Network Management and Coordination

The core purpose of Network Management is to ensure the safe, free-flowing movement of traffic, people and freight across the Oxfordshire road network. The Traffic Management Act (2004) places a Duty on the Council to reduce and manage congestion and to collaborate effectively with other traffic authorities to achieve this.

Oxfordshire County Council, as the Streetworks Authority, is ultimately responsible for ensuring a co-ordinated approach to maintaining public safety through approval of all works on the public highway, whether these be OCC projects, public utility works, private schemes, or events. It is supported by the New Roads and Streetworks Act 1991 (NRSWA) and its relevant Regulations and Codes of Practice which provide a legislative framework for all works on the network.

Our key objectives are therefore to:

- Promote economic activity in and through the county
- Enable access to employment, leisure and educational facilities for all
- Reduce traffic congestion, air and noise pollution
- Reduce accidents and promote public safety

Potential Changes to our Policy

A key focus of our updated Network Management policy could be to directly influence transport movement at both strategic and local levels, through providing support for sustainable travel choices, i.e. cycling, walking, bus and rail. Network Management would continue to integrate data from a range of supporting systems to:

- Use all public outlets including Variable Message Signs (VMS), Real Time Passenger Information (RTPI) displays, social media and Journey Planning portals to promote the availability of sustainable and active travel modes including public transport, walking and cycling. This can include information campaigns designed to positively influence ‘modal choice’ and to reduce pollution in Oxford City Centre and other Air Quality Management Areas, thereby minimising the impacts of congestion on the road network asset and improving local residents’ awareness of health and wellbeing in their decision making.
- Introduce priority at traffic signals, to improve journey times for buses and cyclists, and parking guidance systems which enable the more efficient use of available car parking spaces. The overall focus is therefore to reduce journey times for sustainable transport modes, and to reduce congestion and pollution.
- Discourage the use of the Oxfordshire road network during periods of major disruption, events or pollution incidents. Climate change and reducing carbon from transport is driving the Council to integrate its Network Management approach more deeply with external agencies such as Highways England and local bus/rail operators to prevent gridlock and severe harm to the environment. On a practical level this will involve implementing agreed traffic control and information strategies, while enabling Oxfordshire residents, businesses and communities to thrive– for example traffic

management measures appropriate to the place and local road network within which works or events are occurring.

- Continuously monitor and forecast usage of the network, actively managing and controlling incidents, but expanding our role to include the effective management of energy across a range of Council services including Street Lighting assets and developing the potential for a ‘regional’ hub service covering transport networks across the wider area.

Opportunities

Central government’s ‘Road to Zero’ strategy sets out ambition for at least 50% of new car sales to be ultra-low emission by 2030, alongside a massive investment in charging infrastructure to support the electric vehicle ‘revolution’. Whilst recent air pollution decreases in Oxford are welcome, updated proposals for a Zero Emission Zone (ZEZ) are intended to improve vehicle emission standards even further with wider air quality benefits for the county as a whole. Network Management could act as the hub for pollution monitoring, publicising where they exceed legal thresholds, and influencing travel choices to mitigate the impacts.

The Council’s Innovation team is collaborating with industry and research partners, to develop next generation Network Management systems, fulling utilising Artificial Intelligence (AI) to model and simulate traffic, cycling and pedestrian flows within a real-time environment, thereby providing a more effective and comprehensive traffic management service for all.

Network Management can contribute to higher rates of walking and cycling, as well as supporting the development of a reliable, punctual local bus network, through effective co-ordination of highway works and events.

Summary

We want to widen the scope of Network Management’s role beyond the management of highway works and car traffic across the local and wider road network. We believe government policy determines that Network Management should play a far greater role in influencing travel choices, promoting modal shift and reducing the impact of car traffic on the environment

Question 23

Network Management and Coordination - What do you think?

How do you think Network Management should balance the transport needs of the

county as whole (and indeed the wider region) with those of local communities?

What do you like about these proposals or think needs to change?

To respond please use the online consultation form.