

Tufflex®

Technical data sheet

High performance materials deliver a multi-layer crack resisting binder/surface course that is particularly suited to overlaying concrete carriageways.

Compared to traditional asphalt surfacing, Tufflex® offers high deformation resistance and a low air void content. The solution also delivers National Highways' highest level of wheel rut resistance, level three. Its design uses specialised bitumens and incorporates best-in-class polymer technology to give it a flexibility that enhances fatigue resistance by absorbing traffic vibration. With its relatively low surface texture and designed low voids content, Tufflex effectively protects the surface it covers from water ingress.

It is available in 6mm, 10mm, 14mm and 20mm nominal sizes and can be laid between 30mm and 150mm thick using a traditional asphalt paver with a 6-10 tonne roller. As a single layer application Tufflex can halve the installation time of traditional materials, reducing disruption to local services and traffic. This can be further enhanced by producing the material using Heidelberg Materials' era 140 warm mix asphalt process. Special attention should be given to compaction at the joints, which should be cut and painted with a bituminous joint paint to maintain resistance to the tensile stresses of turning vehicles. Installation should be in accordance with BS 594987.

Tufflex+

Enhanced fuel resisting properties.

Tufflex XD

Tufflex XD is an extra dense solution with a higher bitumen content for sites with lower texture depth requirements.

Layer thickness

Details of constituent quality and layer thickness shown below:

- 6mm nominal size 30 – 60mm
- 10mm nominal size 40 – 80mm
- 14mm nominal size 50 – 100mm
- 20mm nominal size 60 – 150mm

Available with the following options:

**era®/CleanAir®/CarbonLock®/
AgeLast®/RecyclePlast®/RAP**

Use this product for

- Overlay of concrete carriageways
- Urban roads
- Rural roads
- Industrial areas

Benefits

- A best-in-class flexible polymer modified bitumen (PMB)
- Road engineers will benefit from the option of a multi-layer crack resisting asphalt solution
- Cost-effective over the whole life
- Quick installation – single layer application
- Prevents water ingress
- Highly sustainable and durable, and offers improved performance over conventional asphalt materials
- Increased flexibility



FLEXIBLE



CRACK RESISTANT



PREVENTS WATER INGRESS



ENHANCED DURABILITY



INCREASED STIFFNESS



REDUCED CO₂



ENHANCED RIDE QUALITY

Tufflex technical data

Material property	Test specification	Typical result
Design void content	BS EN 12697-6	≤ Vmax 5.0%
Water sensitivity	BS EN 12697-12 Method B (i/C) BS EN 12697-23	≥ 80%
Binder drainage	BS EN 12697-18 Beaker Method	< 0.3%
Indirect tensile stiffness modulus	BS EN 12697-26 Annex C	> min 1800 mpa
RTPD (wheel tracking)	BS EN 12697-22 Procedure B WTS in Air	≤ 0.8mm/10 ³
Fatigue	BS DD ABF	≥ 100,000 cycles to failure @ 100µstrain

Please see asphalt product matrix for further information or contact technical:

northasphaltsales@uk.heidelbergmaterials.com
 southwestasphaltsales@uk.heidelbergmaterials.com
 southwalesasphaltsales@uk.heidelbergmaterials.com
 southeastasphaltsales@uk.heidelbergmaterials.com