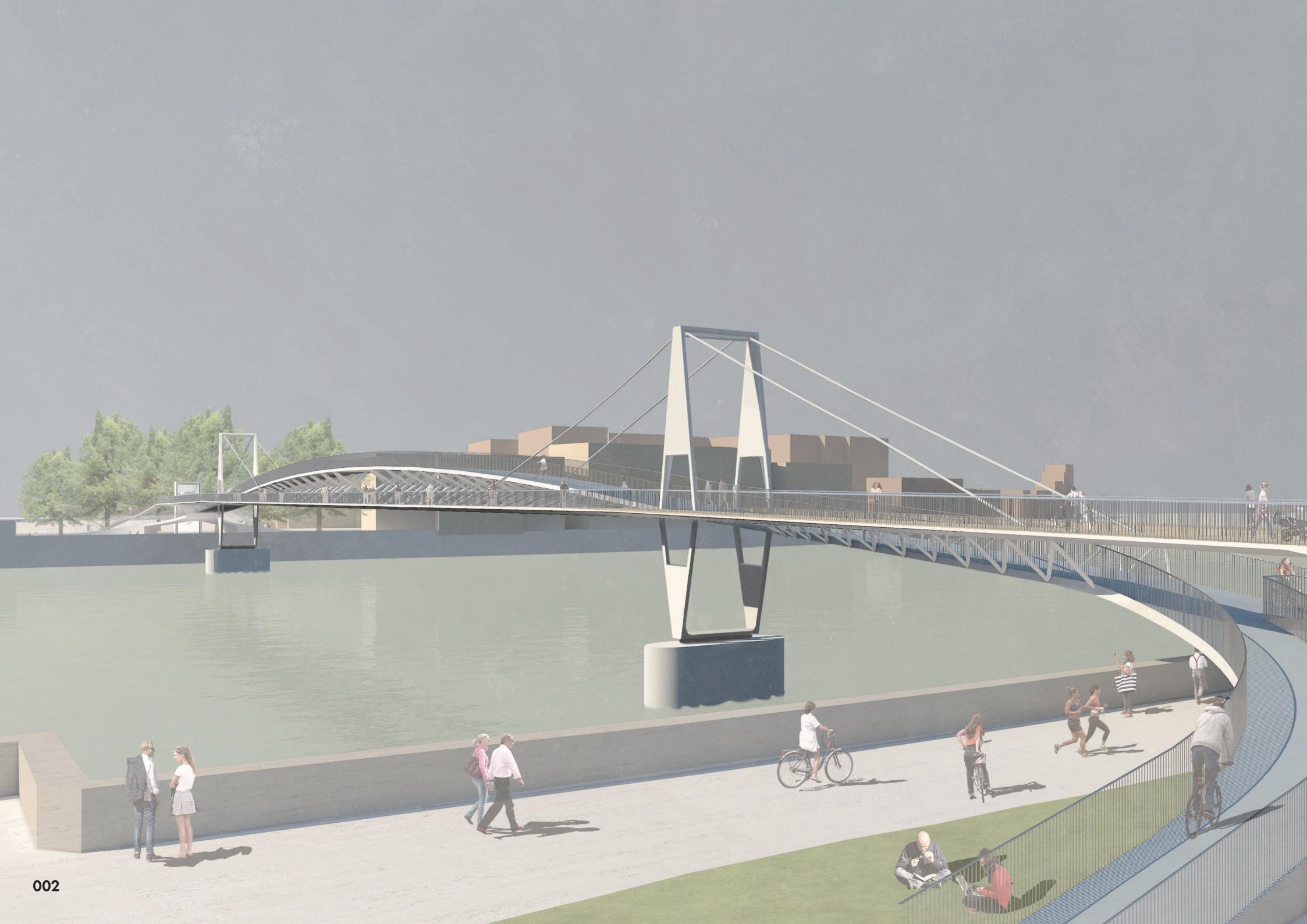
- Back span tie down anchors installed
  Successive sections of cantilever spans erected by rolling sections along back span using temporary cables for support



Central span of bridge brought to site on barges and lifted into place using floating cranes
Cables tensioned to working load



**Construction Methodology** 



## **Nine Elms to Pimlico Bridge**

The creation of a new bridge to connect the distinct character areas of Pimlico (established) and Nine Elms (emerging) is a significant opportunity for improving connectivity in London and for creating a landmark structure that stitches these two communities together. We have conceived a bridge design which responds to the brief and the setting, providing an innovative design approach and an enjoyable experience for pedestrians and cyclists.

Our proposal clearly distinguishes the routes between cyclists and pedestrians and utilises this distinction to create an efficient and elegant structure. The uses are interwoven and shared at specific points along the bridge journey to create places of interest. Our bridge structure comprises of two masts, set upon piers which are placed outside of the river navigation zone.

Pedestrian walkways are provided along the upstream and downstream bridge edges, providing a clear river outlook, with the cyclists using a central deck that raises and lowers across the width of the river.

As the bridge is intended to function as a key cyclist commuter route an important objective for us was to ensure that cyclists would not need to dismount, deterring their future use of the bridge. We have provided a ramped approach and avoided the need for lifts (or stairs with associated cycle channels) for cyclists.

As a nominal 230m span we felt the bridge should not only provide high quality spaces at the ends, responsive to their particular use and context, but also opportunities to pause along its length. The bridge geometry permits interaction between the two uses, marked by the point of connection to the bridge masts. This crossover allows pedestrians opportunities to change sides along the bridge length, a feature for enjoyment of the bridge use and for public safety.

The character differences and use of the River edge at the Nine Elms and Pimlico landings are each recognised and reflected in our design proposal. The two masts, together with the layered deck configuration, provide a strong identity and a unique character. By night they provide an opportunity for further expression and identity.

Our bridge design respects the PLA/ WBB navigational requirements for the 10.91m clearance above AOD for a full 150m width at the mid-channel of the Thames.

Pedestrians using the bridge have the use of stairs with adjacent lifts for fully compliant accessibility requirements. We have allowed for clear pedestrian routes along the river walk edge to the Nine Elms and Pimlico landings. We have provided a dedicated cycle route which aims to clearly and safely allow cyclists to use the bridge as a key crossing over the Thames.

We envisage the construction sequence of the bridge to commence with the piling for the foundations and piers to support the masts from which the suspended decks are constructed back to the landing points and out over the river. The central section is brought in via barges and craned into

the final deck position. The River Thames use and access will be managed and maintained throughout the process of construction.