

BLOG – Rail Culvert Rehab using GRP Segments

The existing 1700x1300 brick-arch culvert (located in East Cowick, Yorkshire) is 80 years old, and was in a very poor state of repair, with severe cracking, and a risk of the railway lines above the culvert collapsing. The culvert was not in use prior to the repairs being carried out, but would be re-commissioned into service upon completion of the scheme.



Working with the main contractor and Network Rail, iLine developed a cost-effective fully-structural solution and programme to repair the failing pipeline. iLine's in-house design team commenced detailed design works in December 2015, with an operational timescale of 2 weeks during March 2016. The client, together with the rail safety team both fully endorsed the overall scheme, and provided great support to iLine throughout the project.



iLine procured the arched GRP segments from our partner Channeline, which were offloaded, installed, grouted, tested and commissioned within a period of 5 days. The resulting status is that the culvert is now structurally sound, has increased flow characteristics, and is designed to withstand all the loadings from the above rail infrastructure, with a design life of 100years.