



Thame Valley Viaduct (EKFB), HS2 Ltd

Thame Valley Viaduct

In January, the Design Panel met with the contractor Eiffage, Kier, Ferrovial Construction and BAM Nuttall's (EKFB) to discuss the Schedule 17 stage proposals for Thame Valley Viaduct – a Key Design Element on the Phase One HS2 route, located to the west of Aylesbury.

Overall, the panel was very supportive of the way the designs have developed, considering it to be elegant, refined and responsive to a challenging and sensitive landscape setting.

It applauded the way the architectural approach has progressed to address visual, functional and construction challenges. Aspects such as the newly developed designs for the piers will create contrasts between light and shade, and help to break up the viaduct's bulk.

An important aspect of the success of the scheme is the landscape design, and the panel was strongly supportive of the intention to create a new wetland landscape. This will help ensure the new landscape around the viaduct plays a valuable role as part of the floodplain, while preserving and enhancing the existing landscape setting.

The panel encourages further conversations with local landowners to explore opportunities to extend the wetland landscape creation beyond the boundaries of HS2 Ltd's ownership

Finally, the panel feels that the story of how this viaduct has been approached is detailed and persuasive. It encourages EKFB to include it with the Schedule 17 submission, and HS2 Ltd to make use of it as an exemplar to show how design quality adds value.

Design Panel activities December 2021 and January 2022

2

Route-wide meetings

- Blue Infrastructure Design Approach document
- Customer Information Signage

4

Schedule 17 stage meetings

- Oxford Canal Viaduct
- Thame Valley Viaduct
- Aston Church Overbridge and Saltley Viaduct
- Little Missenden Headhouse

2

Workshop meetings

- Chiltern Tunnel north portal
- Balsall Common abutments

2

Governance meetings

- December monthly team meetings attended by the Design Panel chair, vice chair, secretariat and HS2 Ltd
- HS2 Independent Design Panel annual meeting

Abutments

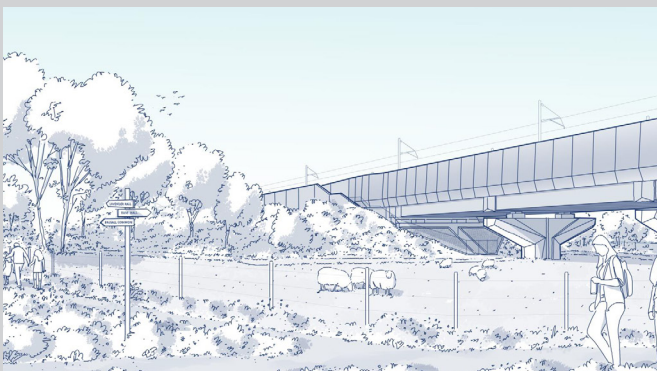
Following a Design Panel Workshop in November 2021, the panel met again with the Balfour Beatty Vinci (BBV) team in January to discuss the abutment design for Balsall Common Viaduct on the Phase One route.

Since the workshop in November, the design team has further developed a number of aspects of the abutments including decluttering, to hide services in the earthwork and changing the gradient to embankments, to increase the area that can accommodate planting.

The panel welcomed the detailed consideration given to the design development of the viaduct abutments, and was supportive of several of the refinements which have been made. In particular, they felt that combining the lineside noise barrier and security fencing has potential to be used as a solution in other locations along the HS2 route.

As design work continues, the panel encouraged the team to further investigate how the geometry of the abutments could be softened to help blur the boundaries of the engineered slopes. Visualisations from key viewpoints, including from the walking route, and from trains and vehicles, would also be helpful to show how the abutments will be viewed.

The next meeting will focus on the Schedule 17 stage designs and the panel looks forward to seeing how the abutments fit within the overall designs for Balsall Common Viaduct.



Abutment design development, HS2 Ltd



Alan Payne
Senior Project Manager,
HS2 Ltd

People's stories

Alan is a chartered civil engineer with over 35 years' experience working in infrastructure. He is Senior Project Manager at HS2 Ltd, and responsible for managing the contract with BBV in the Area North section of the Phase One route.

"A key part of my role is to work closely with our supply partners BBV. This is to ensure work is delivered safely, to cost, on schedule and to the right quality so that HS2 can leave a long lasting legacy.

High quality design is critical to the success of HS2. During the design development process for Balsall Common Viaduct we have engaged regularly with Design Panel, who have been particularly valuable in advocating holistic design thinking. The support and challenge from the panel has helped us to develop a design which focuses on integrating with the environment and maximising the benefits of HS2".

Annual meeting

In December, the Design Panel Annual Meeting took place. This provided an opportunity to welcome new experts who have recently joined the panel, and to introduce them to the work done to date on HS2. At the meeting the chair of the panel, Prof. Sadie Morgan, reflected on some of the key themes that have emerged from panel discussions, and how these could influence the next stage of HS2. Further information can be found in the Autumn and Winter 2021 Chair's Report. A copy of which can be found on the Design Panel pages on the GOV.UK website.



Frame Projects
Secretariat to the
HS2 Independent
Design Panel

**HS2 INDEPENDENT
DESIGN PANEL**