## project profile

## Project

## Light Rail Project

Manchester

## UK

## System

Grasscrete GC3
Quantity
4200 m² $^{2}$

## Application

## Track maintenance

## access



Visually impressive is one way of describing this ribbon of grass paving that weaves its way through a city's redeveloped business and cultural quarter. For us the really impressive part is how Grasscrete overcame some challenging design and installation factors along the way.

With an underlying solid concrete slab to support the rails there was no means of achieving the natural direct percolation of surface water normally associated with Grasscrete. To overcome this Grasscrete GC3 was installed over a drainage layer of sand and gravel in turn laid over the concrete slab featuring a crossfall to the outer edges. At each rail channel a perforated kerb was introduced that could enable moisture to pass across the gap without encouraging the build up of debris, a potential issue for the earthing of the electrified system. Key to the installation was the introduction of a temporary formwork system that sat over the rail and held captive the kerbs and filter media during casting.

With access generally limited to track itself most of the installation was carried out using a road-railer $360^{\circ}$ excavator working along the track. Following completion the surface of the Grasscrete was groove cut at key locations to introduce wiring loops for signalisation.

Completed over 10 years ago the installation remains just as impressive. Grasscrete has fulfilled the brief of providing a green solution enabling essential maintenance. It's also addressed concerns around the alternative consideration of pre-cast units, where it was felt that blocks could be lifted by vandals with a potential to derail the rail cars.

Also available as a full project report, please ask for further details


