

Solutions



“Over 200 tonnes of material containing the Shell Agesafe longer lasting bitumen was recently laid by Tarmac on a section of road in Northamptonshire. The performance of the new surface is being carefully monitored and data from the trial will contribute to quantifying the whole life benefits available when using this binder as part of our HAPAS BBA Approved Thin Surfacing Course range.”

Brian Kent, National Technical Director at Tarmac

Sustainable Construction

New bitumen set to extend the life of the UK's highways

Local roads in the UK represent an asset worth over £400 billion – and yet the socio-economic importance of having a high-quality, well-maintained local road network is often underestimated.

Faced with years of funding restrictions, councils have favoured ‘patch and mend’ solutions that do not provide the lasting repair that is needed to maintain the safety and integrity of local roads. Highways that are affected by potholes are often a symptom of an underlying structural problem which cannot be ‘fixed’ by filling in the hole.

Increasingly, highways authorities are looking for new solutions that are not only more durable and require fewer repairs, but that can also provide cost savings and environmental benefits from reducing the carbon emissions associated with maintenance work.

Working in partnership with Shell, Tarmac was involved in a trial of a new type of bitumen – the binder that holds an asphalt mix together – called AgeSafe. Specially designed to resist ageing due to oxidation, which is the key factor leading to the hardening of bitumen that ultimately leads to pavement failure, AgeSafe is ideal for all types of roads, but particularly relevant where public disruption or high intervention costs are a primary consideration.



Brian Kent, National Technical Director at Tarmac, discussed the company's role in the project and its potential benefits for the UK's roads on the award-winning [Engineering Matters podcast](#) – the podcast all about engineers and the problems they have to solve to improve our world.