

Moss Canal Bridge



Overview

Lightweight, pre-fabricated glass-fibre reinforced polymer composite deck within a road bridge over the Rochdale Canal.

Details

Location	Rochdale, UK.
Description	Road bridge over Rochdale Canal.
Client	Rochdale Metropolitan Borough Council
Date of project	2011
Where FRP composites are used and why	Lightweight pre-fabricated GFRP deck used to enable re-use of existing abutments, and to minimise construction duration and cost.
Specific design details	9m span formed from bonded double web GFRP box sections (largest pultruded section available worldwide), giving a total width of 13m. Top of GFRP box sections made solid with epoxy mortar and conventional bituminous surfacing. Ends of GFRP deck anchored onto original reinforced concrete abutments. Reinforced concrete parapet beam (with steel parapets) anchored onto edge of locally mortar filled GFRP deck.
Type of composite used	Deck – multi-axial pultruded sections of E-glass fibres in vinylester resin.
Performance in service	No structural change in condition has been reported.
Project partners	Designer – Mouchel Contractor – Askam Construction Manufacturer – Pipex px

Contact

Email: info@compositesuk.co.uk
Web: compositesuk.co.uk/construction-sector-group