

Chain Bridge, River Usk

CLIENT: HS Carlsteel

LOCATION: UK

YEAR OF COMPLETION: Ongoing

Chain Bridge carries the B4598 over the River Usk in Monmouthshire. Constructed circa 1906, the Grade II listed structure comprises a pair of lattice arches supporting warren truss cross-girders and a steel trough deck on hangers. The bridge is to be strengthened, with all deck cross-girders and hangers replaced as part of the works, and the bridge is to be completely repainted.

Working closely with the permanent works designer, Hewson were appointed to design temporary cross-girders to support the deck while the permanent replacements are installed. We also coordinated the design of an encapsulated scaffold from which the works would be completed.

The design took cognisance of the Grade II listing, and attachment points were carefully detailed around the existing structure using a point cloud survey for reference. This included developing a clamping detail around the existing arch to avoid mechanical fixings between the temporary and permanent works.

KEY FACTS:

- Detailed design
- Temporary works
- Grade II listed structure

