

March 2017

Pothole Action Fund

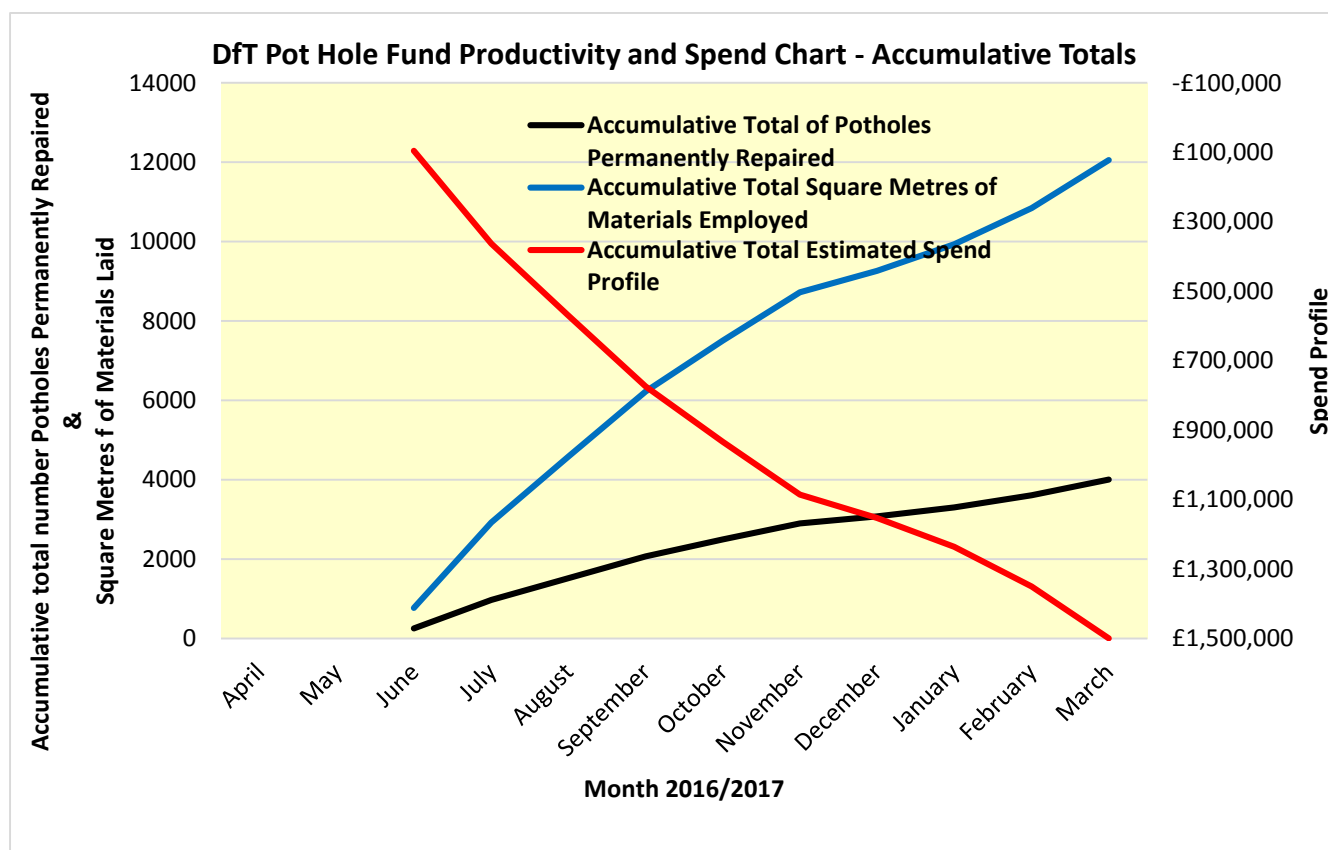
The Department for Transport (DfT) provided an additional £1.5 million to Essex County Council to tackle road potholes in 2016/2017. This funding enhances the existing ECC funding for similar road repairs in 2016/2017 of £1.5 million, making a combined total of £3 million.

Essex Highways complies with best practice in its road repairs, and therefore invests in 'right first time' value for money permanent repairs. This approach reflects the Highways Maintenance Efficiency Programme (HMEP) guidance, which is an industry led but government promoted initiative to encourage good asset management practice.

This funding has facilitated additional road pothole repairs to be undertaken across all road hierarchies across the County. The most appropriate treatments have been selected on a site by site basis, but predominantly the treatment selected has been traditional patching for quality, long lasting repairs.

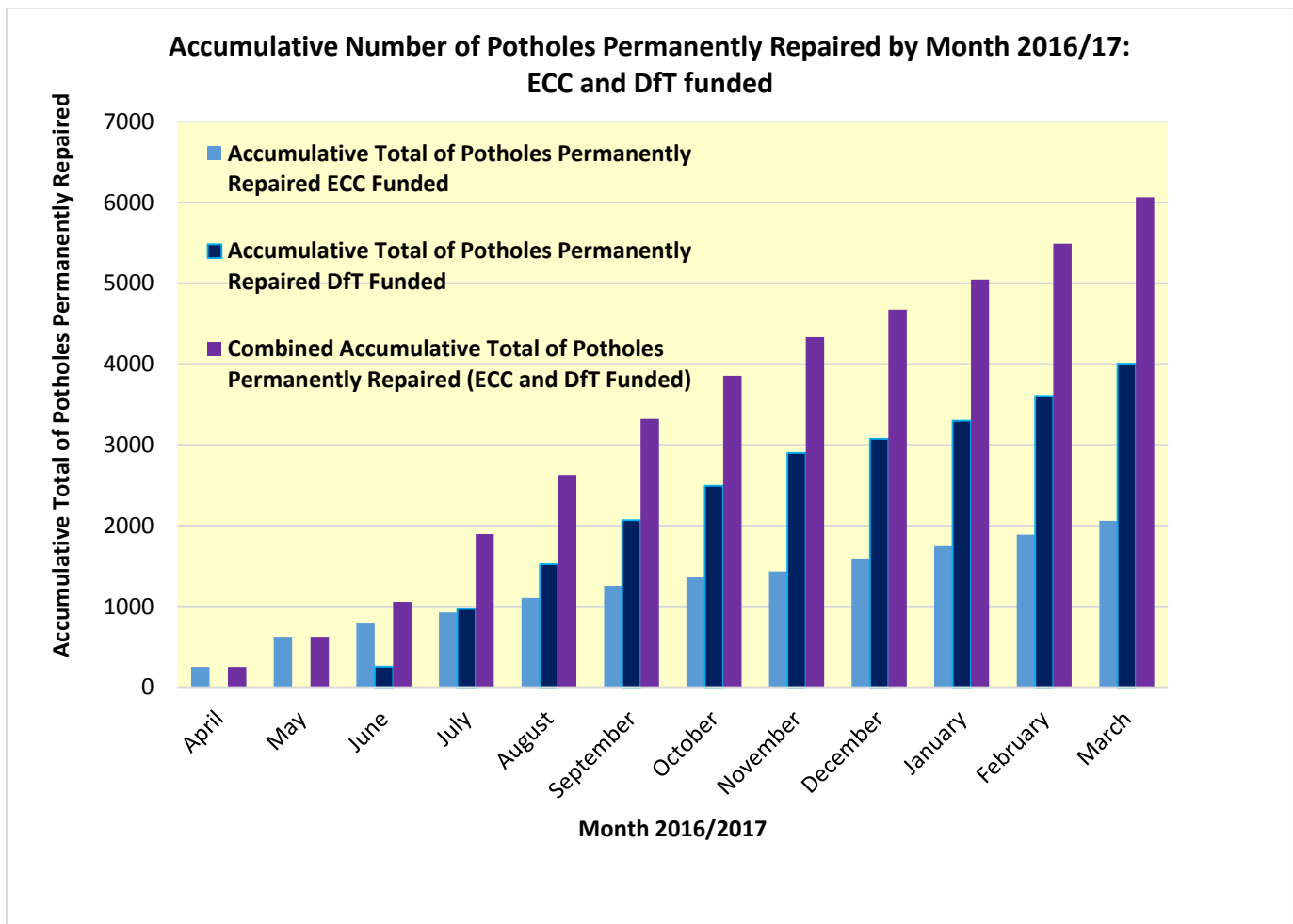
Chart 1 below shows the accumulative number of potholes repaired by month, and the corresponding accumulative quantity of materials used, undertaken using the DfT funding. The information includes accumulative spend by month.

Chart 1: DfT Pothole Action Fund Productivity and Spend Profile 2016/17 – Accumulative Information by Month.



The productivity relating to the ECC funding element is not included in Chart 1 above, but accounts for around 2,100 additional road pothole repairs and an additional 7,600 square metres of materials used. The combined accumulative productivity (ECC funded plus DfT funded) is detailed in Chart 2 below which clearly shows the enhanced number of repairs attributable to the DfT Pothole Action funding. The combined total number of potholes repaired is over 6,000.

Chart 2: Accumulative Total number of Pothole Repairs by Month, ECC Funded, DfT Funded, and Combined ECC and DfT funded.



Note that the information above relates to general maintenance which addresses localised defects such as potholes. The road condition improvements such as resurfacing undertaken using capital funding, which addresses structural road condition, are not shown here.

Why minor defects such as potholes are unlikely ever to be eradicated completely

We can all be proud of the programmes of works being undertaken on roads across Essex throughout 2016/2017, including minor repair works such as fixing potholes as well as more substantive works such as resurfacing. Whilst these will make a significant contribution to addressing road condition, however, they will not solve the problem of the occurrence of potholes entirely. Why not?

It can sometimes seem a mystery as to why potholes form at all. Why after extensive minor repairs have been carried out more potholes eventually reappear. There are a number of factors which create this phenomenon. The penetration of water is a major cause of road deterioration, but another major cause is oxidation. Exposure to the air over time causes the road surface to harden and become brittle, and this makes the surface prone to cracking, which then allows the penetration of water. Regrettably we have an ageing road network. This is not peculiar to Essex but merely describes the roads across the entire country. New and extensive resurfacing can be expected to remove any significant incidence of potholes for a number of years, but generally the older the network becomes then the more it will reveal the effects of ageing – such as the occurrence of potholes.

The other contributor to the occurrence of potholes is the actual construction of the roads. Roads of modern construction are less prone to the formation of potholes, but the majority of our roads have 'evolved' over time and have not been constructed to the standards that would be expected of a newly built road today. These 'evolved' roads are more prone to the occurrence of potholes, not least as they provide much less resilience to the effects of extreme weather (expansion through freezing in the winter, and contraction due to drying out in the summer).

For more information about potholes please refer to the HMEP report 'Pothole Review: Prevention and a Better Cure' accessed via the link below

<http://www.highwayefficiency.org.uk/efficiency-resources/asset-management/the-potholes-review.html>

At the heart of the HMEP recommendations for addressing potholes are practices which have long been adopted by Essex Highways:

- **Intervening at the right time** with preventative treatments (such as Surface Dressing and Micro Surfacing) to reduce the amount of potholes forming, thereby preventing bigger problems later
- **Getting it 'Right first time'** with permanent, high quality repairs to reduce the cost of revisits
- **Providing clarity to the public** – through communicating to the public what is being done and how it is being done. Not only is Essex Highways providing this information through its website and press releases, but it has

recently launched a new interactive pothole reporting tool. A website facility to report a pothole or other highway problem has been available to the public for almost ten years, but this interactive tool is a new and far more sophisticated service. The new tool will provide information on whether or not the pothole has already been reported, whether it is to be addressed through planned works, as well as when the next safety inspection is due for the road in question.

The continued occurrence of potholes is acknowledged by the DfT, and we anticipate receiving further Pothole Action funding in future years – funding which will enhance not displace our spending plans. This is good news for all road users.