ULTI DRIVE
POROUS
The ultimate porous driveway surface
ULTIDRIVE POROUS is a porous asphalt with excellent drainage characteristics and proven long term durability.

Our driveways are under daily attack. As cars become more powerful, modern asphalt has to develop to cope with scuffing and abrasion from power assisted steering. In addition, fuel or oil spillages will quickly degrade standard bitumen binders.

ULTIDRIVE POROUS combines excellent drainage characteristics with long term durability using a modified binder which provides enhanced fuel resistance. It is a hard wearing permeable asphalt that eliminates the problem of surface water whilst meeting relevant local planning requirements.

ULTIDRIVE POROUS is available as a 6mm or a 10mm surface course and a 20mm and 32mm binder course providing effective drainage, whilst maintaining long term durability.
Proven performance
Using the latest Porous Asphalt technology and a modified binder, the open aggregate structure allows effective drainage and ensures no surface water ponding.

Enhanced compliance
The porous structure acts as a short term reservoir for rainwater and reduces direct surface water run-off to meet the requirements of planning regulations and the Code for Sustainable Homes.

Improved safety
Excellent drainage characteristics eliminate the problem of both standing water and ice patches that can typically occur in cold weather conditions.

Faster completion
When used with a porous receiving course, ULTIDRIVE POROUS avoids the need for expensive additional drainage, thereby allowing quicker project delivery and reduced disruption to clients and end users.

Ultimate solutions
Available as a porous surface and binder course for driveways and car parks. When combined with the Tarmac ULTIFLOW range of drainage aggregates, ULTIDRIVE POROUS offers a complete sustainable drainage solution.

HOW IT WORKS
ULTIDRIVE POROUS is an engineered asphalt that has been designed for excellent drainage and a long lasting finish.

Exceptional drainage
Traditional paved surfaces are laid to shed water. Unfortunately this can mean that drains are quickly overwhelmed after heavy rainfall. As a result, planning rules increasingly require proposals for large paved areas to include measures to reduce the risk of localised flooding.

Supplied to accredited contractors as a surface course and porous binder course, ULTIDRIVE POROUS offers a complete drainage solution for driveways and parking areas. The open structure means that rainwater quickly flows into the asphalt structure and is then slowly released into the ground, helping to avoid standing water and flooding.

Longer lasting finish
The modified binder in ULTIDRIVE POROUS improves workability and delivers a tough, durable finish with enhanced resistance to the stresses associated with power steering and oil spills. Effective aggregate interlock from the design and installation process means that ULTIDRIVE POROUS has a more open aggregate structure and excellent drainage characteristics.
Private driveway - Oldham

CHALLENGE
With a steep gradient and stringent planning requirements, this private driveway presented the architect with a number of problems. The local planning department specified that measures were needed to control surface water run-off in order to help mitigate local flood risk.

SOLUTION
The contractor recommended ULTIDRIVE POROUS citing proven long term durability, ease of handling and impressive drainage characteristics.

RESULT
ULTIDRIVE POROUS was delivered and laid within the specified time frame, avoiding delays to the client’s schedule. Its smooth, even finish complemented the design of the client’s property and the permeable surface eliminated the need for additional ironwork.

Car parking area - Crewe

CHALLENGE
The parking area for this sheltered housing complex needed to be well drained and maintain safety for vulnerable residents. Conventional approaches would have required additional excavation to install soak-aways.

SOLUTION
ULTIDRIVE POROUS was recommended as offering a safe, well drained surface that could be installed quickly using standard paving methods.

RESULT
ULTIDRIVE POROUS was laid as a binder and surface course over a free draining sub-base layer. The smooth, even surface is now safe for residents and visitors to walk on and drains quickly, even after heavy rain.

ULTIMATE FINISH
With improved drainage and long-term durability, every drive should be a ULTIDRIVE.
EXPERT ADVICE AND SUPPORT

TYPICAL APPLICATIONS

Where site conditions or planning requirements make drainage a priority, ULTIDRIVE POROUS offers the solution. It requires less groundwork and excavation than alternative rainwater management systems, helping to save time on site and reduce disruption for clients.

FOR DRIVEWAYS:
- 6mm porous surface course (recommended at 30mm thickness) suitable for hand lay.
- 20mm porous binder course.

FOR CAR PARKS:
- 10mm porous surface course (recommended at 35mm thickness).
- 32mm porous base/binder course for larger car parks.

SPECIALIST BASE AGGREGATE:
Tarmac’s ULTIFLOW sub-base aggregate is recommended for a complete permeable pavement solution.

TECHNICAL DATA

<table>
<thead>
<tr>
<th>ULTIDRIVE POROUS</th>
<th>Typical Air Voids (%)</th>
<th>Typical Stiffness (ITSM)</th>
<th>Typical Water Sensitivity (ITSR)</th>
<th>Typical Hydraulic Conductivity</th>
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<tr>
<td>Relevant standard</td>
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<td>BS EN 12697-28</td>
<td>BS EN 12697-12 DD229</td>
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COMPARATIVE RAINFALL
- Worst recorded UK rainfall: 341mm in one day (averaging 15mm/hr for 22 hrs) in Cumbria in December 2015.
- A Hydraulic Conductivity of 5300mm/hr (above the 5000mm/hr min. requirement for 6mm) would take ≈94 seconds to drain 15mm of water.
- A Hydraulic Conductivity of 11000mm/hr would take ≈44 seconds to drain 15mm of water.
OUR SUPPORT

FAQs

How does ULTIDRIVE POROUS improve drainage?
Available as a surface and binder course, the open structure of ULTIDRIVE POROUS allows surface water to flow quickly into the structure and thereafter slowly released into the ground.

What other driveway and parking surfaces are available?
In addition to ULTIDRIVE and ULTIDRIVE POROUS, Tarmac supply ULTIFASTPAVE for fast, single pass resurfacing of high traffic sites. For historic buildings and heritage sites we also supply Ultifinish, a specialist asphalt with the classic appearance of a loose gravel.

What other drainage solutions do Tarmac supply?
ULTIFLOW is a range of drainage aggregates with a proven history of effective performance. Our contracting division can also design and install ULTISUDDS, a complete sustainable drainage system.

How does ULTIDRIVE POROUS achieve a long lasting finish?
ULTIDRIVE POROUS uses high grade aggregates and each design is engineered to ensure that the optimum binder content for the specific aggregate is selected. Together with the advanced binder technology, this ensures the long term durability of the completed surface.

Why is ULTIDRIVE POROUS a safer solution?
ULTIDRIVE POROUS eliminates the problem of surface water and reduces the rate of formation of ice during winter months. It also avoids the tripping hazards associated with uneven block paving.

Does ULTIDRIVE POROUS offer improved oil resistance?
The modified binder in ULTIDRIVE POROUS provides improved resistance to oil spillage compared to conventional asphalts. Tarmac ULTISHIELD is also available for areas where regular oil spillage is anticipated and the impact of such is the key concern.

Is ULTIDRIVE POROUS available in other colours?
ULTIDRIVE POROUS is available in black or red as standard. However the Tarmac ULTICOLOUR range also offers porous asphalt in various other colours, for driveways and a wide range of other applications.

How can I be sure that ULTIDRIVE POROUS is laid correctly?
ULTIDRIVE POROUS is only available for installation by accredited contractors who have full access to our expert training, advice and technical support.

Why is ULTIDRIVE POROUS a more sustainable solution?
As a surface and binder course, ULTIDRIVE POROUS helps to control urban径流 and reduces CO2 emissions by delayed release of stormwater into the ground.

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MORE ANSWERS
For more information about Tarmac ULTIDRIVE POROUS contact your local regional office or visit tarmac.com