

450MM SURFACE WATER PIPELINE AT KILLYMAN DUNGANNON

Project: To install a 450mm surface water pipe under a road junction from a new manhole to a new housing development – distance of 50m, through sand at a depth of 5.5m



Launch shaft location



Launch shaft

The pipeline was to be installed by open cut method, but, was abandoned with 50m remaining due to depth and difficult ground conditions. The open cut was a risk to existing services and surrounding buildings, as well as being a potential health and safety issue.



BM400 Set up in launch shaft

This required a new 2m shaft to be excavated to one side of the original line, two Guided Auger Bore drives were now needed. One 50m long to the development site and one 3m long into the existing manhole, recently constructed, to connect to the already installed pipeline.

Mobilisation and the 3m drive was completed in 3 days. The BM400 was then set up for the 50m drive which was completed in 4 days, to exact line and level.

The installation was then attempted by Directional Drilling, which failed, due to a flat gradient, and adverse ground conditions. The pipe installed by Directional Drilling had to be abandoned, causing it to be in the way for the Guided Auger Bore.



Pipe installed in exit shaft to line and level