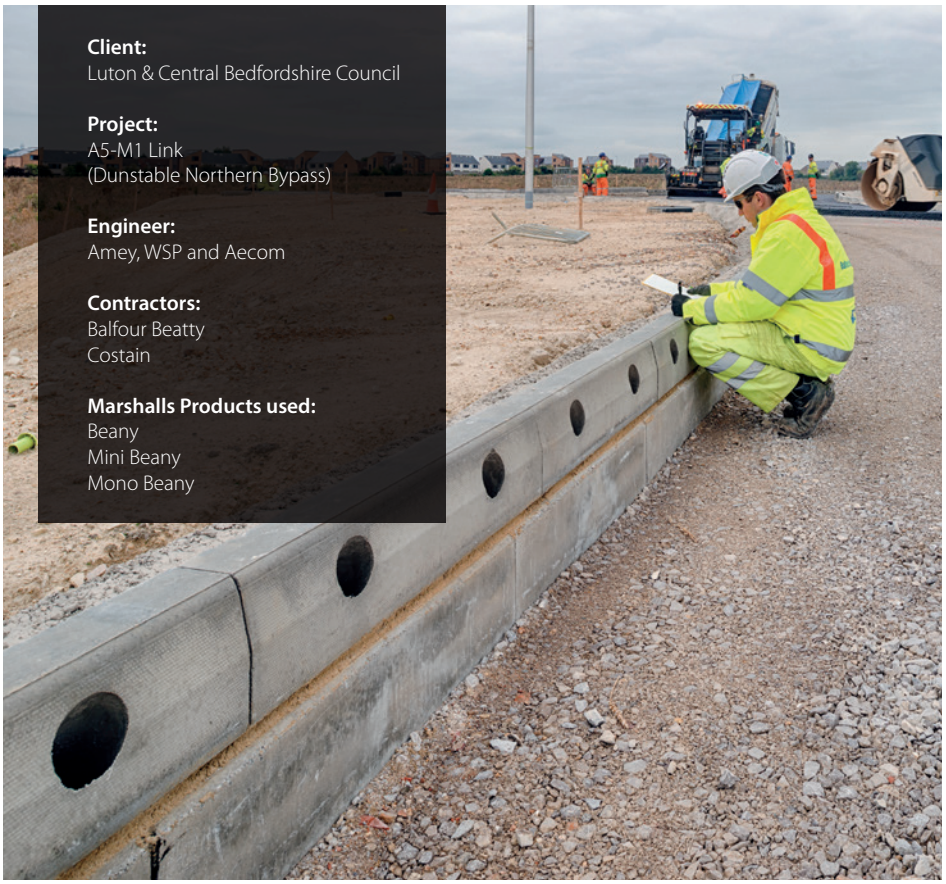
M1/A5 LINK (DUNSTABLE NORTHERN BYPASS)

Combined Kerb and Drainage System

Marshalls
Creating Better Spaces



Client:
Luton & Central Bedfordshire Council

Project:
A5-M1 Link
(Dunstable Northern Bypass)

Engineer:
Amey, WSP and Aecom

Contractors:
Balfour Beatty
Costain

Marshalls Products used:
Beany
Mini Beany
Mono Beany

Background

The A5-M1 Link will be a new dual carriageway connecting the M1 at a new junction 11a north of Luton, to the A5 north of Dunstable, and increase the ease of access between Milton Keynes and M1 Junction 9, making journey times shorter and more reliable for vehicles travelling a long distance.

The scheme has been split into two phases – a £25m phase for the Woodside Link, and a £150m phase for the M1 junction 11a. the scheme will improve road safety and bring economic benefits to the region, unlocking the development of 7,000 houses and 40 hectares of employment land, potentially providing 4,000 jobs in the Houghton Regis area.

The scheme includes a new roundabout at the intersection with the A5120 Bedford Road which will join the M1 at new junction 11a.

The road will also join the new Woodside Link Road, which will divert heavy goods traffic away from local roads in Dunstable and Houghton Regis, whilst also improving air quality.

Approach

A large proportion of traffic on this stretch of road is anticipated to be HGV's, therefore installing a robust system with a long lifespan was essential.

Marshalls needed to come up with a tough, high quality system which was able to be installed quickly in order to minimise traffic disruption, yet was cost-effective enough to remain within budget. The hybrid solution Marshalls offered combined a mix of Beany products which were best suited to differing parts of the scheme, and ensured that costs were kept to a minimum, but ultimately delivered an end result which ensures longevity.

Due to the complex nature of the project, a combination of Mono Beany and Mini Beany was used on the dual carriageway connecting the Woodside Link to the M1. On the areas where the run of drainage was straight, Mono Beany was adopted, and the remaining roads with radii and roundabouts adopted Mini beany due to its E600 loading.

However, on the Woodside Link Marshalls' E600 Beany and Mini Beany system proved to be the best option due to the quantity of radii and roundabouts which carry HGV traffic. The Beany and Mini Beany range offers a full suite of accessories and ancillary products which made the decision and installation for this section quick and easy.

Throughout the project, the contractors had to work in partnership with two local authorities, Luton and Bedfordshire, and in order to make the process as streamlined as possible, Balfour Beatty used Marshalls' Design Service due to the design complexity and quick turnaround time.

"The project included lots of radii, Marshalls' Design Service was able to design all aspects of the project and provide a schedule of components and deliveries for each run. This made everything easy to identify and install on site, even when we needed extra products; one simple phone call to Marshalls ensured my products were on site the next day, which helped keep the project on track."

- Adam Morris, Balfour Beatty

Outcome

The final project will provide a much needed access route for many vehicles throughout the local area. Due to Marshalls' ability to provide next day, direct to site deliveries, valuable time was saved on site, and therefore local disruption was kept to a minimum.

The robust Beany system offered a perfect, cost effective solution for a heavily trafficked area, which will have a long lifespan as the units are strong enough not break or become damaged upon impact.