Wiltshire Council

Environment Select Committee

21 November 2017

Subject: Local Highways Investment Fund 2014 - 2020

Cabinet Member: Councillor Bridget Wayman - Highways, Transport and Waste

Key Decision: No

Executive Summary

The local highway network is vital for businesses and communities, and effective maintenance to ensure its availability is essential to the economic development of the county. Wiltshire Council recognises the importance of maintaining and managing its highway network effectively.

The 'Local Highways Investment Fund 2014 - 2020' is addressing the longstanding under investment in highways maintenance, which has been a problem nationally for many years. The significant investment of £21 million annually in recent years by Wiltshire Council has already seen a substantial improvement in the condition of the county's road network, with a significant number of roads treated (see **Appendix 1**).

This year a large programme of footway works has been included in the programme (see **Appendices 2 and 3**), and a further £150,000 has been made available for the Area Boards to prioritise footway improvements or maintenance. In future years further investment will be required to address the backlog of maintenance on the footways.

Budgets and funding for highway maintenance have not yet been agreed for 2018/19. Provisional lists of schemes have been prepared for next year (**Appendix 4**) which set out the schemes that would be delivered if funding is set at the level of the Department of Transport (DfT) Maintenance Block, and the additional sites which could be included should the enhanced funding for the Local Highways Investment Fund continue next year.

As a result of the investment in recent years, the overall condition of the road network in Wiltshire has improved considerably. Road conditions in Wiltshire are now better than the national average (see **Appendix 5**). However, it is clear that there is still scope for further improvement, and there is still low public satisfaction with road conditions.

With an extensive road network and aging infrastructure there is a need to plan for long term asset renewal. Good progress has been made on reducing the road maintenance backlog in recent years, but other highway assets, including street lighting, safety fences, road signs, footways and traffic signals will need investment to keep them safe

in the future and to avoid expensive unplanned emergency repairs.

Proposals

It is recommended that the Environment Select Committee:

- (i) Endorses that good progress has been made in regard to implementing the 'Local Highways Investment Fund 2014 2020'.
- (ii) Supports that the statement that there has been a substantial improvement in the condition of Wiltshire's roads in recent years, but further investment is still required.
- (iii) Considers the provisional highway maintenance scheme lists for 2018/19, which have been prepared for each of the Area Boards, and accepts that these will have to be finalised when budgets are agreed.
- (iv) Recognises that a further £4,861,000 would be required to bring the funding up to the £21,000,000 annual investment (as envisaged in the original Local Highways Investment Fund 2014 2020 report), assuming DfT funding is at the anticipated levels.

Reason for Proposals

The highway network forms the Council's largest asset, and it is important that it is maintained in the most cost-effective way that demonstrates value for money. This includes the use of asset management and whole life costing approaches to inform investment decisions.

Asset management principles have been applied for many years in Wiltshire to ensure that there is appropriate investment with longer term planning for the management of the highways assets.

Alistair Cunningham Corporate Director

Wiltshire Council

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Purpose of Report

1. To provide an update on progress on delivering the Council's 'Local Highways Investment Fund 2014 – 2020'.

Relevance to the Council's Business Plan

- 2. The Wiltshire Council Business Plan 2017 2027 sets out the vision to create strong communities, with priorities for growing the economy, strong communities and protecting the vulnerable. As part of growing the economy it is acknowledged that it is necessary to bring the county's roads up to an acceptable state. The goal is that road infrastructure is improved and to:
 - Improve asset management and the use of investment to improve the condition of Wiltshire roads (implementing our Highways Asset Management Strategy).
 - Promote and further development the MyWiltshire app to improve and increase the reporting of issues.

Background

- 3. The local highway network is vital for businesses and communities. Effective maintenance to ensure its availability is essential to the economic development of the county. Wiltshire Council recognises the importance of maintaining and managing its highway network effectively, and is making a significant investment in improving the condition of its highway assets.
- 4. The highway network in Wiltshire comprises 4,400 kilometres of road, 3.9 million square metres of footway, 981 bridges and over 50,000 street lights and illuminated signs. The replacement value of the assets is over £5 billion, and it would cost over £330 million to resurface all of the roads. It is the Council's largest asset.
- 5. The condition of the county's roads is important to the public. This is demonstrated by the results of previous People's Voice surveys and the annual National Highways and Transportation (NHT) surveys, which indicate low levels of public satisfaction with road conditions nationally.

6. This report provides an update on the Council's current highway investment programme.

Main Considerations for the Council

Local Highways Investment Fund 2014 – 2020

- 7. The 'Local Highways Investment Fund 2014 2020' is addressing the longstanding under investment in highways maintenance and the consequent backlog, which has been a problem nationally for many years. The Council's major programme of investment in highway maintenance, which was originally proposed to be over six years, is delivering a significant improvement in the condition of the county's highway network.
- 8. The programme is in its fourth year, and there has already been a substantial amount of work completed, and an overall improvement in road conditions. The investment was initially targeted at those roads in worst condition, especially the main roads, and the approach has now been expanded to include more preventative maintenance on the minor roads and renewal of footways.
- 9. The majority of the schemes in the 2017/18 programme have been completed. There have been a few minor roads which formed part of the surface dressing programme which have not been completed, because of the need for particular equipment. These are being programmed for early next year. The programme of footway renewal and reactive carriageway repairs will continue until March.
- 10. At the start of the programme, it was intended that the investment should be used to improve approximately 664 kilometres of the network (about 15% of the total road length). As some of the roads will continue to deteriorate during this period, a greater proportion of the network has to be treated to achieve the overall improvement at the end of the period.
- 11. In the first year of the investment there were a number of sites which needed major reconstruction work and the lengths of road treated were less than originally envisaged. However, a substantial programme of surface dressing has been undertaken in recent years, and the total lengths of road resurfaced have increased considerably.

Year	Length treated (kilometres)
2014/15	148
2015/16	182
2016/17	250
2017/18	181
Total	761

12. By the end of this year a total of 761 kilometres of road will have been resurfaced since 2014, which is about 17% of the network (see **Appendix 1**), and the Council is on target to achieve the anticipated improvement by 2020, subject to funding continuing at current levels. There have also been a significant number of smaller sites treated with hand patching, which are addressing localised areas in poor condition.

13. The detailed calculation of the backlog carried out by the Council's specialist consultants, WDM, indicates that there has been a significant reduction of 30% in the backlog in the first two years of the investment:

	2013/14	2014/15	2015/16	2016/17
Calculated	£69.4 million	£63.3 million	£48.2 million	To be
backlog				confirmed

14. Good progress is being made in reducing the backlog, but further investment, as originally envisaged, will be required to significantly reduce the remaining backlog. There is still a substantial amount of resurfacing work identified as still being required on the network, and this will need to be programmed for future years.

Footways

- 15. At the start of the programme it was intended that footways should be resurfaced at the same time as the adjoining roads were resurfaced. However, it became apparent that in many cases the footway immediately adjacent to the road was not necessarily the highest priority in the area. It was therefore decided to implement a separate programme of footway renewal and resurfacing.
- 16. A substantial budget of £1.25 million was included in the programme for 2017/18 for footway resurfacing and renewal, and good progress is being made completing this work. The sites were identified by the local highways staff using the recently completed footway condition surveys (see **Appendices 2 and 3**). In addition, the Council has made available a further £150,000 for the Area Boards to prioritise footway improvements or maintenance.
- 17. The budget available for footways for next year is uncertain, but consideration is currently being given to potential sites. Local members are encouraged to contact their local highways engineers if there are sites that are of particular concern locally.

Schemes for 2018/19

- 18. The Council has a new Business Plan which includes the use of investment to improve the condition of Wiltshire roads. However, the budgets for 2018/19, including for road maintenance, have not been agreed. Therefore, it is impossible to state with certainty what will be included in the programme for next year.
- 19. Provisional lists of schemes has been prepared (**Appendix 4**) which set out the schemes that would be delivered if funding is set at the level of the DfT Maintenance Block, and the additional sites which would be included if funding for the Local Highways Investment Fund continues next year. Over 100 sites have been identified for implementation next year with the DfT funding. A further 37 sites and an extensive footway surfacing programme would be included if funding is maintained at 2017/18 levels. A number of schemes have been identified for possible implementation in future years and these have also been included.

- 20. There will also be a number of skid resistance sites to be added to the lists when the assessment work currently underway is completed. This may require some adjustment of priorities if particular sites have to be treated because of safety issues. It is important to note that the currently identified scheme list is provisional at this stage.
- 21. The inclusion of a substantial footway programme similar to this year's would be possible if the higher funding level continues.

Comparison of road conditions with other authorities

- 22. Road condition data is derived from surveys carried out by vehicle mounted lasers which measure carriageway conditions, including cracking, deformation and surface texture. The results are used to identify 'roads where maintenance should be planned soon' expressed as a percentage of the length of that type of road surveyed. A low percentage is good. It is a DfT approved survey methodology which allows a comparison of road conditions across authorities, mainly for classified roads.
- 23. As a result of the recent investment, the overall condition of the road network has improved considerably, and road conditions in Wiltshire are now better than the national average (see **Appendix 5**). They compare well with the similar authorities in the south west, with B and C class roads being better than the south west average, but the A class roads are generally not as good.
- 24. The A class road condition for Wiltshire based on the 2015/16 survey results is 3% where maintenance should be planned soon, which is better than the national average of 5%, and the same as the south west counties average of 3%.
- 25. The B and C class road condition in Wiltshire is much better than the national average. At 4% where maintenance should be planned soon it is half the national average of 8%, and better than the south west counties average of 6% for these types of road.
- 26. The condition of the unclassified roads is more difficult to compare as the assessment methods are not necessarily consistent across authorities. In general terms, the condition of the more important unclassified roads in Wiltshire compares well with those of similar authorities in the south west, but further assessment will be required to get a better understanding of minor road conditions across the south west.

Future challenges

- 27. The importance of the condition of carriageways is well understood, and long term improvements have been seen in Wiltshire with the introduction of the 'Local Highways Investment Fund 2014 2020'. Continuing this level of investment by the Council in the future may be difficult, but will be important in order to continue to reduce the road maintenance backlog.
- 28. The increased capital funding from DfT through the Incentive Funding and the National Infrastructure Productivity Fund in 2017/18 is welcomed, and has increased highways funding for capital works. It has provided the opportunity to start to address some of the other effects of aging infrastructure and the years of under investment nationally in renewing highway assets.

- 29. A particular concern is the condition of the Council's street lighting columns. Unlike a number of other authorities, it was not possible to obtain a Private Finance Initiative scheme to renew the street lighting, and the bid to DfT for Challenge Funding for column replacement in 2015 was not successful. With many of the columns becoming life expired, it has been necessary to increase the structural testing and ad-hoc removal of columns. A replacement programme for all of the older columns would cost in the region of £7,000,000. Expenditure of about £200,000 is currently being incurred annually to replace aging columns, but this may need to be increased significantly in future years as the equipment continues to age.
- 30. There are over 200 sets of traffic signals on the county's roads, with 23% of them over 20 years old, and renewal will soon need to be considered for most of these units. Also of concern is that 44% of them are over 15 years old, which indicates that there will be an increasing number to replace in future years. A start is being made on replacing the older units with more efficient equipment, which should also help traffic flow and reduce congestion. It is anticipated that expenditure of about £300,000 a year will be required over the next few years to meet the need for traffic signal asset renewal.
- 31. Road sign renewal and road marking replacement has been mainly funded from the routine highway maintenance budget in the past. The pressure on revenue budgets has seen a reduction of funding available for the less urgent work over the years. This has been reflected in a decline in the condition of many signs and road markings. A sign renewal programme is now being funded from highways capital funding. Lining, and cat's eyes renewal, is being undertaken as part of a programme of work to improve road safety and the operation of junctions. There will be a continuing need to fund signing and lining renewal to improve the condition of these important aids to road safety.
- 32. With an extensive road network and aging infrastructure there is a need to plan for long term asset renewal. Good progress has been made on reducing the road maintenance backlog in recent years, but other assets, including street lighting, safety fences, road signs, traffic signals and bridges, will need investment to keep them safe and to avoid unplanned emergency repairs in the future.

Safeguarding Implications

33. None.

Public Health Implications

- 34. The condition of roads and related infrastructure can have serious safety implications, especially with regard to skid resistance and condition of highways and the contribution they can make to reducing accidents. Roads, bridges, highway structures, signs and street lighting need to be kept in good condition in order to protect the public and those maintaining the assets.
- 35. The investment through the 'Local Highways Investment Fund 2014 2020' is improving the condition of the highway network and should help improve safety. The current strategy to maintain and improve the highway assets should help to reduce traffic accidents and vehicle collisions.

Corporate Procurement Implications

36. There are no procurement implications at this stage.

Equalities Impact of the Proposal

37. The improved maintenance of the highway network, its management using sound asset management principles, and good performance by the highways contractors, should benefit all road users, including public transport, and vulnerable road users such as cyclists and pedestrians.

Environmental and Climate Change Considerations

- 38. The effects of climate change could be significant for the highway network. There was considerable damage to the roads, footways and drainage systems in the flooding of 2014, and such events could be repeated. Having robust maintenance strategies to improve the condition of the network and good maintenance contractors will help build resilience into the highway network and the infrastructure.
- 39. Where possible, suitable materials arising from road resurfacing schemes are recycled. Large quantities of road planings are used on rights of way to repair damage and on county farms, or provided to community groups. The presence of tar bound materials in older carriageways has caused problems on some sites; as it has to be disposed of as contaminated waste, with consequent cost implications. Options for in-situ and other recycling processes are being investigated in order to increase the recycling of highway materials.
- 40. The use of 'warm' asphalt for surfacing on the network in Wiltshire has increased significantly in recent years. The material has proved durable and the process produces less carbon than traditional methods.

Risk Assessment

41. The application of good asset management principles, the planned maintenance of the highway infrastructure, and the establishment of formalised asset management policies, helps reduce the risk of incidents and claims.

Risks that may arise if the proposed decision and related work is not taken

- 42. No specific decision is required at this time, but it should be noted that there is a risk of increased accidents, claims and public dissatisfaction if the programme of highway maintenance and services are not delivered or delayed. The principles of asset management have been followed by this Council for many years, and there is a need to demonstrate best practise and obtain best value for money.
- 43. Future DfT funding will be dependent on demonstrating the application of good practise and asset management principles. Failure to do so will result in reduced funding in future years.

Risks that may arise if the proposed decision is taken and actions that will be taken to manage these risks

44. No decision is required. However, it should be noted that it is important to ensure that highways asset management and service delivery are implemented effectively. Processes are currently in place with Service Delivery Teams managing the various aspects of the highway services, and these are the appropriate groups to continue to manage the associated risks. The teams include representatives from the Council, consultants and contractors involved in delivering the services, and they report to the Contract Management Meeting comprising senior managers from those organisations.

Financial Implications

- 45. The highway network and related infrastructure forms the Council's largest asset, and has a replacement value of over £5 billion. It is important that it is maintained in the most cost-effective way in order to obtain value for money. This includes the use of a whole life costing approach to inform investment decisions on highway maintenance.
- 46. The capital budget for 2018/19 has not been finalised at this stage, and there is no certainty that funding will be available to continue the highway maintenance investment programme for its remaining two years. A reduced programme has been identified for implementation should the full funding not be available.
- 47. The likely funding from DfT for highway maintenance in 2018/19 has not been confirmed yet, but initial indications are that it is likely to be:

Funding	£ million
DfT Maintenance block (needs based allocation)	13.357
Incentive Funding (Assuming Band 3)	2.782
Total	16.139

- 48. A further £4,861,000 would be required to bring the funding up to the £21,000,000 annual investment as envisaged in the original Local Highways Investment Fund 2014 2020 report, assuming DfT funding is at the anticipated levels.
- 49. The increasing drive for asset management from DfT will mean that failure to demonstrate the application of this approach will result in reduced funding from central government through the incentive fund. It is therefore important to meet the requirements of the incentive funding self assessment, and measures are in place to ensure this.

Legal Implications

50. The Council has a duty under the Highways Act to maintain the county's roads. The highway inspection procedures, policies and improvement plans ensure that this duty is fulfilled. The increased investment and improved road conditions in recent years is helping the Council meet its responsibilities with regard to road maintenance.

Options Considered

51. There is a need to continue to apply asset management principles to the highway network and to ensure the performance of the contractors involved in delivering the service is good; in order to keep the network in good condition and to ensure value for money.

Conclusions

- 52. The highway network forms the Council's largest asset, and it is important that it is maintained in the most cost-effective way in order to show value for money. This includes the use of whole life costing approaches to inform investment decisions.
- 53. The 'Local Highways Investment Fund 2014 2020' provides the opportunity to address the longstanding under investment in highways maintenance, which has been a problem nationally for many years. The significant investment of £21 million annually for six years by Wiltshire Council is seeing a substantial improvement in the condition of the highways network.
- 54. Good progress has been made in delivering the programme of highway maintenance and has included the involvement of the Area Boards to help set local priorities. It is intended that this process should continue in future years, and that improvements should be made to the information provided to the Area Boards, members and the public.

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The following unpublished documents have been relied on in the preparation of this report:

None

Appendices

Appendix 1 - Roads treated and planned 2013 -18

Appendix 2 - List of footway sites 2017/18

Appendix 3 – Map of footway sites 2017/18

Appendix 4 - Provisional Scheme List 2018/19

Appendix 5 - Comparison with road conditions in the south west