

# Contents

СН	APTERS		APPENDICES
1	Introduction	3	1 Logic maps
2	Policy context	8	
3	Challenges and opportunities	15	
4	OIP objectives	41	
5	Identifying potential options	48	
6	Shortlisting options	66	
7	Emerging strategy and next steps	74	

99



# Introduction

#### **Background**

An Optimised Infrastructure Plan (OIP) has been produced for Farnham by Surrey County Council (SCC), Waverley Borough Council (WBC) and Farnham Town Council (FTC), with the support of Jeremy Hunt MP. Atkins, Arcadis and PJA have assisted the three councils in developing the OIP.

This document sets out the OIP, including policy context, challenges and opportunities, objectives, potential options and emerging strategy and next steps.

The OIP is based on a collective assessment of the issues facing the town and how they can be addressed, with the goal of facilitating the required change in order to help Farnham become a better, more environmentally friendly place for those who live, work, study in, or visit the town.

The Farnham Vision Statement was produced for SCC, WBC and FTC by Arcadis. The Vision Statement sets out the rationale for developing the OIP, and provides an overview of the proposed approach, the scope of projects that sit within the programme, the key outcomes and benefits that will be realised by the OIP.

The Vision Statement was published in October 2020 and a public consultation was held from 1st October to 8th November 2020. In parallel to the public consultation and engagement events, the OIP team has liaised with neighbouring authorities, including Hampshire County Council and adjoining Borough Councils in both Surrey and Hampshire, to understand their growth plans and infrastructure challenges, opportunities and plans, to ensure effective collaboration as authorities plan for the future.

The initial draft version of the OIP was developed between October 2020 and January 2021. It took account of the feedback from consultation on the Vision Statement and was also informed by public engagement through a series of Local Liaison Forums (LLFs) – public engagement sessions, hosted by FTC online via Zoom and Facebook.

The draft OIP was published for consultation in February 2021. The consultation was widely publicised through multiple channels and there was a high level of engagement from residents and stakeholders. This feedback has been invaluable in helping to shape this final version of the OIP, and the OIP team would like to thank everyone who has contributed to shaping the development of the Plan.

#### Introduction

#### **Legal and Policy Context**

Significant changes in the legal and policy context have taken place over the last decade. This means that important changes have taken place since previous studies were undertaken (and proposals developed) for the town.

In 2019 the Government passed into law an amendment to the 2008 Climate Change Act [The Climate Change Act 2008 (2050 Target Amendment) Order 2019] which, in conjunction with the 2015 Paris Agreement binding international treaty on climate change, have profound implications for the UK. The UK is now legally obliged to ensure it becomes Net Zero carbon as a nation by 2050. This requires significant and immediate change across all industries, including transport, in order to reach the nation's decarbonisation goals.

These legal statutes have critical implications for the funding of future infrastructure schemes. This is important because, whilst the core town centre elements are likely to be funded by SCC, it is likely that significant central government capital funding will be needed to meet the full programme aspirations for Farnham. This will require a strong business case based on the Treasury's Green Book for business cases, with a clear rationale for intervention (Strategic Case), benefits that significantly exceed costs (Economic Case), and defined strategies for securing funding, procurement, and project delivery (Delivery Cases).

In order to secure funding from central government all schemes must comply with current legislation and policy objectives, including the decarbonisation of the UK and the Net Zero carbon by 2050 objective. Schemes that do not comply will not receive funding.

A new National Infrastructure Strategy (NIS20) was published in November 2020 alongside the 2020 Spending Review (SR20). The NIS20 outlines the Government's ambition to deliver radical improvement in the quality of the UK's infrastructure, to help level up the country and put the UK on the path to Net Zero emissions by 2050.

SR20 outlined three key Government priorities: 1) getting through Covid-19, 2) stronger public services, and 3) infrastructure. Key infrastructure focal areas include improved technology (faster broadband and 5G), a greener future, and transport. SR20 outlines the following key outcomes for the DfT: tackling climate change and improving air quality by decarbonising transport.

All potential capital funding sources will be explored for infrastructure interventions and improvements identified for Farnham as part of the OIP, including Local Enterprise Partnerships (LEPs), the Ten Point Plan to support green growth, the Towns Fund, NIS20, and the Levelling Up Fund.

#### Introduction

Funding is also available for electric vehicle charging infrastructure through the Office for Zero Emission Vehicles (formerly The Office for Low Emission Vehicles), including the Workplace Charging Scheme (WCS) and The Electric Vehicle Homecharge Scheme (EVHS).

Alternative sources of infrastructure funding associated with development led initiatives will also be considered (for example, the Housing Infrastructure Fund (HIF)).

The Farnham OIP project team will be liaising with Transport for the South East (TfSE) – the sub-national transport body for the South East – to ensure alignment across strategic transport objectives, and to engage with TfSE in relation to funding opportunities.

SCC is in the process of updating its 2017 Infrastructure Study – which identified £5.3bn of infrastructure improvements and a £2.47bn funding gap to deliver the identified infrastructure programme. The plan will focus on developing a comprehensive prioritisation process, to determine which projects could deliver the widest benefits and good value for money for Surrey residents.

All previous studies undertaken in Farnham have been reviewed, and their findings considered. There have been significant changes in legislation, policy context and business case requirements during the last five years. This means that there has been a need for work to identify options for Farnham to ensure that they are compliant with best practice and are positioned to secure capital funding from central government, regional funding sources or development-led initiatives.

A position paper on funding is currently being produced. This will consider potential sources of funding for new investment (capital programmes) and ongoing operations and maintenance (revenue funding). This will be issued separately to the OIP report.

#### **OIP Consultation**

The draft OIP was published for consultation on 15th February 2021, with public consultation taking place over a four-week period until 14th March 2021. The consultation was widely publicised, including a leaflet delivered to all addresses in the town, coverage in the Farnham Herald, e-newsletters sent to people who responded to the vision consultation, and targeted posts and polls on social media.

The consultation was hosted on the Commonplace platform, where people were able to read the documents and provide feedback. People also had the opportunity to participate through three Local Liaison Forums and one Facebook Live session conducted during the consultation period.

There were 268 people who responded to at least one question in the **wider context** section, with the majority (56%) of respondents feeling positively towards the OIP objectives and short-listing priorities.

There were 218 responses to the **Farnham-wide improvements** proposals, with 55% feeling positive and 23% negative towards the proposals.

There were 406 responses to the **possible town centre interventions** section. Most people said that they walk or drive into the town, and 54% felt positive and 20% negative about the proposals.

#### Introduction

There were 339 responses to the question about **North Farnham improvements**, with 42% feeling positive and 33% negative about the proposals.

There were 231 respondents on the **South Farnham intervention** proposals, with 53% feeling positive and 20% having negative views.

For the possible **A31 corridor** interventions there were 251 respondents, with 52% of respondents feeling positive towards the proposals and 25% were negative.

The OIP team have carefully considered the responses to the consultation questionnaire and written feedback to shape this final version of the document. This includes addressing specific issues on options for the town centre, walking and cycling network, North Farnham, South Farnham and the A31 corridor.

Further technical work has also taken place to inform the development of the final OIP, including more detailed assessment of options for the town centre, walking, cycling, bus improvements and changes to the road network across the town. This final version of the OIP shows how we have taken account of this more detailed work

#### **OIP: A framework for Farnham's transport programme**

This final version of the OIP will now act as a framework to shape the development of the transport programme for Farnham.

It does not provide all the answers: further work is required to confirm the preferred way forward for the town centre, and to develop the detail of walking, cycling and public transport proposals. The OIP sets out background context for major improvements to the A31 corridor and the A325 Wrecclesham Bypass, but more detailed technical investigations will be needed to inform the development of solutions.

Nevertheless, the OIP sets out the key principles that must be addressed in developing the proposed transport solutions for Farnham.

The remainder of this report is structured as follows:

- Chapter 2 Policy context
- Chapter 3 Challenges and opportunities
- Chapter 4 OIP objectives
- Chapter 5 Identifying potential options
- Chapter 6 Shortlisting options
- Chapter 7 Emerging strategy and next steps

**Policy Context** 

**CHAPTER 2** 

# Policy context



# **Policy context**

Significant changes in the legal and policy context have taken place over the last decade. This means that important changes have taken place since previous studies were undertaken (and proposals developed) for the town. A wide range of these national, regional and local policy documents have been reviewed to understand the transport policy context in Farnham and inform the development of the OIP. The most important and relevant documents include:

#### International

#### **The Paris Agreement (2015)**

The Paris Agreement is a legally binding international treaty on climate change adopted by 196 parties (including the UK) in Paris on 12 December 2015. Its goal is to limit global warming to well below 2 degrees Celsius, preferably to 1.5, compared to pre-industrial levels. Implementation of the Paris Agreement requires economic and social transformation based on the best available science. The agreement works on a 5-year cycle of increasingly ambitious climate action carried out by countries.

Countries were required to submit their plans for climate action known as nationally determined contributions (NDCs) by 2020. In their NDCs countries communicate actions they will take to reduce their Greenhouse Gas emissions in order to reach the goals of the Paris Agreement. To better frame the efforts towards the long-term goal of limiting global warming countries should have formulated and submitted, by 2020, long-term low greenhouse gas emission development strategies.

#### **United Nations Stockholm Declaration on Road Safety (2020)**

The Stockholm Declaration on Road Safety was adopted by the United Nations (UN) on 31 August 2020 as Resolution A/RES/74/299. The declaration focuses on speeding up the shift towards safer, cleaner, more energy efficient and affordable modes of transport and promoting higher levels of physical activity such as walking and cycling as well as integrating these with public transport to achieve sustainability.

The resolution also focuses on speed management and suggests mandating a maximum road speed of 30kph (19mph) in areas where vulnerable road users mix, except where strong evidence exists that higher speeds are safe.

It is important to note that, whilst the UK was one of 140 signatories supporting the declaration, UN Resolution A/RES/74/299 is not yet reflected in adopted UK policy, legislation, or guidance.

#### **National**

#### The Climate Change Act 2008 (2050 Target Amendment) Order 2019

The Climate Change Act was passed in the UK in November 2008 with an overwhelming majority across all political parties. It set out emission reduction targets that the UK must comply with legally. It represents the first global legally binding climate change mitigation target set by a country.

Initially the Act committed the UK to reducing its greenhouse gas emissions by 80% by 2050, compared to 1990 levels. However, this target was made more ambitious in 2019 when the UK became the first major economy to commit to a Net Zero target – the new target requires the UK to bring all greenhouse gas emissions to Net Zero by 2050.

The Act also provides a system of carbon budgeting to help the UK meet its targets through a series of five-year carbon budgets.

# **Policy Context**

The Committee on Climate Change has reported that the first and second carbon budgets were met, and the UK is on track to meet the third (2018-2022) but is not on track to meet the fourth (2023-2027) or fifth (2028-2032) budgets. In light of this shortfall, and the increasing aspiration of Net Zero by 2050, further action is required immediately across all regions and industries in the UK.

#### The UK's Industrial Strategy (November 2017)

The UK's Industrial Strategy, launched in November 2017, is a long-term plan to deliver jobs, economic growth, and prosperity across the country. The aim of the Industrial Strategy is to boost productivity by backing businesses to create good jobs and increase the earning power of people throughout the UK through investment in skills, industries, and infrastructure.

The UK's productivity has consistently lagged behind the average for the G7. The Industrial Strategy identifies five foundations of productivity:

- Become the best place to start and grow a business.
- Become the world's most innovative economy.
- Upgrade the UK's infrastructure network.
- Ensure prosperous communities across the UK.
- Create good jobs and greater earning power.

The other key elements of the Industrial Strategy are the four Grand Challenges "to put the UK at the forefront of the industries of the future":

- Artificial Intelligence (AI) and the data economy.
- Clean growth.
- Future of mobility.
- Ageing society.

Each challenge is an opportunity to put the UK at the forefront of the industries of the future.

#### **Decarbonising Transport: Setting the Challenge (DfT, March 2020)**

The strategy sets out the evidence and DfT's vision for the decarbonisation of the transport system. Transport is the largest contributor to UK domestic greenhouse gas emissions, contributing around 34% of all carbon dioxide emissions in 2019.

#### The strategy identifies six strategic priorities:

- Accelerating modal shift to public and active transport.
- Decarbonisation of road vehicles.
- Decarbonising how we get our goods.
- Place-based solutions.
- UK as a hub for green transport technology and innovation.
- Reducing carbon in a global economy.

# **Policy Context**

#### **Decarbonising Transport: A Better, Greener Britain (DfT, July 2021)**

DfT published the Transport Decarbonisation Plan (TDP) setting out a series of actions to decarbonise transport by 2050 and deliver against the UK Government's carbon budgets. The TDP considers 'in use' greenhouse gas (GHG) emissions from transport, it excludes emissions associated with the construction of transport infrastructure (and embodied carbon), the manufacture, maintenance and disposal of vehicles, and energy generated for transport.

The TDP outlines the goal is "not about stopping people doing things: it's about doing the same things differently"; as technology (such as greening the vehicle fleet through electrification) does not alone deliver net zero carbon by 2050 – behaviour change is also required. The plan retains the six strategic priorities identified in 'Decarbonising Transport: Setting the Challenge' (listed above). A range of measures (some previously announced) are outlined or reiterated within the TDP to support the six priorities, including:

- Creation of Active Travel England (ATE) to promote walking and cycling and act as statutory consultee in the planning process.
- Funding for electric cycle trials.
- Consulting in 2021 on changes to modernise the Bus Service Operators Grant.
- Funding for zero emission buses through the Zero Emission Bus Regional Areas scheme and Electric Bus Town / City scheme.
- Bus Service Improvement Plans (BSIPs) setting out ambitions to decarbonise local bus fleets.
- 2035 Delivery Plan to phase out non-zero emission cars and vans, with a plan review by 2025.
- Proposals to phase out sales of non-zero emission HGVs by 2040.

- Measures to transform 'last mile' deliveries, including supporting freight consolidation and revised traffic regulations.
- Conditioning future funding for transport infrastructure on local areas being able to demonstrate how they will reduce emissions. Local Transport Plans (LTPs) will be a key mechanism for enabling this ambition.

#### Regional

#### **Transport Strategy for the South East (TfSE, June 2020)**

The strategy explains how the transport system supports the economy of the South East and outlines a shared vision for the region and how a more sustainable transport network can support this vision.

The vision emphasises the importance of net-zero carbon and sustainable economic growth where integrated networks have delivered a step-change in connectivity and environmental quality. The transport network will offer seamless journeys that enable businesses to compete and support people's quality of life.

#### **EM3 Local Industrial Strategy (October 2020)**

Surrey is covered by two Local Enterprise Partnerships (LEPs): Enterprise M3 (EM3) and Coast to Capital. Farnham lies in the area covered by EM3.

EM3's Local Industrial Strategy has not yet been completed but its website provides a wealth of evidence on critical challenges and opportunities in the area. EM3 has a highly productive economy which is complex, knowledge-based, and high value-added. It is built on the foundation of highly skilled workers who are attracted by the high quality of life in the area, good jobs, and high wages.

# **Policy Context**

The economy of the area is based on a polycentric network of towns (including Farnham). Employment is very high, the skills base is strong, and economic inactivity is low; however, the population is rapidly ageing, and growth has significantly slowed since 2015. Infrastructure has not kept pace with growth; the area is held back by congestion on the road network, limitations in digital infrastructure, and strategic rail links need to be improved.

#### Local

#### **Surrey's 2050 Place Ambition (July 2019)**

The Place Ambition looks to ensure that Surrey continues to support the UK's economic success over the next 30 years as a key driver of growth, innovation and skills, and an excellent place for people to live, work, and learn. It sets out an ambition for 'good growth' which is proportionate and sustainable, supports improved health and wellbeing of residents, is supported by infrastructure investment, delivers high quality design, increases resilience in the local economy, builds resilience to the impacts of climate change, and is planned and delivered at the local level.

#### It identifies three strategic priorities:

- Improve connectivity within Surrey and between strategically important hubs.
- Enhance the place offer of Surrey's towns (enhance built environment, reduce demand for travel by car, maximise natural capital, mitigate against impacts of climate change, improve flood resilience, and safeguard economic assets).
- Maximise the potential of strategic economic assets, with a strong focus on Strategic Opportunity Areas (SOAs) - Farnham is located in the Blackwater Valley Corridor SOA.

The Place Ambition is currently being updated to reflect the current context, including the challenges around economic recovery and the increasing weight being given nationally to climate change, biodiversity, health, wellbeing, and improving the quality of development.

#### **Surrey's Climate Change Strategy (July 2020)**

Surrey's 12 local authorities have collectively recognised the severe and imminent threat that climate change poses. They have declared or recognised the climate emergency and established their own emissions reduction targets. In July 2019 SCC declared its climate emergency, committing the County to becoming Net Zero carbon by 2050 at the latest, in line with national ambition and national legal obligations. This public declaration commits all local authorities in Surrey to tackling climate change across every aspect of service provision and estate, in conjunction with action by Surrey residents, businesses, and partners.

#### **Surrey 2030 Economic Strategy**

The Surrey 2030 Economic Strategy was paused due to Covid-19, to ensure the document reflected on changes wrought by the pandemic and the actions required to respond to these changes.

#### The Economic Strategy focuses on four key priorities:

- Growing the leading edge: supporting the growth of Surrey's innovation economy.
- A 'whole place' approach to growing and sustaining quality places.
- Maximising opportunities within a balanced inclusive economy.
- Capturing the potential of a greener economy.

# **Policy Context**

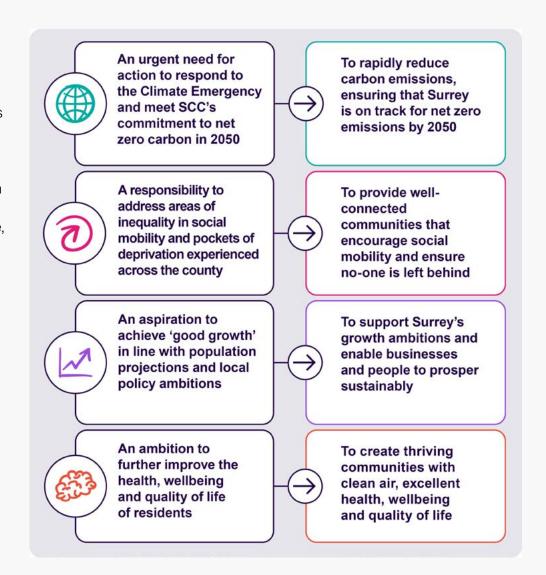
The strategy will provide a 10-year plan for economic recovery to support the work being done at the local and hyper-local levels and through Surrey's 2050 Place Ambition's Strategic Opportunity Areas. The strategy will reflect the relationship of Surrey with the wider sub-region, links to transport and digital infrastructure, and position Surrey as a place that nurtures innovation to retain and expand the economic strength of the county.

#### **Surrey's emerging Local Transport Plan 4 (LTP4)**

SCC has developed a new draft Local Transport Plan (LTP4), which is open for consultation between July 2021 and October 2021. It covers the period 2022-2032 and is designed to enable everyone to enjoy healthy, affordable, low carbon, travel choices. It sets out the future choices needed to enable Net Zero carbon by 2050 or earlier.

#### The LTP4 identifies the following challenges:

- An urgent need for action to respond to the Climate Emergency and meet SCC's Net Zero carbon by 2050 commitment.
- A responsibility to address areas of inequality in social mobility and pockets of deprivation experienced across the county.
- An aspiration to achieve 'good growth' in line with population growth projections and local policy ambitions.
- An ambition to further improve the health, wellbeing, and quality of life of residents.
- These challenges have, in turn, been translated into four strategic objectives for the LTP.



# **Policy Context**

#### **Waverley Local Plan (Draft)**

Waverley's new Local Plan replaces the Local Plan 2002 and directs new development in Waverley up to 2032. It includes strategic policies across transport, housing, employment, and infrastructure; and sets the spatial vision, targets, and objectives for the Borough.

In addition to setting policies to shape the direction of the Borough. it outlines strategic site allocations for housing development and the Development Management Policies which shape the type and quality of development delivered at these site locations, alongside the supporting infrastructure required.

The Local Plan includes commitments to maximise sustainable transport, contribute to transport infrastructure improvements, and encourage the provision of new and improved footpaths, bridleways, and cycleways.

#### **Waverley Climate Change and Sustainability** Strategy (December 2020)

In September 2019 Waverley declared a climate emergency and committed itself to being carbon neutral by 2030. The document is aimed at carbon management, energy efficiency, and sustainability. A supporting action plan details actions that the council will take over the next ten years as it attempts to be carbon neutral by 2030. This will require an average reduction in carbon emissions of 27% per year.

Actions include: promoting a pedestrian and cycle friendly transport network, taking action on air quality issues - especially those caused by vehicle emissions, and encouraging zero-carbon buses and taxis, alongside reducing the council's own dependence on fossil fuel energy.

The Carbon Neutrality Action Plan outlines that the council has maintained its absolute greenhouse gas emissions at the same level between 2008 and 2015 despite growth in the borough, but that further action is required to reduce emissions.

Specific actions in the plan include reducing the volume of traffic on roads, encouraging a transformation of infrastructure in favour of active travel, and introducing cycle hire schemes in all major hubs with allocated bays at railway stations, bus terminals, in town centres, and at university and educational sites.

#### Farnham Neighbourhood Plan (April 2020)

Farnham's Neighbourhood Plan for the period 2013 to 2032 sets out a vision for the future of Farnham and the policies which will be used to shape planning applications to align with and realise this vision.

The vision outlined is 'for Farnham to continue to thrive, meeting the changing needs of the local community by ensuring new development of high-quality design fits well with, and does not erode, the character of the distinctive areas of the town and is supported by improved infrastructure.'

#### **Summary**

It will be important to ensure that the OIP is fully aligned with our international and national legal obligations, and national, regional, and local policies.



# **Challenges and opportunities**

#### Context, assets, and opportunities

The town's geographical, topographical, and environmental setting are what drew people to first settle there, and are crucial factors contributing to people continuing to live in the area. They are fundamental to the town's sense of 'place', the character that residents and visitors value.

Topography and access to fresh water would have been important determining factors when Farnham was first occupied as a human settlement, hence the town centre is in a valley close to the River Wey.

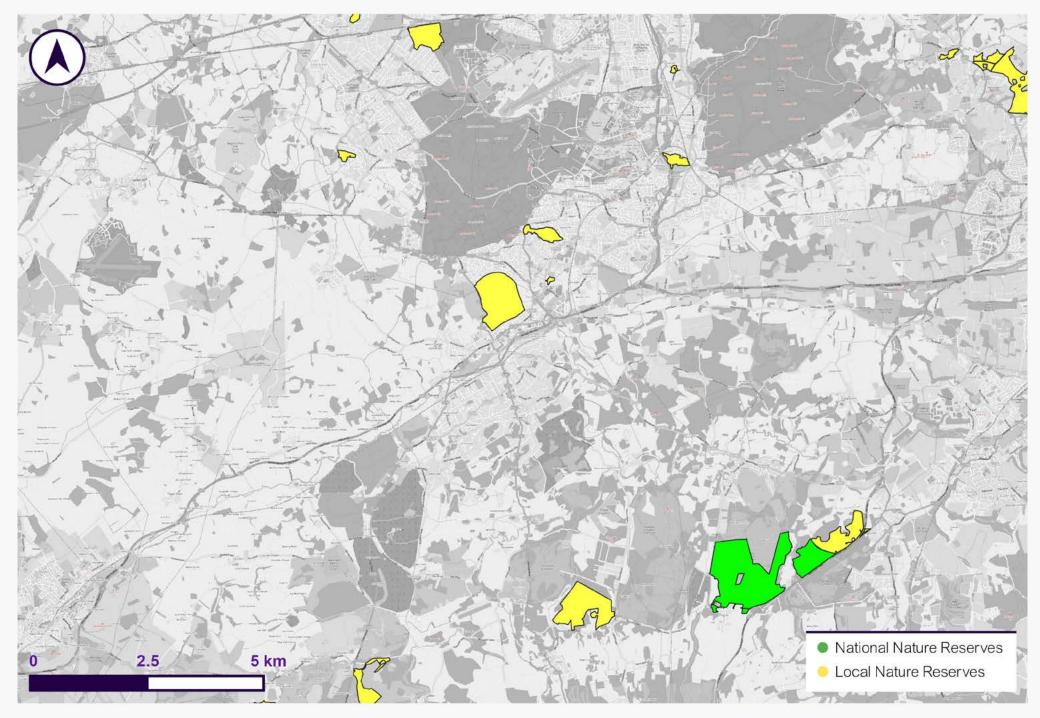
Farnham is in an area rich with environmental resources. Areas of Outstanding Natural Beauty, Sites of Special Scientific Interest, Nature Reserves, Ancient Woodland, parks, and green spaces are all very near to the town, as illustrated in the following plans.

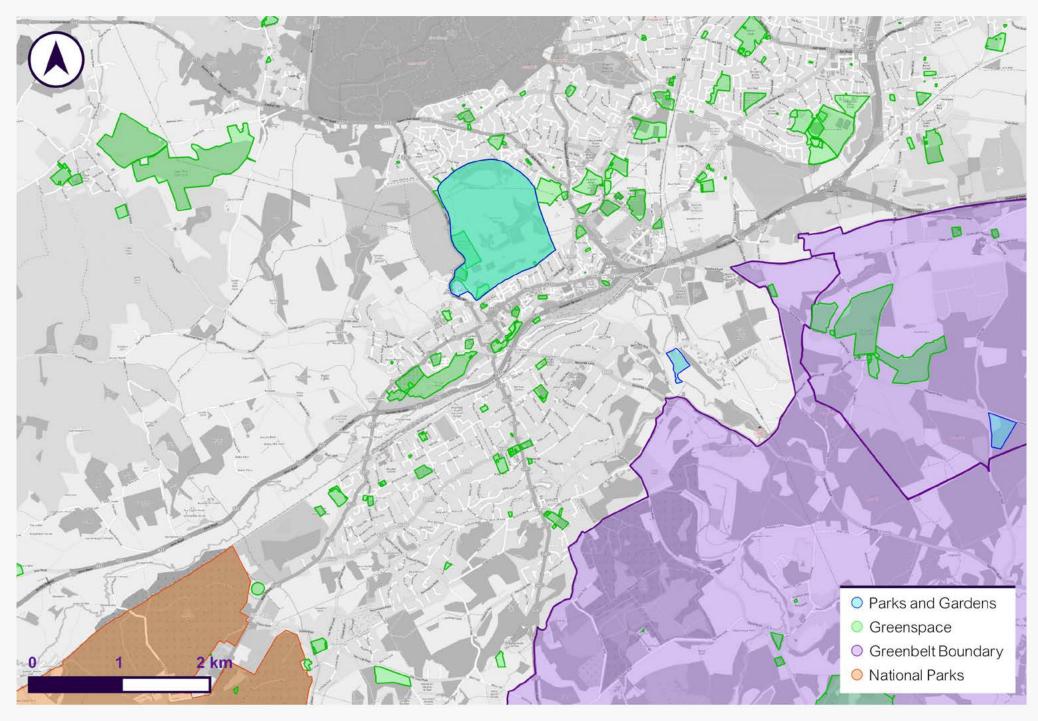
Farnham's topography and environmental richness significantly contribute to its sense of place and character. Farnham also has a high-quality built environment, with a high number of nationally and locally listed buildings located in a relatively small area.

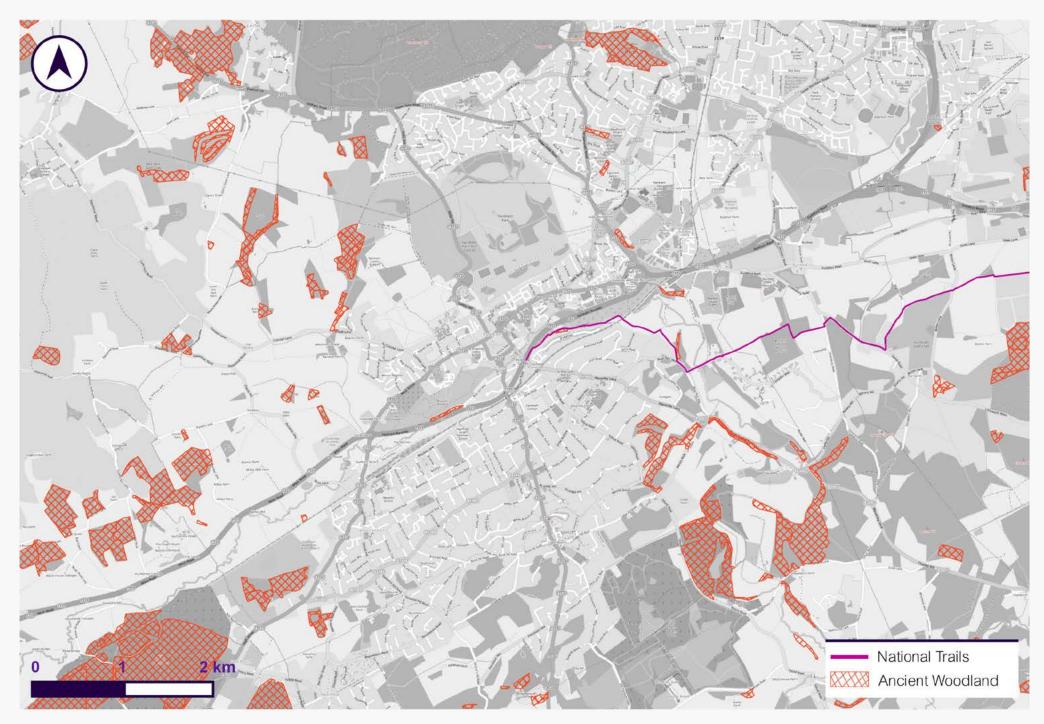






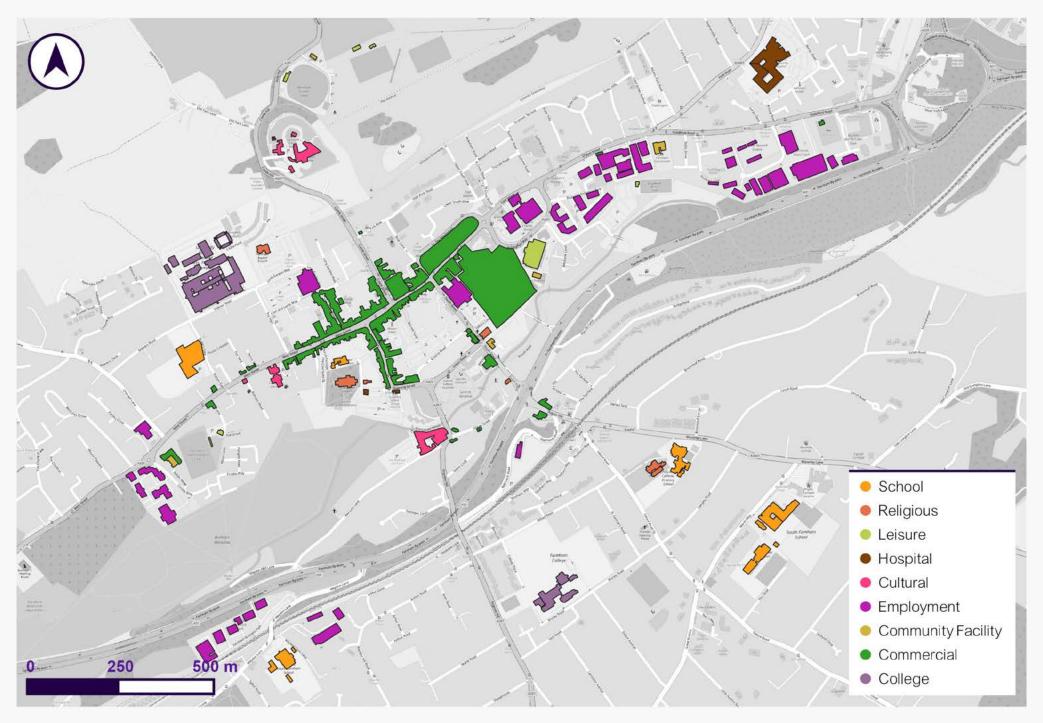












# Challenges and opportunities

As illustrated in the above plan, the town centre benefits from diverse land uses, comprising independent and multiple retailers, restaurants, businesses, leisure facilities, alongside cultural, social and entertainment facilities.

Primary, secondary, and tertiary education, as well as religious and medical facilities, are all located within a relatively compact area ensuring residents can access a breadth of goods and services.

The main shopping areas in the town centre are focused on The Borough, Downing Street, West Street, and the southern end of Castle Street. Downing Street has a strong concentration of independent retailers.

The eastern side of the town centre is currently subject to major change. Brightwells Yard, located between East Street and the River Wey, will include a new cinema, restaurants, new retail units, new public spaces, and new homes. In addition, new car parking will be provided with access from Dogflud Way, together with a car club for residents. Construction commenced in 2019 with phased opening during 2022.

On the opposite side of East Street, The Woolmead is a planned scheme that will provide ground floor commercial units and upper floor residential apartments, together with on-site car parking for residents and a car club. These schemes will significantly influence the balance of movement across the town centre, particularly for shopping and leisure activities.

The University for the Creative Arts, located just to the north west of the town centre, is an important asset and is a key part of Farnham's offer as England's first 'World Craft Town'. Farnham Maltings, to the south of the town centre, is an established arts and crafts destination.

The historic core of Farnham is protected by a Conservation Area. There are a large number of Grade I, Grade II\* and Grade II listed buildings in the town centre, while Farnham Castle - a Grade I listed Scheduled Ancient Monument – is located to the north of the centre. Farnham is a historic town with a wealth of heritage assets; these are a distinct feature of the town and help to make Farnham special, and must be enhanced and protected.

#### **Current challenges**

The town centre's public realm is characterised by vehicular access and narrow footways. There is significant potential to enhance the existing historic assets and built environment by developing a high-quality and connected public realm through the town centre.

The A31 Farnham Bypass is a busy route for traffic through the area. Together with the railway line, it is the main cause of severance between north and south Farnham. Beyond the bypass, vehicle access in the town centre is managed through a series of inter-connected one-way streets and mini-gyratory road systems. Despite the use of one-way systems, the town centre is still very porous to vehicles which results in many streets being dominated by vehicular traffic. This further compromises the environment for walking and cycling, as well as reducing the quality of the public realm and the sense of place in the town centre.

In addition to the severance caused by high volumes of traffic, this also adversely affects the ability to easily, safely, and enjoyably travel to and around the town centre on foot and by cycle, resulting in a less pleasant environment and a diminished sense of place. Rather than enjoying the natural and built environment, people are affected by the high volumes of motorised traffic.

## Challenges and opportunities

This motorised traffic also contributes to air quality problems, which has resulted in the town centre being designated an Air Quality Management Area (AQMA). The extent of the AQMA is shown in the below plan. Waverley Borough Council's 2020 Air Quality Annual Status Report (ASR), produced by Woods, published in July 2020, reports that:

"Concentrations of carbon monoxide, benzene, 1-3 butadiene, lead, sulphur dioxide (SO2) and particulates (PM10) are compliant with UK Air Quality Objectives (AQOs). However, concentrations of nitrogen dioxide (NO2) have been found to exceed the annual mean AQO at various locations within the Borough."

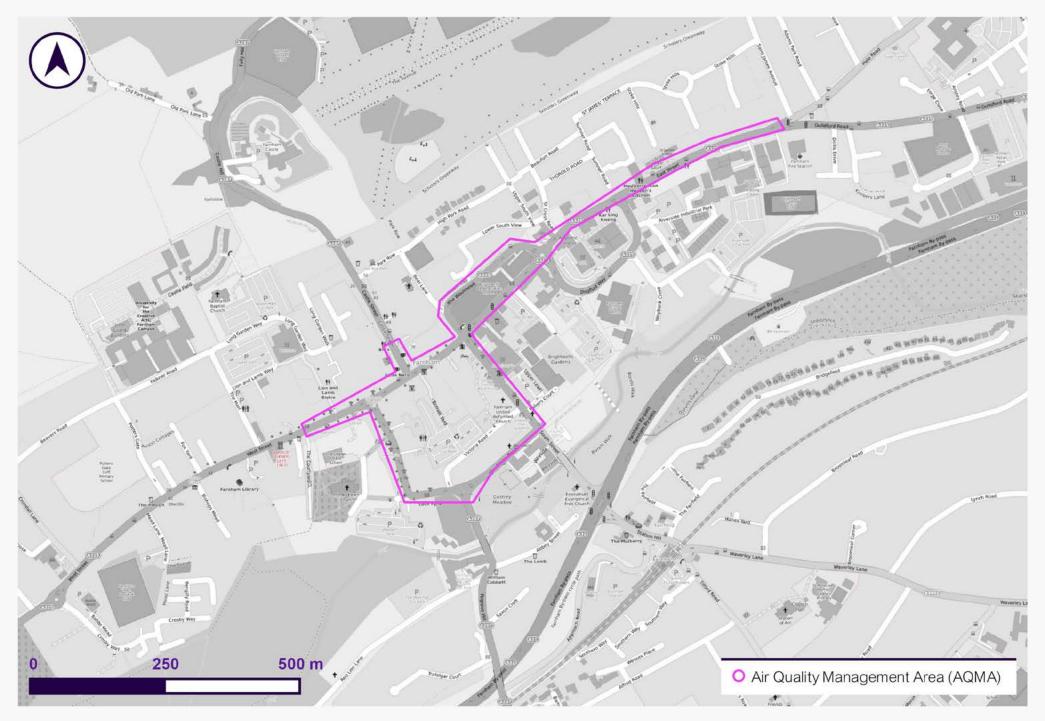
Air Quality is monitored at a variety of locations, including: The Woolmead, Badshot Lea, Upper Hale Road, Guildford Road, Cherry Tree Close, South Street, The Borough, West Street, Downing Street, Union Road, Bridge Square, Station Hill, Waverley Lane, Wrecclesham Road, Farnborough Road and Ridgway Road.

Concentrations of PM10 monitored were below the annual mean AQO of  $40\mu g/m^3$ .

Annual Mean NO2 concentrations in Farnham were below the annual mean AQO of 40µg/m<sup>3</sup> at all bar one location (The Borough at 49.2µg/m<sup>3</sup> – though the nearest receptor recorded 35.9µg/m<sup>3</sup>). It is noted that some locations, including Upper Hale Road, saw monthly recordings in excess of 40µg/m<sup>3</sup>. The report concludes that:

"Surrey has the highest car usage in the UK, and in some of the more rural areas within Waverley the infrastructure for public transport is limited, encouraging vehicular usage further. The air pollution in Waverley is mainly traffic-related and therefore every resident within the Borough has a role to play in reducing emissions."





## **Challenges and opportunities**

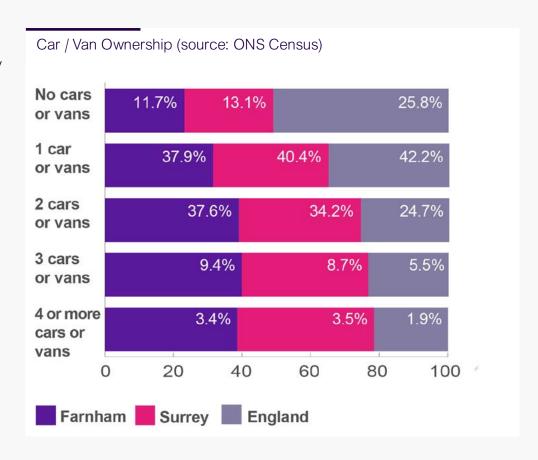
#### Root causes of existing issues

The root cause of the identified challenges is the very high car dependency of people living in the town.

Looking at the South East as a whole, people in the region make a greater number and proportion of trips by car / van and fewer trips on foot than the national average.

Compared to the national average, people in the South East travel significantly more miles each year by car / van (21% more miles) and rail (35% more), and travel further for all purposes (especially commuting, personal business, visiting friends and leisure). This creates negative impacts on congestion, air quality and carbon emissions.

This situation is exacerbated in Farnham. Car ownership in the town is very high, even compared to the average for Surrey which has some of the highest car ownership in the country, as shown in the graph to the right (based on pre-Covid data).

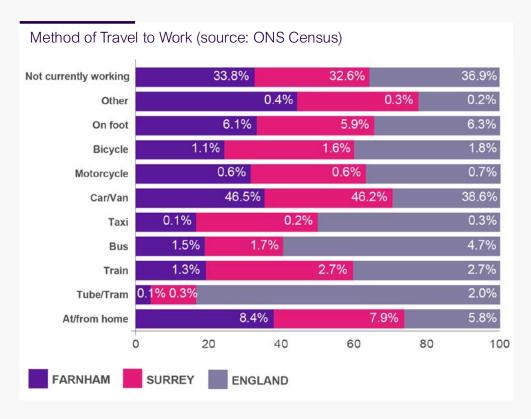


Compared to the national average, people in the South East travel significantly more miles each year by car/van



## **Challenges and opportunities**

Both Farnham and Surrey have significantly more residents driving to work than the national average (21% higher than national average). Fewer Farnham residents use public transport (bus and train) than Surrey and the national average, as shown in the below graph (based on pre-Covid data).



The availability of car parking is a very important factor influencing the decision to use a car for a journey.

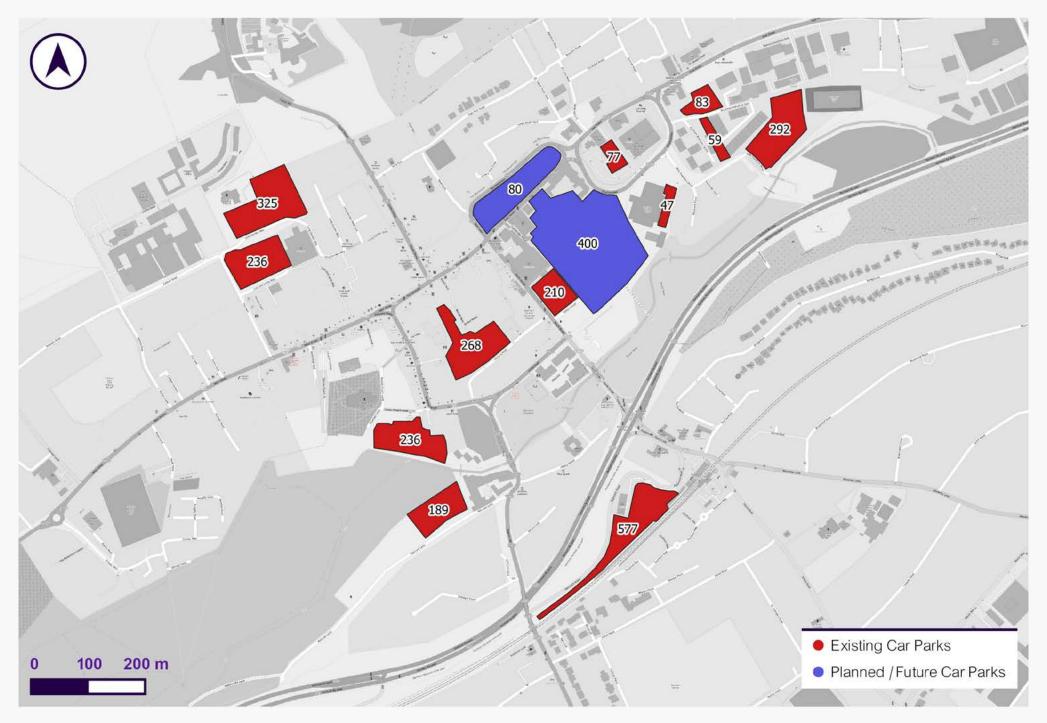
Waverley Borough Council is in the process of developing a Car Parking Strategy for Farnham Town Centre. This should address the importance of providing effective car parking options to meet the economic and social needs of the town centre, whilst supporting wider objectives to encourage a shift to other modes of travel where these are viable options.

The town centre is the main destination in Farnham. The town centre is served by several car parks, which cater for the large numbers of journeys for work, shopping, and other journey purposes.

The car parks shown on the plan on the next page currently provide 2,470 spaces (excluding Lidl and the leisure centre which are only for end users, not general parking). This is enough for 7% of Farnham residents (who have access to a car) to park in the town centre at any one time.

There is enough parking for 7% of Farnham residents (who have access to a car) to park in the town centre at any one time.





# **Challenges and opportunities**

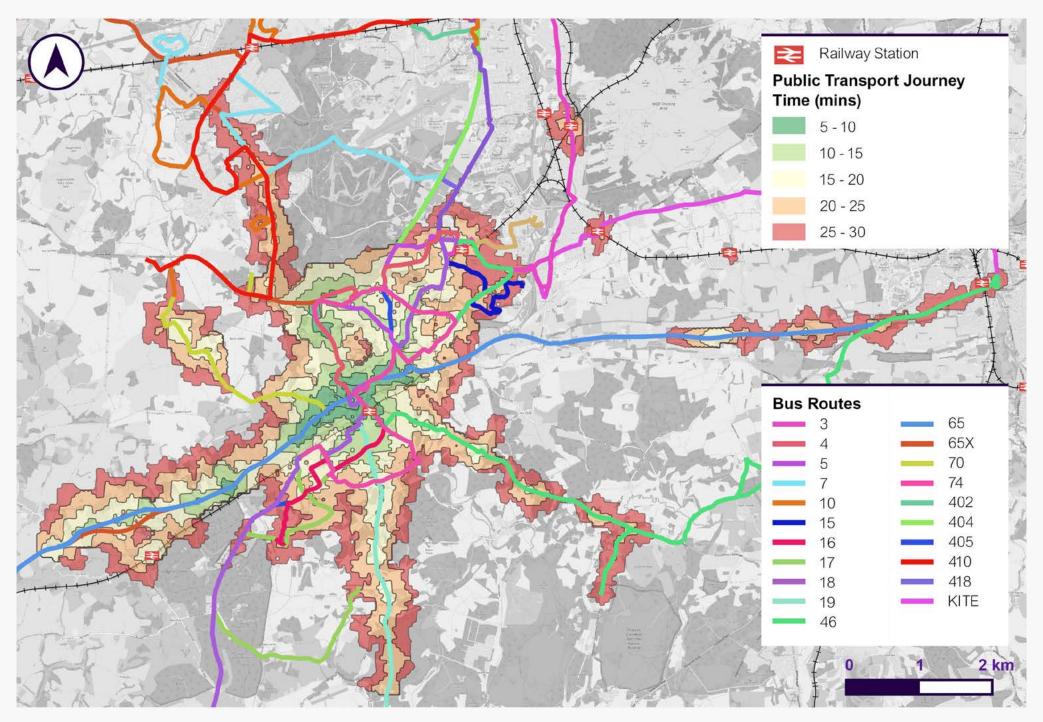
In addition, Brightwells Yard, which is due to open during 2022, will provide a new multi-storey car park on the east side of the town centre.

The high car ownership and ready availability of car parking are critical factors influencing people's decisions to drive to the town centre.

Limited numbers of people use buses to travel within Farnham, in part because many people choose to walk if they live close to the town centre. However, it is also clear that buses do not provide an attractive alternative to driving, with most people in the town having access to a car.

The map below shows existing bus routes in Farnham. Existing bus routes connect much of the town. However, increased frequencies, bus priority on roads and junctions, and faster journeys could help to make services more attractive.





# Challenges and opportunities

Many stakeholders and residents have expressed concerns about the volumes of HGVs in the town centre. Traffic surveys indicate that Farnham has a similar percentage of HGVs to other Surrey towns. However, Farnham has a higher proportion of Light Goods Vehicles (LGVs). This could be due to two main factors: the town centre containing a high number of smaller independent retailers and businesses, and high demand from residents for e-commerce deliveries.

Analyses of surveys undertaken in 2019 indicate that between 93% and 99% of queues comprised of cars and small vans. Goods vehicles therefore only comprised between 1% and 7% of gueues in the town centre.

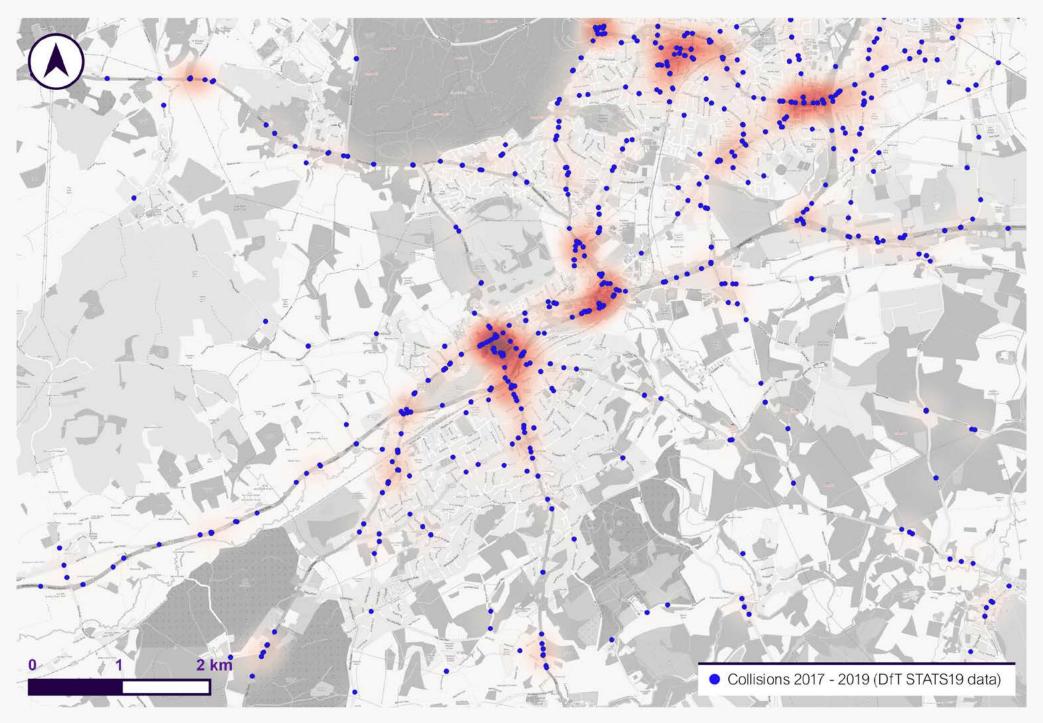
Analysis of STATS19 (DfT collision data) for the period 2017 to 2019 determined that cars are the primary cause of collisions in and around Farnham, with LGVs and HGVs involved in only a small number of collisions.

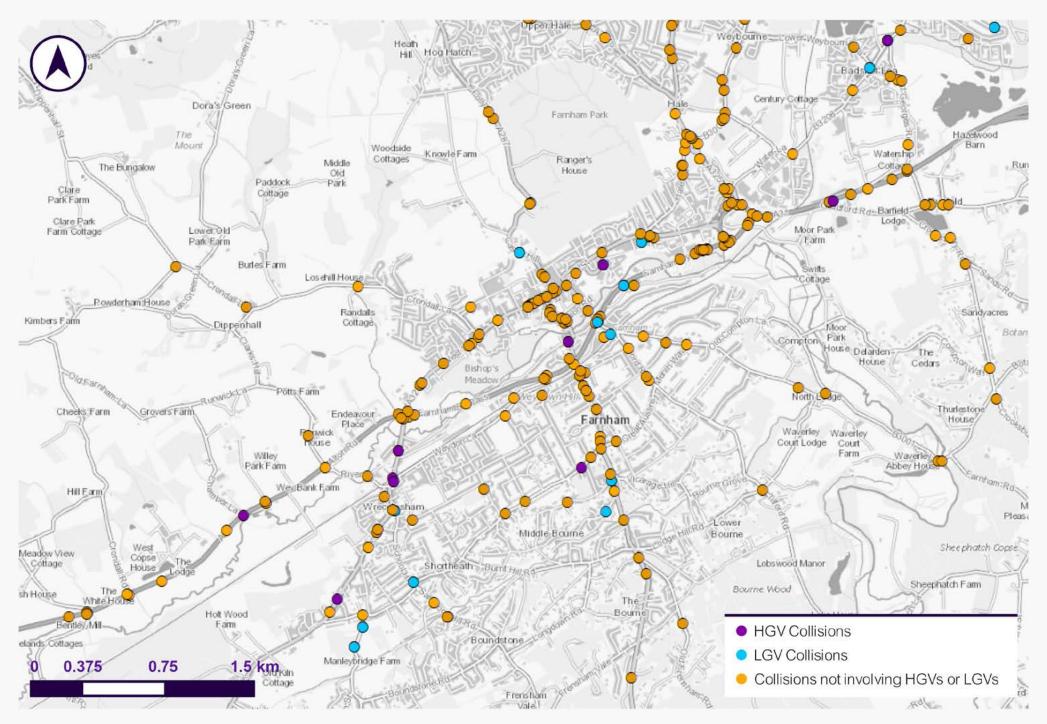
The maps on the next pages show the locations of accidents in and around Farnham. The first map shows the locations of all accidents around the town, and the second map shows accidents involving cars, vans and HGVs in and around the town centre.

**Analyses of surveys** undertaken in 2019 indicate that between 93% and 99% of queues comprised of cars and small vans

93-99% of queues comprised of cars and small vans







# Challenges and opportunities

The traffic problems in Farnham are mostly caused by cars. Although goods vehicles loading and unloading cause congestion in the town centre, the most recent comprehensive surveys (from 2019) showed that traffic gueues are caused mainly by cars. Most collisions on the road network also involve cars, with only a relatively small number involving goods vehicles. There is a clear root cause to these challenges: high levels of car dependency in the town.

#### **Future challenges**

Waverley, and Surrey overall, are forecast to experience significant growth over the next 30 years. This is expected to increase the volume of travel on the transport network across the area.

In Farnham itself, major mixed-use development at Brightwells Yard will increase the number of trips for shopping and leisure into the town centre, which will be supported by new and improved car parking facilities. The residential units will also generate new travel needs, although the town centre location will reduce car dependency for many trips. The planned mixed-use development at The Woolmead is also expected to result in increased travel demand, although the limited numbers of on-site parking spaces are intended to encourage sustainable travel choices by residents.

A major new housing development is proposed at Coxbridge Farm, on the western edge of the town, comprising new homes, public space and supporting infrastructure. New access points will be created on West Street, just east of the A31 Coxbridge Roundabout.

The OIP team has also engaged with WBC and adjacent Local Planning Authorities, including Guildford, East Hampshire, Hart and Rushmoor, to review current proposals for major development that could influence travel demand in Farnham. These include planned strategic growth at Whitehill-Bordon, Aldershot, and west of Guildford (amongst other planned strategic growth areas). This growth has been used to inform understanding of future travel demand and the potential challenges for Farnham.

The COVID-19 pandemic has had significant impacts on travel demand across the wider UK, Surrey, and the Farnham area. The cycles of lockdowns during the last year have caused major changes in the way that people engage with workplaces, shopping and leisure, and there is considerable uncertainty about how people will choose to travel in future as restrictions ease.

For example, people were instructed to work from home where possible. Data from the Office for National Statistics show that there was a very large increase in homeworking in Waverley, which was enabled by many people working in jobs where this is feasible.

Recent data have shown that overall traffic demand has returned to pre-pandemic levels, although with changes in daily flow profiles. Public transport demand, however, has only partly recovered since the first lockdown. Google mobility data suggest that activity in and around bus and rail stations remained more than 45% lower than pre-pandemic levels in April 2021.

### **Challenges and opportunities**

Longer term impacts could include:

- Fewer commuting and business trips due to increased levels of remote working.
- More flexible working hours that allow people to avoid rush-hour traffic.
- A general reluctance to return to public transport for many journeys.
- Increased levels of walking and cycling in local areas.

The short-term effects of the COVID-19 pandemic, and changes to people's travel patterns in 2020 and 2021, are likely to have long-lasting implications for the transport system. At present, there are considerable uncertainties about future travel behaviours, which should be proactively addressed in planning for future travel needs in Farnham.

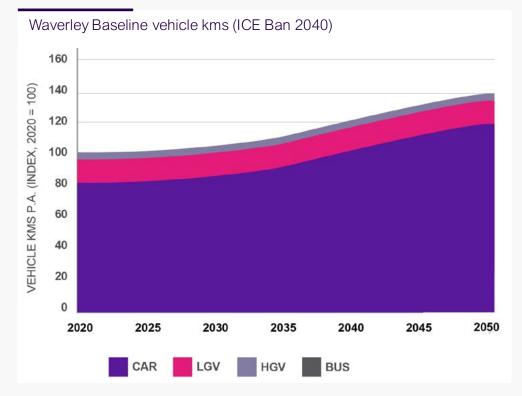
Forecasting of future travel demands has been undertaken using Surrey County Council's strategic transport model. This takes account of the potential impacts of new housing and jobs in the county and across the wider region. The model was developed before the COVID-19 pandemic and reflected assumptions on travel behaviours before the pandemic. It does not, therefore, address the uncertainties that are now faced in forecasting future demand.

Total annual vehicle kilometres travelled on the road network are forecast to increase by 40% from 2020 to 2050



Based on the forecast growth in numbers of people living and working in the area, and assumptions on future travel behaviours, total annual vehicle kilometres travelled on the road network were forecast to increase by 40% from 2020 to 2050, as shown in the figure below.

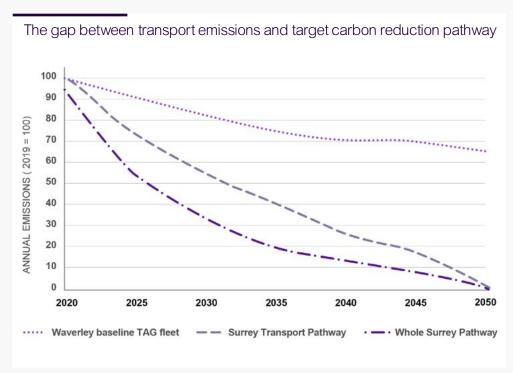
This scenario assumed a ban on the sale of internal combustion engine (ICE) vehicles in 2040. The ban on the sale of ICE cars has now been brought forward to 2030, although this is unlikely to significantly impact on the underlying demand for travel. If this growth in travel demand were to materialise, it would result in increased congestion, worsened air quality and higher carbon emissions.



### Challenges and opportunities

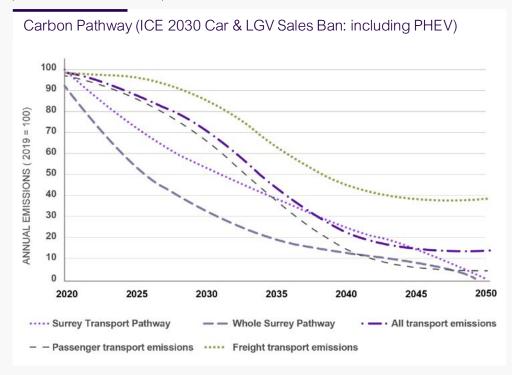
Without action these increases in motorised traffic will cause a further deterioration of the quality of place in Farnham, increased congestion and worsening of air quality. This will impact on people's quality of life and the competitiveness of the town centre.

In addition, the forecast growth in motorised traffic will make it extremely difficult for Waverley and Surrey to meet decarbonisation objectives. The figure below shows the gap between transport emissions and target carbon reduction pathway.



Even with the Government's recently announced acceleration of the ban on sale of new internal combustion engine (ICE) powered vehicles from 2030, the pace of change would be too slow to reach Net Zero carbon by 2050. Further measures will be required to accelerate emissions reductions during the 2020s.

These include reducing emissions from LGVs and HGVs, reducing vehicle kilometres travelled by car, and increasing the number of journeys made by public and active transport.



## **Challenges and opportunities**

Technology alone, i.e. the adoption of an electric vehicle fleet, will not deliver change of the scale required to meet and address the climate emergency. Travel behaviour change will be crucial to achieving Net Zero, including reducing the need to travel, reducing the number and distance of journeys undertaken by private vehicles and a shift to low carbon modes: walking, cycling and public transport.

The figure overleaf illustrates the complexity of the challenges that are faced in Farnham. The root causes of these problems are the high levels of car use and motorised travel. The key principles for the future must be to rapidly reduce carbon emissions and improve the quality of place, whilst maintaining and supporting the economic vitality of the town.



## **Challenges and opportunities**

#### Illustration of transport challenges in Farnham Town wide challenges Low public High car Through **Deliveries** into Community Impacts on Air quality Low Quality Carbon active travel transport use dependency traffic town centre severance historic centre and noise emissions Place **North Farnham** A287/A3016 direct route Basingstoke to Guildford Traffic to/from Hale and Upper Hale Increased traffic from new development in Hart Impacts of traffic in Hale and Upper Hale Town centre Congestion on A331 in Blackwater Valley affecting route choices Large volumes of traffic accessing car parks A325 primary traffic route from Aldershot Traffic to/from Heath End, Weybourne and Badshot Lea · Deliveries to businesses in town centre Heavy traffic on town centre one-way system Increased traffic from new developments Impacts of traffic through Heath End Increased traffic from new developments Congestion in Six Bells area A31 Corridor No direct access to A287 Long delays at Hickley's Corner · Major road corridor from Winchester · Major road corridor from Guildford Traffic at Coxbridge Roundabout · Delays at Shepherd and Flock Traffic from new development Traffic from new development west of Guildford Width restriction at A287 bridge South Farnham Traffic to/from South Farnham HGVs diverted from A287 to level crossing Impacts of traffic on A325 through Wrecclesham Height restriction at rail bridge in Wrecclesham Traffic queues at level crossing Increased traffic from development in Whitehill/Bordon



# **OIP** objectives

The previous chapters have demonstrated that there must be a strong focus on reducing the amount of motorised travel and the effects of traffic in Farnham. This is critical for Surrey to meet the targets set in its Climate Change Strategy and to improve the quality of place in the town.

The emerging Surrey LTP4 provides a strong policy framework to shape the OIP. It is strongly influenced by wider policy drivers, both the Place Ambition and Climate Change Strategy, and takes account of the strategic challenges in Surrey to define four high-level policy objectives.

Surrey's emerging LTP4 aligns with national policy and strategic objectives, such as mode shift, improving environmental conditions and Net Zero carbon by 2050.

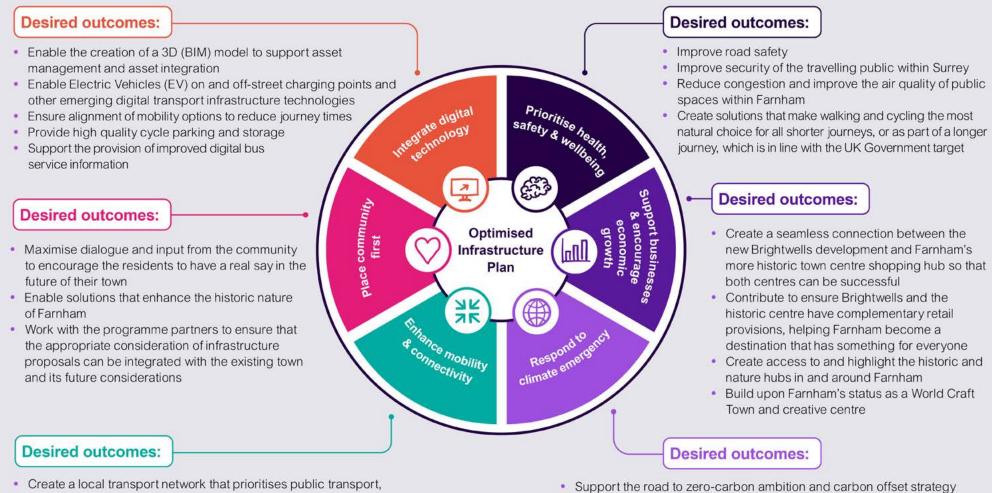
The Farnham Vision Statement, which was published in October 2020, has provided foundation for the development of the OIP. This presented six policy themes, shown in the figure overleaf, which strongly relate to the four LTP4 objectives.

The LTP4 objectives (shown in Chapter 2) can therefore be used as a basis for developing the OIP objectives.

The analysis of problems and issues points in the same direction. The problems in Farnham are typical of those experienced across much of Surrey, but with distinct problems caused by high motorised traffic volumes impacting on the quality of place in the town centre.



## **OIP** objectives

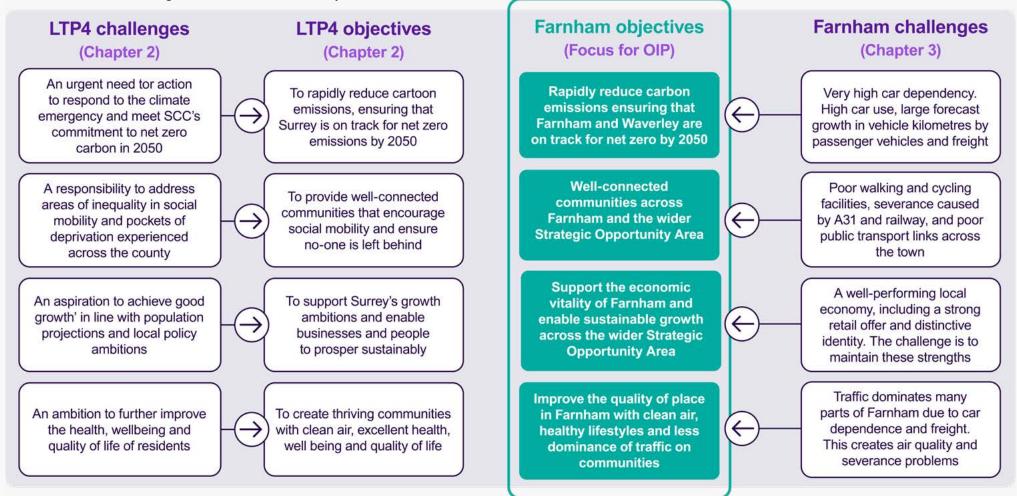


- walking and cycling while minimising car use
- Support recent improvements to Farnham Station and services to London, ensuring that Farnham has reliable journeys for all
- Embed supporting infrastructure for EVs to ease their future integration

- Create a local transport network that prioritises public transport, walking and cycling while minimising car use
- Support the investment in ultra-low emission vehicles
- Promote sustainable travel planning (as set out in the Department) for Transport's Sustainable Travel Towns document) and support the development of a plan for Farnham

## **OIP** objectives

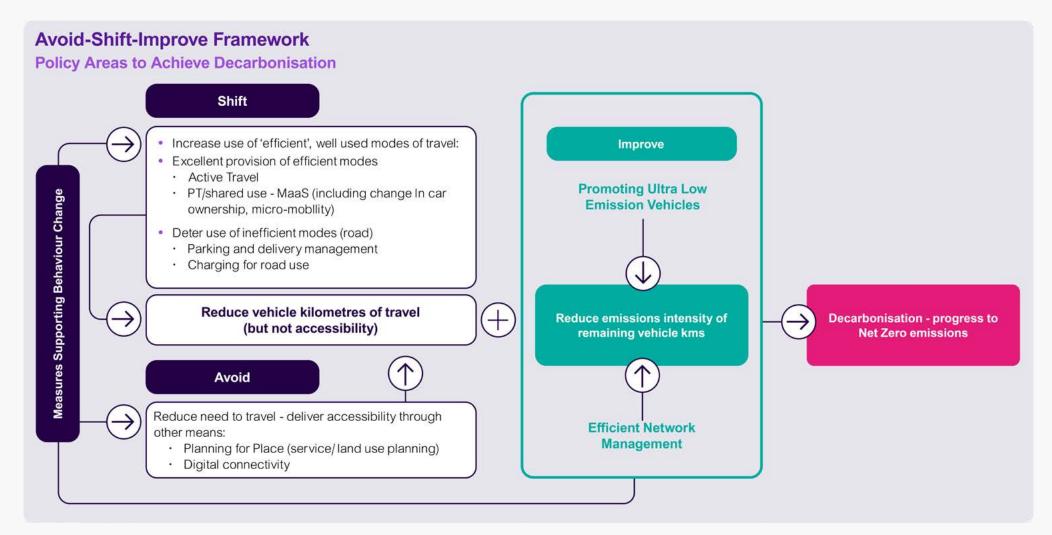
The figure below summarises the OIP objectives and how they were developed. The boxes to the left show the Surrey wide transport challenges and the emerging LTP4 objectives. The boxes to the right show the critical challenges in Farnham. These are then drawn together to show the OIP objectives.



## **OIP** objectives

These are high-level objectives for what we want to achieve from the transport system in Farnham. We must then consider how we could achieve these objectives.

In terms of rapidly reducing carbon emissions, international best practice uses the Avoid-Shift-Improve framework (shown in the figure below).



## **OIP** objectives

This is based on the following components of change:

- Avoiding or reducing the need to travel, and distance travelled by improving the efficiency of the land use and transport systems.
- Shifting to lower energy consumption travel, and more efficient modes: public transport, walking and cycling.
- Improving the energy efficiency of modes, operational efficiency of networks, and reducing vehicle emissions using technology.

The evidence shows that shifting to electric vehicles in isolation will not be enough to reduce carbon emissions at the pace required to meet Surrey's carbon budget. It will also mean reducing the amount of travel (both people and goods) and shifting to more efficient modes: walking, cycling and public transport.

Well-connected communities would mean safer and more convenient journeys by walking and cycling and high-quality, convenient, reliable, safe, and affordable journeys by public transport. This would mean that all groups of society are able to access education, training, healthcare, and job opportunities, including disadvantaged and vulnerable groups of people.

Supporting the economic vitality of Farnham must include building on its unique status as a World Craft Town, with distinct strengths in the creative industries, its attractiveness as a visitor destination and supporting the long-term potential of the wider Blackwater Valley Strategic Opportunity Area. This includes enabling sustainable housing growth in the wider area, including cross-border growth in north east Hampshire.

**Improving quality of place** is clearly an immediate priority for the town. This should include improving air quality through reducing Nitrogen Dioxide and particulates, promoting healthy lifestyles through more day-to-day walking and cycling, reducing impacts of traffic on the historic town centre and other parts of the town, and increasing sustainable access to the outstanding local countryside.

These objectives are all consistent. They reflect the criticality of reducing dependence on car travel and improving the safety, convenience, and attractiveness of more sustainable alternatives: walking, cycling, and public transport. Volumes of goods traffic in the town also need to be reduced. These will be critical to the success of the future strategy.

In addition to the OIP objectives, four critical themes have been identified for the future success of the town centre:

- Celebrate Farnham's Heritage (the built environment is fundamental to Farnham's identity, but the current road layout undermines the potential of the town).
- Create a Public Realm (creating new focal points will help to create new anchor points for the town).
- Promote an Integrated Town Centre (the town centre is compact with most destinations within 20 minutes walking, but the challenge is to reduce the dominance of motorised traffic).
- Shift Trips (achieving the above three objectives will require a shift in trip distribution and reductions in motorised traffic flows in the town centre).

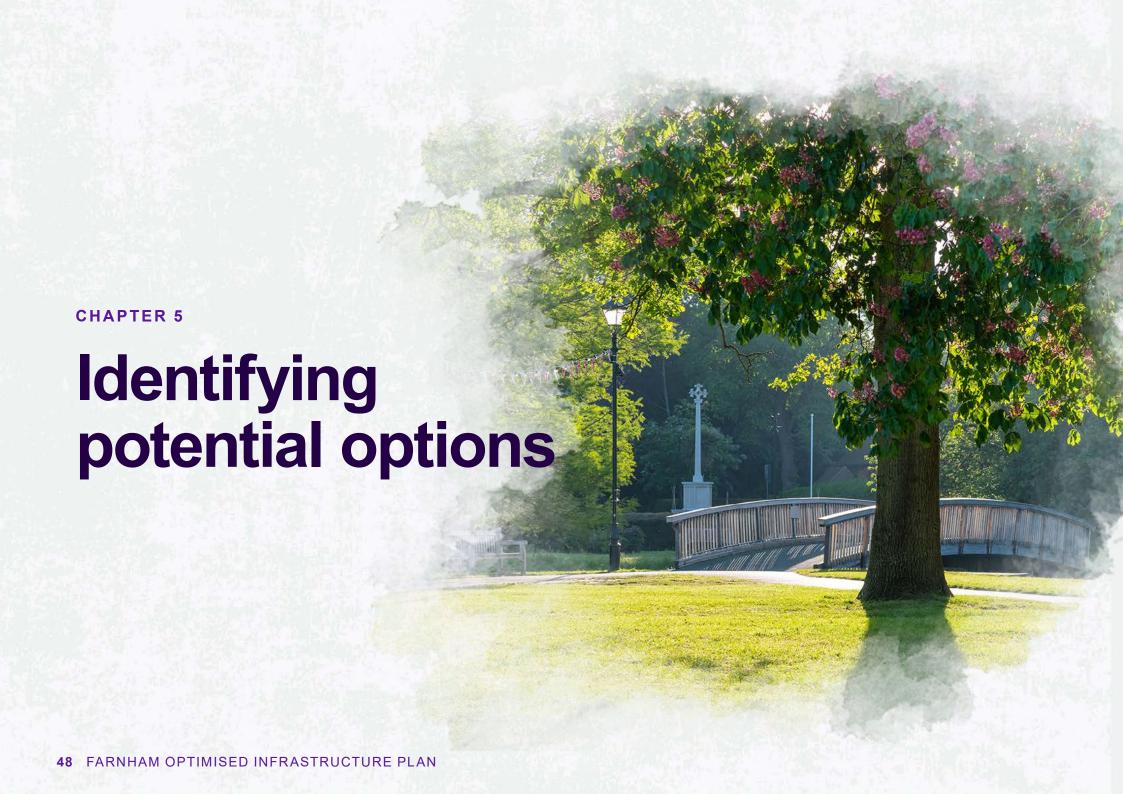
## **OIP** objectives

One approach to assessing how different transport measures could contribute to achieving these objectives is called 'logic mapping'. This has been used for several years as a tool for testing how different policies and investments could support policy goals. It is recommended by the Treasury for testing the impacts of complex programmes and it is therefore suitable for understanding the potential impacts of the OIP in more depth.

For each of the high-level objectives, 'logic maps' can be used to show how each of the objectives could be achieved. 'Outcomes' articulate in more detail measurable performance indicators to describe how the overarching objectives are being met. 'Outputs' are more focused transport indicators that describe how the transport system will change to support the outcomes. 'Inputs' are the schemes and other measures in the OIP that will generate outputs and outcomes for positive change in the town.

**Appendix 1** presents the logic maps for the four objectives. These demonstrate how the four high-level objectives would be achieved through the OIP inputs, outputs, and outcomes. The outputs and outcomes will be used to inform the OIP performance management framework. These have also been used to inform the identification of potential schemes, assessment and shortlisting and development of the programme. The following chapters describe this process.





# **Identifying potential options**

A wide range of potential options has been identified to tackle Farnham's transport problems and support the OIP objectives.

#### This has included:

- Schemes that have been developed in the past, including proposals for the A31 corridor through Farnham (including the area around Hickley's Corner) and Wrecclesham.
- Ideas suggested by members of the public, local businesses, and councillors through the LLF and recent consultation.
- Ideas generated by the project team following comprehensive analysis of the issues in the town.

The potential options include both measures to influence travel behaviour and schemes to improve the efficiency of the transport system. These include:

- Travel behaviour change programmes (e.g. personalised journey planning and School Travel Plans).
- Demand management options (e.g. a Workplace Parking Levy or Road User Charging).
- Improved public realm in the town centre.
- Improvements to walking routes and pedestrian infrastructure.
- Improvements to cycling infrastructure (including segregated cycleways and cycle parking).
- Electric bike (e-bike) programmes to improve the feasibility of cycling longer distances, and innovative new micromobility options such as 'e-scooters'.

- Public transport improvements, including new bus services, bus stops, passenger information, bus priority and Park & Ride schemes.
- Shift to zero emission transport (electric buses, electric taxis, and charging infrastructure for electric vehicles).
- Roadspace reallocation and road safety measures.
- Freight schemes e.g. Freight Consolidation Centres.
- Integrated road corridor programmes (which could include safety treatments, improvements to walking and cycling, and bus priority measures).
- Major improvements (e.g. the A31 corridor through Farnham, Wrecclesham Bypass).

The focus in this process has been to tackle the root causes of the problems in Farnham, including high car dependency and lack of attractive alternatives to the car. There is therefore a focus on options to significantly improve the attractiveness of walking, cycling, and public transport in the town.

However, it is also important to recognise the impacts of cars and freight traffic in the town. High volumes of motorised traffic in urban areas have high social costs, e.g. costs of delays, health impacts of poor air quality, and the costs to society of crashes on the road network.

Most of these costs are not currently borne by road users and are called 'external costs'. Many areas are now considering how these costs should be 'internalised' to road users, through mechanisms to increase the costs of driving. These could include options such as Road User Charging.

## **Identifying potential options**

### An important note about the options

The options described in this chapter are initial concept ideas that were identified as potential options to help tackle the challenges in Farnham. The OIP team has since taken account of feedback from the public consultation, together with further technical work, to develop these concepts, but these remain initial ideas.

Chapter 6 sets out the process used for initial assessment of the concept options and Chapter 7 explains how they have been packaged into the emerging strategy. These remain indicative concepts only, and further technical work will be needed to develop the proposals.

Proposals for walking and cycling improvements will be developed as part of a Local Cycling and Walking Improvement Plan (LCWIP) for Farnham. Bus improvements will be developed as part of a Bus Service Improvement Plan (BSIP) for the area. Changes to the road network in the town centre, on the A31 corridor and at Wrecclesham are also subject to ongoing work. Detailed proposals in North Farnham and South Farnham will be progressed through more specific area studies.

There will also be a requirement for specific assessments to meet legal requirements and best practice in the development of transport projects. This will include Environmental Impact Assessment (EIA), Equality Impact Assessment (EqIA), Ecological Impact Assessment (EcIA), and Flood Impact Assessment.

In addition, options will be developed in accordance with Inclusive Design Standards and best practice. This include ensuring safe use of the environment by all users, including those defined as having protected characteristics under the Equality Act. These include age, disability, gender reassignment, marriage and civil partnership, pregnancy and maternity, race, religion or belief, sex, and sexual orientation.

Options will also be actively considered to maximise the environmental benefits of the programme, by promoting biodiversity net gain, together with maximising opportunities for greening and urban tree-planting.

Details of the potential options are provided below.

### **Behaviour change options**

These are focused on influencing people's travel behaviour through marketing, information, and support to reduce the need to travel and shift to walking, cycling and public transport.

Measure	Description
Mobility as a Service	New technologies to allow people to make multi-modal journeys, including information on travel options, ticketing and real time information, via Apps.
Personalised Journey Planning	Support to provide residents with tailored information on different options to meet their travel needs.

## **Identifying potential options**

Measure	Description
Incentivising active travel to schools	Surrey already promotes sustainable travel to schools, for example the Golden Boot Challenge, Eco Schools and School Journey Plans, but this could be stepped-up with measures such as training on safe cycling to school.  This could be twinned with real-time air quality monitoring at schools to determine effectiveness of interventions.
Promoting flexible working arrangements	The Covid-19 pandemic has caused large numbers of people to work from home. This could cause longer-term changes in how people work, helping to reduce peak hour pressures on the road and rail networks.  This could have an additional benefit of increasing economic development in the town - through encouraging people working from home to visit and spend within the town centre.
Car club schemes	These offer a cost-effective option for people to access cars without the need to own their own vehicle. They give people the opportunity to hire cars, on an hourly or daily basis, for journeys where other options are not viable.  New developments in Farnham, for instance Brightwells and Woolmead, have committed to introducing car club schemes for residents.

Measure	Description
Subsidised fares for local bus services	The costs of using bus services are often identified as one of the barriers to using public transport.  Providing low fares is one way to encourage more people to use public transport.

## **Demand management options**

These are focused on influencing travel demand through reducing or changing the supply of parking or increasing the cost of travelling by car.

Measure	Description
Rationalisation of town centre car parks	There are numerous car parks across the town centre, which encourage people to drive around the town centre road system. Rationalising the number of car parks could help to reduce traffic circulation in the town centre.
Re-purposing of town centre car parks	The car parks also use large amounts of valuable space. This could be used more productively, for example as local piazzas, artisan / craft markets or for local producers.

## **Identifying potential options**

Measure	Description
Workplace Parking Levy	Many businesses have on-site parking where employees park for free. Other towns are considering options to charge businesses for their parking, to encourage them to repurpose spaces and encourage employees to shift from cars to more sustainable modes. If supported, this would require regional or national delivery and facilitating legislation.
Road User Charging	Driving is convenient but traffic causes congestion, poor air quality and carbon emissions. Road User Charging is a system in which people are charged to drive. Different options are available, based on 'cordons' or area-wide schemes. If supported, this would require regional or national delivery and facilitating legislation.

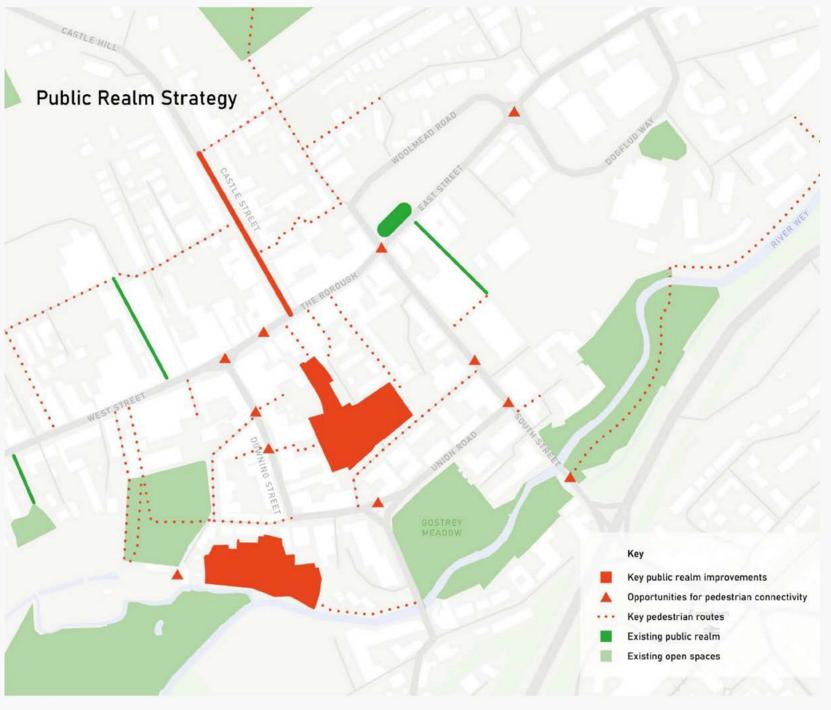
### Improved public realm

The public realm (i.e. the quality of the streets) is poor in many parts of the town centre. There is also a lack of places where people can congregate or rest. However, there are distinct opportunities to develop new high-quality destinations in Castle Street, Central Car Park and Waggon Yard. In addition, the Brightwells development will deliver a new public realm piazza ('Old Market Place') which will deliver much needed public realm in the east of the town. Whilst diversifying use of existing space provided for car parking forms a potential part of the plans to improve the town centre,

these car parks will remain accessible. It is important to note that some of the improvements to the town centre (for example, widening footways, pedestrian areas, and carriageway alterations) could mean that the traffic routes to and from car parks will change.

Measure	Description
Existing pedestrian routes (lanes and passageways)	Make best use of the existing historic lanes and passageways providing attractive and interesting links across the town centre. Provide coherent signage and ensure adequate crossings at streets.
Castle Street	Opportunity for removal of on-street parking and to capitalise on the high quality streetscene of this wide street connecting the town centre to the Castle.
Downing Street	Opportunity to widen footways and improve vehicle loading facilities to reduce the impact of delivery and servicing activity on all road users.
Central car park	Opportunity to diversify use of space whilst retaining parking.
Waggon Yard	Improve quality of public realm and integrate more closely into town centre, including links with meadows and St Andrew's Church.

These proposals are shown on the next page.



The Public Realm Strategy aims to develop an integrated, high-quality public realm in Farnham. This strategy frames the movement strategy, and the recommended improvements are compatible with all of the movement options. The Public Realm Strategy is focussed on spaces and links that feel slightly secondary within the town centre. The strategy's aim therefore is to explicate the presence of these areas and integrate them into the town centre's fabric.

## **Identifying potential options**

### Green Infrastructure, placemaking and access to nature

In addition to the built environment public realm options, the OIP will improve, where possible and with public support following consultation, green infrastructure across Farnham.

Green infrastructure covers a broad spectrum, from woodland and grassland to parks, street trees, shrubs, and planters. It forms an important function in terms of placemaking, improves air and water quality, improves biodiversity and ecological resilience, provides shade, assists with combating the heat sink effect that occurs in towns and cities, and can contribute to an area's cultural heritage.

The OIP is committed to improving green infrastructure as part of the wider improvements to the public realm and placemaking in the town. Improved green infrastructure in the town centre, and connecting routes to the town centre, will improve public spaces, and the enjoyment of those who walk or cycle to reach those public spaces through improving pedestrian comfort, way finding and natural navigation, sense of place, pedestrian safety, and physical and mental wellbeing.

The wider programme will actively promote biodiversity net gain and maximise greening and urban tree planting in the planning, design, and construction of schemes across the town.

Specific locations for potential green infrastructure improvements have not been mapped at this stage as their potential locations are, to varying degrees, linked to other measures. For example, roadspace re-allocation in conjunction with pedestrian areas, widened footways, and new cycle routes would unlock space for additional street trees and / or planters.

Locations for green infrastructure improvements will be based on public support, the identification by residents of preferred schemes under other categories in the OIP (which will unlock space for their installation), and further study to ensure suitable species selection, installation methodology, and maintenance regimes. These are essential to ensuring the longevity of the green infrastructure and to optimising the health, wellbeing, and biodiversity benefits of this infrastructure.

It should also be highlighted that green infrastructure absorbs carbon; whilst carbon absorption / offsetting is not alone sufficient to meet Farnham, Surrey, or national decarbonisation targets it will play a role in assisting the decarbonisation programme.

The public realm, placemaking, green infrastructure and pedestrian / cycle route improvements will be integrated with planned and committed development in Farnham (e.g. Brightwells), ensuring a cohesive, legible, and navigable environment for all users.

These measures are an important element in creating healthy places to live, bringing people closer to nature. Green infrastructure will, in conjunction with walkable routes to connect the various communities within Farnham. improve access to the existing countryside, parks, and open spaces the town benefits from.

### Multi-modal transport improvements

A wide range of options has been considered to improve walking infrastructure, cycling routes, public transport, freight, and the road network. Each scheme has been considered in its own right and in terms of its potential to form part of a coherent programme of improvements. These are outlined in the following sections.

## **Identifying potential options**

### Walking routes and pedestrian infrastructure

People have highlighted the problems caused by a poor environment for walking in the town centre. Many have expressed a wish for pedestrianisation or other improvements in the quality of infrastructure for pedestrians. There are also many other opportunities to significantly improve the walking environment: both on streets and on separate offstreet routes. These routes will also improve access to nature. Benches should also be provided on key walking routes to enable people to rest and enjoy the local environment.

The development of new walking routes will be planned in accordance with a Local Cycling and Walking Infrastructure Plan (LCWIP) for the town.

Measure	Description
The Borough	Options for full pedestrianisation or for significant reallocation of roadspace to pedestrians, with narrowing to one lane for general traffic or buses only.
Downing Street	Options for full pedestrianisation or for reallocation of roadspace to pedestrians, with narrowing to one lane for general traffic or buses only.

Measure	Description
East Street	Originally developed by the Brightwells development team, proposals would see East Street transitioned to one-way working (with Woolmead Road converted to two-way traffic). During controlled hours East Street would be accessible to buses, bicycles, and servicing vehicles only, footways would be significantly widened on the southern side of the road and new loading facilities for goods vehicles introduced to reduce delays to vehicles.
New pedestrian route from UCA to Old Park Lane	Creation of a new traffic-free route connecting from Odiham Road via Old Park Lane direct to the town centre.
Improved walking and cycling facilities across Farnham Park	Farnham Park is a unique amenity, providing an attractive environment for walking and cycling from the north. Further use could be encouraged with improved paths, including lighting where considered appropriate.
Town centre walking routes	Provision of high-quality waymarked walking routes across the town centre, connecting from South Street, Union Road and Gostrey Meadow to UCA through the historic town centre.

## **Identifying potential options**

Measure	Description
Improved pedestrian crossings	'Countdown' facilities on pedestrian crossings to improve pedestrian confidence; raised tables to provide flush crossing facilities.
Borelli Walk Off-road shared- use path	Improvements to Borelli Walk to provide a fully segregated high-quality off-road path for pedestrians and cyclists, connecting the eastern edge of the town centre to Gostrey Meadow.
New pedestrian / cycling bridge from station to town centre	New pedestrian and cycling bridge, which would cross the A31 and connect from the station to Gostrey Meadow and the south of the town centre.
Approach Road	Provision of a continuous footway on Approach Road, from A287 Firgrove Hill to Farnham station.
Upper Hale	Improved footways to be considered as part of a corridor strategy for the Upper Hale Road.
Wrecclesham	Improved footways to be considered as part of a corridor strategy for the A325 through Wrecclesham.

In addition to the above listed areas, wider geographic coverage of walking improvements in north and south Farnham will be considered.

### **Cycling routes and infrastructure**

All the routes listed above will also be considered for improved cycling infrastructure. In addition, several other areas have been identified as needing major improvements to cycling infrastructure.

Any new off-road routes (for example, through Farnham Park) would require the review of bylaws on permitted use. Bylaws would need to be updated to reflect permitted uses, and any proposed changes to bylaws will be advertised in the local area.

The development of new cycling routes will be planned in accordance with the proposed Local Cycling and Walking Infrastructure Plan (LCWIP) for the town. These routes will connect with existing infrastructure, for example National Cycle Network (NCN) Route 22. Existing routes are not shown on the maps of the proposals, to ensure legibility of the plans.

Measure	Description
Cycle parking around the town centre	The availability of safe places to park bikes is important for cyclists. Cycle stands should be provided near to key destinations across the town centre.  A cycle storage infrastructure project for Waverley borough is already underway with a Project Working Group consisting of Clerks and elected member representatives from Farnham, and representatives from the cycle forum.

# **Identifying potential options**

Measure	Description
Old Park Lane	Improved quiet route for cyclists (and pedestrians) from Odiham Road towards Castle and town centre.
Improved cycling facilities across Farnham Park	Potential route alignments will be confirmed through more detailed technical work and stakeholder engagement.  Lighting could be considered for specific routes where this is considered appropriate.
Weybourne Road cycling routes	Provision of a high quality, segregated cycling route, which is protected from general traffic and parked vehicles.
Badshot Lea Road cycling route	Provision of a high quality, segregated cycling route, which is protected from general traffic and parked vehicles.
Improved route: SE Farnham	Improvement to segregated standard on existing route past station and crossing A31 at Hickleys Corner.
Upper Hale	Improved provision for cyclists to be considered as part of a corridor strategy for the Upper Hale Road.
Wrecclesham	Improved provision for cyclists as part of a corridor strategy for the A325 through Wrecclesham.



## **Identifying potential options**

### E-bikes and e-scooters

Innovative new options are now emerging that offer the potential to significantly improve accessibility without the need for a car. Electrically assisted bikes (e-bikes) can significantly increase the range of viable journeys and can tackle problems in climbing hills (which is a challenge in parts of Farnham).

E-scooters are a new technology that is rapidly developing. Whilst privately owned e-scooters cannot yet be legally used on the public highway, trials of e-scooter hire schemes in cities across England are examining the issues, with the objective of enabling future larger-scale implementation of this technology.

Measure	Description
Subsidised e-bikes purchase	Financial assistance to help people to buy e-bikes.
E-bike rental scheme	e-bikes available for hire by residents across the town.
E-bike hire hubs	e-bike hubs across the town, with the ability to 'unlock and ride' using an app.
E-scooter hire	e-scooter hire stations across the town, with the ability to 'unlock and ride' using an app. This requires enhanced user credentials (including a full Drivers Licence) to unlock a scooter.



## **Identifying potential options**

### **Public transport improvements**

Farnham benefits from good rail links to London and significant numbers of people commuted by train before the COVID-19 pandemic. It is not clear how working patterns and commuting will change in the longer-term, but this could have significant implications for the viability of train services. These will need to be carefully monitored and reviewed over the next year.

The bus network does not, at present, offer a level of service that is sufficiently fast, frequent, or convenient to attract large numbers of people from their cars. The focus would therefore be to increase service frequencies on key routes, supported by bus priorities, state-of-the art electric vehicles and low fares.

The measures listed below were initial proposals identified through the OIP process. Proposals for improved services and infrastructure will be developed through the Bus Service Improvement Plan (BSIP) covering the wider area.

Measure	Description
Expansion of free bus passes	Extension of free school travel to children.

Measure	Description
Increased service frequencies	Minimum frequency of four buses per hour on key corridors, including West Street / Wrecclesham Road, Firgrove Hill, Tilford Road, East Street / Hale Road, Castle Hill / Folly Hill.  Further technical assessment has shown that demand is currently concentrated on routes operating to the east (via East Street) and south (via South Street). Demand is much lower on routes via Castle Street and West Street. This is due to the current configuration of services in the town. Consideration will be given to options for both introduction of new services and incremental upgrades of existing services.
Electric bus fleet	Introduction of new electric buses on all services in Farnham.
New bus routes	Example potential routes could include:  N/S route: Upper Hale to South Farnham,  E/W route: Wrecclesham to Badshot Lea.  The feasibility of the introduction of new bus routes will be considered alongside enhancement of existing services within the framework of the Bus Service Improvement Plan (BSIP) for the area. Route selection will be undertaken following liaison with SCC's BSIP team.

# **Identifying potential options**

Measure	Description
New demand- responsive bus services	New demand responsive bus services on routes not served by frequent main services, with information and booking using new App technologies.  The feasibility of introducing new demand responsive services will be considered alongside conventional services within the framework of the Bus Service Improvement Plan.
Improved bus stops	Improved bus stops, with level boarding, new bus shelters and advanced real time information.  The strategy for the introduction of improved bus stops will be informed by the future bus network plan. Improvements will initially be focused on the town centre, where demand is highest, and then programmed for the busiest routes in the town.
Bus priority measures	Focused on areas with delays and poor journey time reliability. Options include bus lanes and 'bus gates'. Further investigations have shown that there is limited scope for the introduction of bus lanes due to the narrow widths of most of the roads used by buses in Farnham. Consideration will instead be given to priority for buses at traffic signals and incorporating bus priority into new transport schemes.

Measure	Description
A325 Farnborough Road Bus Corridor	Programme to significantly improve attractiveness of bus travel: high frequency services, new stops, real time information, bus priority.
A325 Farnham to Bordon Corridor	The proposals for each corridor will be informed by the overall Bus Service Improvement Plan covering the town.
P&R: Guildford Rd, A31 Shepherd & Flock, A31 Coxbridge, A287 Odiham Road	Park & Ride / Stride sites to include car parks, high quality waiting facilities (shelters and real time information), frequent electric bus services to town centre and bus priorities to reduce journey times.  Potential Park & Ride sites were initially considered at Coxbridge Roundabout, Shepherd & Flock and the A287 Odiham Road. Further investigations have indicated that there would be significant technical and environmental challenges at these locations.  Furthermore, these sites are not served by frequent bus services, and it is unlikely that new Park & Ride services would be viable at these sites. Alternative options will instead be investigated to enable car users to transfer to bus services to travel into the town centre.

## **Identifying potential options**

### **Freight**

Farnham caters for high volumes of goods vehicles serving the town centre. These have significant impacts on traffic flow and the urban environment. A wide range of options to better manage the impacts of lorries and vans have been identified, including shared deliveries, cargo bikes, dedicated off-street servicing and freight consolidation hubs.

Measure	Description
Good practice guide on servicing	Guide developed jointly with local retailers and business community, shared with delivery companies.
Shared deliveries	Local businesses collaborate to consolidate and share deliveries.
Cargo bikes / cargo e-bikes	Cargo bikes or cargo e-bikes used for deliveries of goods into town centre. Usually requires a site for offloading of goods from lorries and vans, in the town centre or nearby.
Dedicated off-street unloading facilities	A site where goods can be unloaded in the town centre and transferred to cargo bikes. It could potentially be in the central car park.
E-commerce lockers	Parcels can be placed in lockers and picked-up by residents, to reduce van traffic in local neighbourhoods.

Measure	Description
Local freight hub	Could be combined with e-commerce lockers and cargo bikes to reduce goods vehicle traffic in local areas.
Freight consolidation centre	Strategic freight hubs (potential options could include Water Lane (Farnham Neighbourhood Plan Site 18) and Guildford Road). Lorries entering Farnham would access the centres, with goods transferred to small electric vans or cargo e-bikes for deliveries to the town centre.
Increased rail freight with cargo e-bike transfers from station to town centre	Provision of increased rail freight paths on the railway, with transfer facilities near Farnham station and onward transfer to cargo e-bikes for deliveries to the town centre.

It should be noted that all freight measures are designed to maintain the ability to service local businesses whilst reducing the impact of delivery vehicles on all who live, work in, or visit the town.

## **Identifying potential options**

### Shift to zero emissions transport

Electrification of the vehicle fleet will be a critical component of the future decarbonised transport system. Action must be taken locally to enable the rapid roll-out of electric buses and cars, although more national action will be needed for the decarbonisation of freight.

Interventions for the electrification of vehicle fleets, and associated charging infrastructure, will be developed in accordance with Surrey County Council's Electric Vehicle Strategy.

Measure	Description
Electric bus fleet	Introduction of new electric buses on all services in Farnham.
Electrification of taxi fleets	Replacement of all taxis with electric or ultra-low emissions vehicles.
Electric vehicle charging points in car parks	Large-scale implementation of charging points in car parks to enable accelerated uptake of EVs in Farnham and the surrounding area.
On-street electric vehicle charging points	Provision of on-street charging points to meet the needs of drivers using on-street parking, and people who do not have a private driveway (and cannot therefore charge a vehicle from their homes).
	The provision of charging points should be carefully planned to balance the need to support rapid transition to EVs, whilst avoiding continued growth in car dependency.
	It will also be important to ensure that footways do not become cluttered with chargepoints, and there remains sufficient space for the needs of pedestrians. The provision of chargepoints should be planned as part of an integrated approach to management of streetspace across Farnham.

## **Identifying potential options**

### Roadspace reallocation and safety

Many of the streets in the town centre and across the town are dominated by traffic and local people have expressed concerns about the impacts of traffic on road safety. Options have therefore been developed for reallocating roadspace, including widening footways, reducing on-street parking, school safety zones and Low Traffic Neighbourhoods.

The programme team is working closely with SCC's Road Safety and Sustainable School Travel and Active Travel teams to develop potential options to improve road safety and develop safe walking and cycling routes to/from schools.

Measure	Description
Footway widening	Widening of footways on streets where footways are currently narrow (already addressed under walking measures).
Reduction of on- street parking	Focused on roads where this is a problem or needs to be reduced, potential locations (amongst others) include Upper Hale Road and Waverley Lane.
School Safety Zones	Measures to reduce through traffic, reduce motorised traffic speeds and improve attractiveness of streets for walking and cycling in local neighbourhoods.
Low Traffic Neighbourhoods	Measures to reduce through traffic, reduce motorised traffic speeds and improve attractiveness of streets for walking and cycling in local neighbourhoods.

Measure	Description
School Safety Zones	Measures to reduce through traffic, reduce motorised traffic speeds and improve attractiveness of streets for walking and cycling in local neighbourhoods.
Low Traffic Neighbourhoods	Measures to reduce through traffic, reduce motorised traffic speeds and improve attractiveness of streets for walking and cycling in local neighbourhoods.
Junction alterations	Measures to improve road safety for all users at junctions will be considered where required. This could include physical layout and traffic signals. Potential locations include (but are not limited to) Upper Hale Road / A325, Alma Lane / Farnborough Road, Water Lane roundabout.
Speed reduction measures	Focused on areas where high motorised traffic speeds have been observed, including Heath End, Weybourne Road and West Street (north / east of Coxbridge roundabout). Investigation of areas where speeds are perceived to be high, including Folly Hill, Firgrove Hill and Upper Hale Road has been undertaken as part of the separate Speed Study.
20mph speed limits	Reduce speed limit to 20mph across the town centre and key routes, potentially including Weydon Lane and Upper Hale Road.
50mph speed limit on A31	Reduce speed limit on A31 between Coxbridge Roundabout and Shepherd & Flock Roundabout.
Average speed cameras	To enforce speed limits across the town.

## **Identifying potential options**

### Integrated road corridor programmes

Many of the road corridors in Farnham are likely to need an integrated approach, which takes account of the needs of pedestrians, cyclists, cars, buses, and goods traffic.

Measure	Description
Route Treatment Strategies	'Link and place' approach used to rebalance approach to treatment of corridors including Wrecclesham, Firgrove Hill, Tilford Road, Waverley Lane, and Upper Hale Road.
A325 Farnham to Bordon Corridor Strategy	Integrated approach to addressing the current and future issues on this corridor, including future traffic growth, promoting mode shift, and addressing the impacts of HGVs in the corridor.

### **Major highway improvements**

Major road schemes have previously been proposed, including A31 Farnham corridor improvements and Wrecclesham Bypass. Stakeholders have also identified ideas for a new Western Bypass, connecting from the A31 west of Coxbridge Roundabout to A287 Odiham Road. The project team has also identified other potential improvements to the road network.

Development of the schemes will require an integrated approach to maximise the benefits to the town centre (in particular) and the wider town. Further assessment will be required to establish how to maximise benefits from the schemes and minimise negative impacts from car usage.

Measure	Description
A31 Coxbridge Roundabout	This would complement proposals for Hickley's Corner to the east. Options could include widening the A31 approaches to the roundabout. This will form part of an integrated approach to improving the A31 through Farnham.
A31 Hickley's Corner	Proposals have previously been developed in the past to build an underpass for the A31. Other options are also being considered, including localised widening of the approaches. (This forms 'Project 3' in the Vision Statement). This will form part of an integrated approach to improving the A31 through Farnham.
A31 Shepherd & Flock Gyratory	This would complement proposals for Hickley's Corner to the west. Options could include widening the approaches to the gyratory.  This will form part of an integrated approach to improving the A31 through Farnham.
Station Hill level crossing improvement and Approach Road	Consideration has been given to different options to improve traffic conditions at the level crossing. The programme team will liaise with Network Rail to identify options to reduce the barrier 'downtime' caused by trains at the level crossing. It is considered that there are no viable options for building a new bridge or tunnelling under the railway. A range of options will instead be considered to improve connections between the A31 and roads to the south of Farnham as an integral part of the A31 corridor improvement strategy.

# **Identifying potential options**

Measure	Description
A287 Firgrove Hill Bridge over A31	Strengthening of A287 Firgrove Hill bridge over A31 to remove the need for the 7.5T weight restriction. This could be considered further as an integral part of the A31 corridor improvement strategy. However, this also needs to be considered in the light of proposals to reduce heavy goods vehicle traffic in the town centre.
A325 Wrecclesham Bypass	Previous proposals have identified three potential route options for a bypass, connecting from the A325 south of Wrecclesham to the A31. (This forms 'Project 4' in the Vision Statement).
Farnham Western Bypass	Stakeholders have identified proposals for a new western bypass from the A31 (west of Coxbridge Roundabout) to A287 Odiham Road. Various options include upgrading existing lanes or creating new road connections.
Access to Upper Hart car park from Castle Hill	Construction of a new access road to Upper Hart car park from Castle Hill.

Measure	Description
A325 Wrecclesham Railway Bridge	Options for rebuilding the existing railway bridge to accommodate all lorries and remove the need for the height restriction. There would be significant technical constraints, including geotechnical challenges, regrading of the highway carriageway, working under a live railway and a long-duration road closure at this location, which would require traffic to be diverted via Weydon Lane.
	The footway under this bridge is also narrow: options should include significant improvements to widen the footway to improve conditions for pedestrians passing under the bridge.



# **Shortlisting options**

The previous section described the process of developing a long list of potential transport options for Farnham. These options have been assessed based on their potential to tackle the problems and meet the OIP objectives.

A tool was developed for the assessment and shortlisting process. This comprised three steps:

- **Step 1: Strategic case:** this assessed the extent to which each option would support the OIP objectives.
- Step 2: Economic case: this assessed the extent to which each option would be likely to be an effective use of public funds.
- Step 3: Delivery case: this assessed the issues related to the implementation and affordability of each option.

The assessment framework and the three steps were designed to provide a flexible tool to allow decision-makers to assess the strengths and weaknesses of different options. This will help to inform the approach to identifying schemes and/or packages to achieve the programme objectives. It will also provide evidence to inform the more detailed development of schemes as they are taken forward for future implementation.

All the options are at a very early stage of development. Designs have not been produced and detailed analyses have not been undertaken The approach to assessment has therefore been based on expert judgement of the potential impacts based on evidence from other places.



## **Shortlisting options**



This assessed the potential effectiveness of each optionin addressing the four OIP objectives. This was informed by the more detailed indicators that were developed through the logic mapping in Appendix 1. These indicators are set out below.

Each indicator was scored using the following scale:

- +2 Large improvement.
- +1 Small to moderate improvement.
- Neutral or no significant change.
- Small or moderate adverse impact.
- Large adverse impact.

From this, average scores were derived for each indicator, and an average for the strategic case, for each option.

The average scores were then used to rank the performance of the options for the strategic case. This was used to identify the options with strong and weak scores.

Category	Sub-Category
Reduce carbon emissions	Reduce distances travelled
	Increase proportion of journeys by zero carbon modes
	Improve efficiency of vehicle operations
	Increase proportion of zero emissions vehicles
Well- connected communities	Safer, more convenient travel by walking & cycling
	Quality and convenient public transport
	Safe, reliable & affordable public transport
	Connectivity to labour markets, supply chains & markets
Support economic vitality	Reliable journey times for people and goods movement
	Improve resilience and future-proofing of the transport network
	Support competitiveness & vitality of Farnham town centre
Improve quality of place	Improved air quality through reduced NOx and PM10 emissions
	More walking and cycling, contributing to healthier lifestyles
	Reduced impacts of traffic on town centre and local communities
	Improved access to the countryside

## **Shortlisting options**



# **Economic case**

This assessed the potential for each option to make effective use of public funds, based on the types of impact considered to be most important by the Government: economic growth, carbon emissions, local environment and wellbeing and social impacts.

A set of indicators was again used to assess the performance for each criterion, with each indicator again scored using the same five-point scale, from +2 (large improvement) to -2 (large adverse effects).

Average scores were derived for each option, which were then used to rank the performance of the options for the economic case. This was used to identify the options with strong and weak scores.

Category	Sub-Category
Economic growth	Connectivity – impacts on journey time and cost of travel
	Reliability – impacts on day-to-day variability and impacts of incidents
	Resilience – impacts on resilience of infrastructure
	Housing – infrastructure facilitates delivery of new housing
Carbon	Activity – impacts on vehicle kilometres (avoid or shift)
	Efficiency – reduce fuel consumption or shift to zero-emission vehicles
	Embodied carbon – is significant construction required?
Local environment	Air quality – is AQMA affected, is air quality improved?
	Noise – will traffic noise increase or reduce?
	Natural environment – will scheme have positive or negative impacts?
	Streetscape – will scheme have positive or negative impacts?
Wellbeing and social impacts	Severance – increased or reduced?
	Physical activity – will scheme cause more or less walking and cycling?
	Injuries – will scheme cause more or less collisions and injuries?
	Access – will scheme improve access to facilities?
	Any impacts in accessibility / affordability for vulnerable groups?

## **Shortlisting options**



### Step 3: **Delivery case**

This assessed the potential deliverability of each option, taking account of technical complexity, construction and delivery risks and likely acceptability to different stakeholders and the general public. It also estimated potential capital costs, annual operating costs and considered affordability criteria.

A set of indicators was again used to assess the performance for each criterion, with each assessed using the five-point scale.

The scores for each option were then used to rank the performance of options against the delivery case. This was used to identify the options with strong and weak scores.

Sub-Category
Technical complexity – how complex is the option?
Technical risk – what is the scale of risk associated with the option?
Acceptability – how acceptable is this to stakeholders & general public?
Capital cost – what is estimated cost of construction of this option?
Operating costs – what is the estimated annual operating cost?
Affordability – assessment of overall financial affordability of each option

## **Shortlisting options**

### **Assessment findings**

An assessment was undertaken to inform the sifting-out of some schemes and shortlisting of schemes for further progression.

A summary of the findings of this process is presented below.

### **Step 1: Strategic Case:**

All the potential options had been identified in response to the transport challenges facing Farnham and therefore demonstrated an alignment against at least one of the OIP objectives. On this basis, all the options were progressed further for assessment of the economic case.

### **Step 2: Economic Case:**

The analyses showed a wide range in the performance of the options under the economic case. The most effective options score well against all of the categories (economic growth, carbon, local environment and wellbeing and social impacts). However, the impacts of some options are likely to be more limited or could have negative impacts in some cases.

Furthermore, it is important to consider if the scale of benefits would be sufficient to justify the scale of investment.

In most cases, options can be progressed further for assessment of their delivery case. However, in the case of the larger road schemes, more detailed technical investigations will be required. It is recommended that further technical studies are undertaken as follows:

A31 Farnham Corridor from Coxbridge Roundabout to Shepherd and Flock: a study is currently being undertaken to analyse the traffic problems and practical solutions for this corridor. The A31 at this location has been identified as a priority for investment by the region and DfT, and an improvement at this location is in the 'pipeline' for investment during the next 5-6 years.

This study is being undertaken to support the development of a Strategic Outline Business Case for investment at this location. This includes examining the issues at Coxbridge Roundabout, Hickley's Corner, and Shepherd and Flock. Solutions at Coxbridge Roundabout and Shepherd and Flock could include widening the approaches to reduce delays to A31 traffic.

In the case of Hickley's Corner, the issues are more complex, including conflicting movements using the junction, and gueueing traffic at the adjacent level crossing. There are also very poor connections for pedestrians and cyclists across the A31 between the station and the town centre. A comprehensive solution is required to address these complex issues.

The current study has identified a range of potential options that could help tackle the challenges in this area. The most promising options will be shortlisted and presented in a Strategic Outline Business Case in late 2021.

## **Shortlisting options**

 Wrecclesham area: the OIP team have undertaken an initial review of traffic movements in this area, and the evidence indicates that a bypass could help to reduce traffic on the A325 through the village.

Further work is needed to assess the constraints and technical viability of potential bypass options, potential impacts on traffic across the wider area, and estimated costs and benefits of different options. This should take account of the need to bridge the railway and River Wey, the presence of ancient woodland, and other local environmental constraints. It should also consider the potential scale of construction works, costs, embodied carbon, and consistency with the objectives of the programme.

More detailed transport modelling should also be undertaken to assess the potential traffic flows on the bypass, the potential scale of traffic relief in Wrecclesham, and traffic re-routing across South Farnham. This should include identification of unintended consequences, for example increased traffic flows on routes to access the bypass. This analysis should take account of increased travel demand in this area, including from the rapidly growing Whitehill-Bordon area to the south. This evidence should then be used to inform assessment of the overall benefits and the potential prospects of securing funding for the project.

• Western Bypass: the OIP team have undertaken an initial review of traffic movements in the area to the west of Farnham. The early assessment indicates that a new transport link to the west of the town, connecting the A287 Odiham Road to the A31 between Farnham and Bentley, could help to divert a proportion of traffic away from the main roads passing through Farnham. However, it is not yet clear if this would be of a scale to have a significant impact on the routes most impacted by through traffic.

There would be multiple technical and environmental constraints to the development of a new transport link around the west of the town. Farnham Old Park is an important environmental asset, and it is likely that route options would need to be considered further to the west, potentially crossing the Hampshire border. This would require close collaboration with Hampshire County Council (as highway authority) and Hart District Council (as planning authority).

It is recommended that an initial desktop study be undertaken of technical and environmental constraints across a wide area of search to the west of Farnham, which would help identify potential route options. Initial transport modelling should also take place to establish the extent to which traffic could divert to a new transport link, and the potential traffic relief in the town centre and North Farnham. This should take account of committed growth in the area, including the Aldershot Sustainable Urban Extension, together with emerging growth proposals across Hart District.

This study work should be used to rapidly inform a decision on whether a Western Bypass would support the objectives for reducing traffic in the town. If not, it is recommended that this option is not further progressed.

# **Shortlisting options**

### A proactive approach to managing the impacts of growth in the area.

Overall, there is a general need to assess the cumulative impacts of growth in Waverley and across the wider area. This should take account of work undertaken as part of developing the current Waverley Local Plan covering up to 2032 (Part 1 issued and Part 2 in consultation). It will also need to take account of the current planned growth at Whitehill-Bordon, Northbrook Park, and Aldershot (amongst other proposals), and emerging options being considered in Local Plan Reviews.

A critical question must also be addressed in terms of how the area addresses the travel demand associated with a growing population and economy. The default approach in the past has been to plan for increasing numbers of car trips and road infrastructure to accommodate this demand. However, it is now clear that this approach is not working; providing new road capacity tends to reinforce high levels of reliance on private cars and is worsening the challenges of climate change. A new approach is needed to manage travel demand from new development, which could help to reduce the need for new road infrastructure.

### **Step 3: Delivery Case:**

The assessments demonstrated that it will be critical to take account of deliverability and affordability issues in developing the programme. The costs of some of the schemes are likely to be high and it will be crucial to secure funding from a wide range of sources. This will be a practical challenge in the delivery of the programme, as will the processes of planning, statutory processes, and management of construction.

Many of the schemes can be integrated into scalable programmes that are affordable and with a high level of deliverability. However, the larger schemes will require further assessment of their alignment with current and emerging policy, costs, affordability, and deliverability. These include:

- A31 Farnham Corridor from Coxbridge to Shepherd and Flock: high-level costing of options, development of funding packages and delivery programme, the outcome of which will depend on the ongoing options study.
- Wrecclesham Bypass: high-level costing of options (including replacement of the existing rail bridge and a new crossing of the railway on a bypass), funding options and potential future delivery programme.
- Western Bypass: high-level costings and delivery assessment, depending on the outcomes of the initial options assessment.

The focus has been on prioritising schemes that have a relatively high level of deliverability and affordability. However, there is scope to consider larger, more complex schemes for a future longer-term pipeline. The programme of studies for the A31 Farnham corridor and Wrecclesham area should address deliverability of schemes to inform the development of a longer-term pipeline.



### **Shortlisted schemes**

The scheme options that scored well during the assessment and sifting process have been taken forward for further consideration as part of an emerging strategy.

Options can then be packaged relative to their ability to meet strategic objectives, and packages will then be developed in response to stakeholder views. To develop a workable strategy for the town any proposals will also need to respond to deliverability and affordability criteria. Indicative cost ranges have therefore also been developed for the schemes. These are shown as cost ranges because they are at a very early stage of development and will require further analysis as work progresses on the OIP.

### **Emerging strategy**

As outlined in Chapter 3 Farnham benefits from a range of natural and built environment assets. The town benefits from diverse land uses, with independent and multiple retailers, restaurants, diverse businesses, leisure, cultural, social and entertainment, education, religious and medical facilities – all located within a relatively compact environment.

Farnham benefits from a strong economy, with a highly skilled population and high levels of economic activity. However, the town faces challenges. There are very high levels of car ownership and car use, with relatively few people walking, cycling, or using public transport. The high volumes of motorised traffic in the town are causing high levels of congestion, poor air quality, severance in the town centre and local neighbourhoods, concerns about road safety and a worse local environment.

Farnham, like much of Surrey and the South East, is forecast to experience significant population growth over the next 10-30 years. This reflects the strength of the local economy and the attractiveness of the area as a place to live and work. However, this growth will increase motorised traffic, which will worsen congestion, air quality, safety problems and carbon emissions.

Action needs to be taken rapidly to address these problems. The emerging strategy is therefore based on an integrated programme to improve the attractiveness of alternatives to the car, tackle the impacts of freight and help to improve the efficiency of journeys by road.

The emerging strategy includes the following themes:

- Behaviour Change.
- Low Traffic Neighbourhoods and Safer Streets.
- Town Centre Strategy.
- · Walking.
- Cycling, E-bikes and E-scooters.
- Public transport.
- Parking and Demand Management.
- Electrification of the transport system.
- Freight and deliveries.
- Better journeys by road.

### Strategy components in Farnham

The strategy will provide an integrated approach to tackling the challenges in different parts of the town. Work will now take place to develop programmes for the following areas:

- Town centre.
- North Farnham, including Hale, Upper Hale, Heath End, Weybourne, and Badshot Lea.
- South Farnham, including Wrecclesham; Rowledge, Boundstone, Shortheath, Lower Bourne, and Compton.
- A31 as the main east-west road corridor through the town.

Options that are selected to be progressed will be subject to more detailed assessments, to meet legal requirements and best practice in the development of transport projects. These will include Environmental Impact Assessment (EIA), Equality Impact Assessment (EqIA), Ecological Impact Assessment (EcIA) and Flood Impact Assessment.

In addition, options will be developed in accordance with Inclusive Design Standards and best practice. These include ensuring safe use of the environment by all users, including those defined as having protected characteristics under the Equality Act. These include age, disability, gender reassignment, marriage and civil partnership, pregnancy and maternity, race, religion or belief, sex, and sexual orientation.

Options will also be actively considered to maximise the environmental benefits of the programme, by promoting biodiversity net gain, together with maximising opportunities for greening and urban tree-planting.

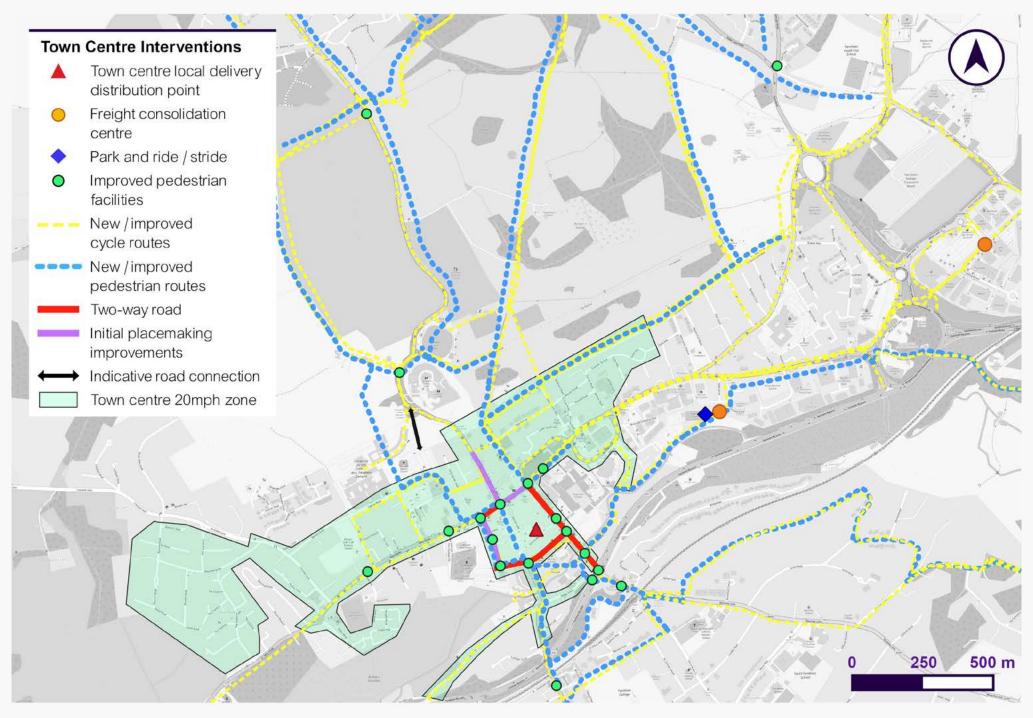
### **Town centre**

This is the historic heart of Farnham, an important destination between Guildford and Winchester that serves western Surrey and eastern Hampshire. It benefits from a dynamic economy, with a high-quality retail, food and drink offer and unique heritage.

Motorised traffic dominates the town centre. The OIP proposes an integrated town centre strategy, including high quality public realm, major improvements to walking and cycling, new public transport hubs, and major changes to the town centre road layout. These will be supported by Park & Ride / Stride, better management of town centre car parking and improved control of deliveries through freight consolidation.

Potential short- and medium-term interventions could include HGV restrictions, lower speed limits, and further enhancement of the emergency active travel measures that were recently introduced. Some of these are being implemented or have already been already installed.

The map overleaf shows illustrative potential interventions for the town centre and surrounding area. The strategy for the town centre is currently being developed: proposals will be developed in more detail following the completion of the town centre strategy. Furthermore, it will need to take account of the ongoing development of the Local Cycling and Walking Implementation Plan (LCWIP) and Bus Service Improvement Plan (BSIP).



# **Emerging strategy and next steps**

### **North Farnham**

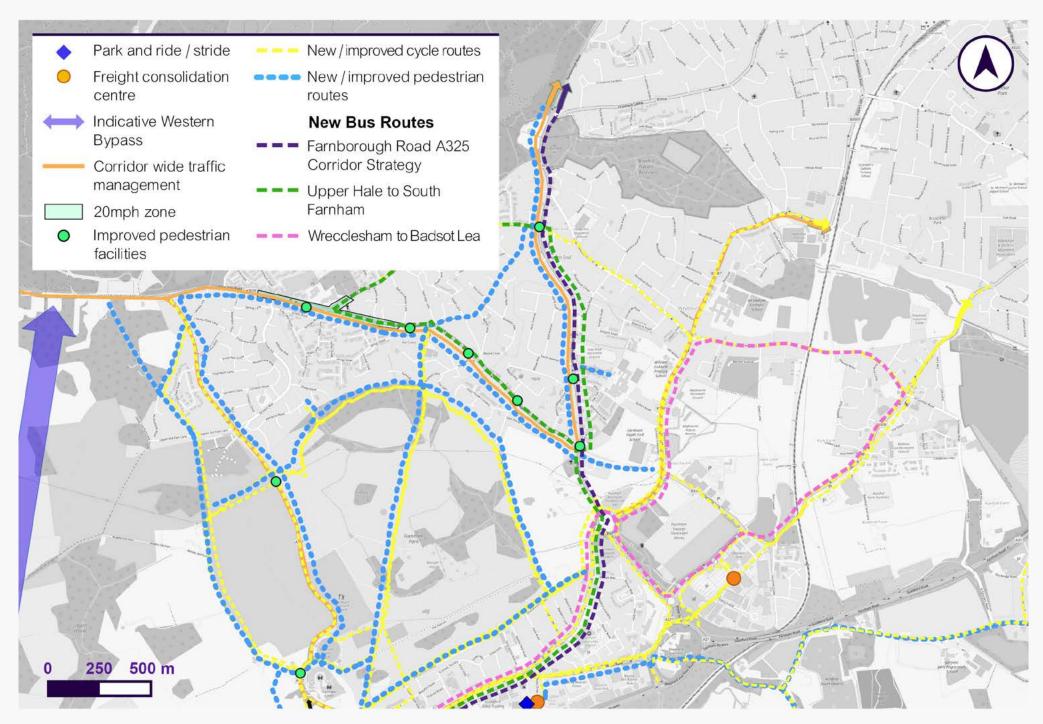
This extensive urban area has strong linkages with adjacent parts of Hampshire. There are heavy traffic demands generated by this area, both cars and goods vehicles. There are significant challenges caused by heavy volumes of motorised traffic on roads including the A3016 through Upper Hale and A325 through Heath End.

The OIP proposes a programme of traffic management measures, which will be the subject of further study work. Schemes will be progressed for improved walking and cycling, including cycle routes through Badshot Lea and Weybourne. Options will be considered for new bus services and enhanced bus infrastructure on the A325 Farnham to Aldershot corridor. An initial assessment will be undertaken on the potential benefits of a Western Bypass, focusing on the ability to reduce through motorised traffic in the area.

Short- and medium-term interventions will also be progressed to tackle the impacts of HGVs and speeding traffic through the area This includes the introduction of a ban on through movements by HGVs and proposals for a 20mph zone on the A3016 through Upper Hale.

The map overleaf shows illustrative potential interventions for North Farnham. Proposals for investment in walking and cycling will be confirmed following completion of the Local Cycling and Walking Implementation Plan (LCWIP). Public transport interventions will be confirmed following completion of the Bus Service Improvement Plan (BSIP).





# **Emerging strategy and next steps**

### **South Farnham**

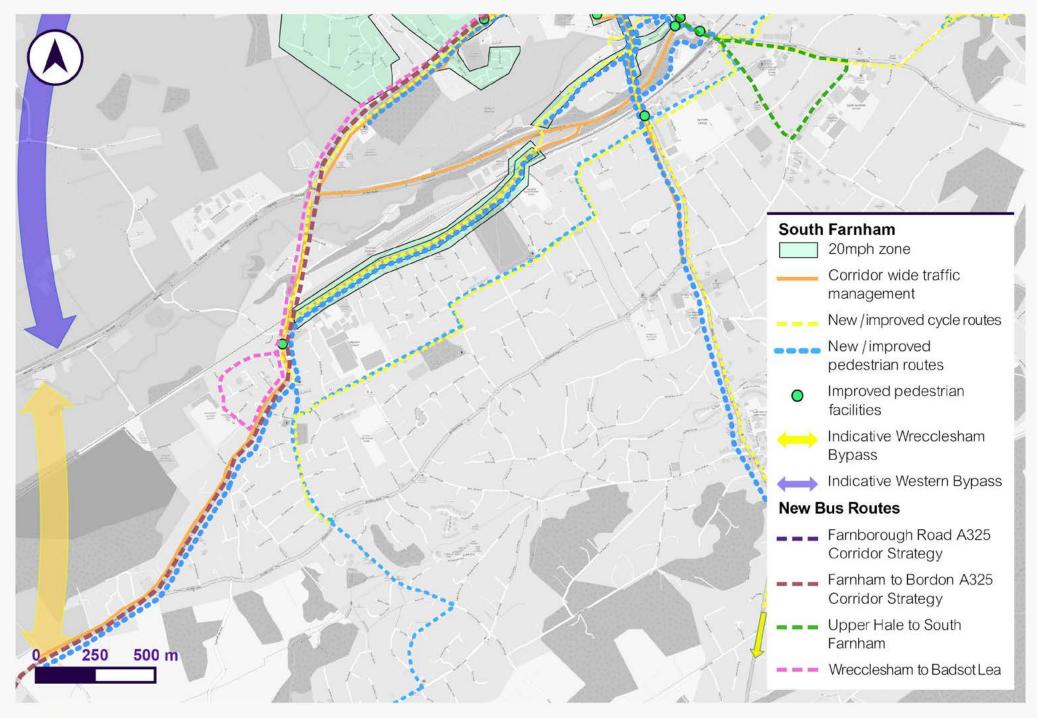
This area faces significant challenges caused by local traffic and longer journeys from south west Surrey and eastern Hampshire. There are problems caused by the level crossing near the station, with long tailbacks, and traffic passing through Wrecclesham, which also experiences problems caused by a sub-standard rail bridge.

The OIP proposes a programme of traffic management measures, focusing on Wrecclesham, to be the subject of further study work. This will include investigation of the benefits of a bypass. Schemes will be progressed for improved walking and cycling, including improvements near the station, and crossing the A31, together with new bus routes and better bus infrastructure through Wrecclesham.

Short-and medium-term interventions will also be progressed to tackle the impacts of speeding traffic in the area. This includes proposals for a 20mph zone on Weydon Lane.

The map overleaf illustrative potential interventions for South Farnham. Proposals for investment in walking and cycling will be confirmed following completion of the Local Cycling and Walking Implementation Plan (LCWIP). Public transport interventions will be confirmed following completion of the Bus Service Improvement Plan (BSIP).





# **Emerging strategy and next steps**

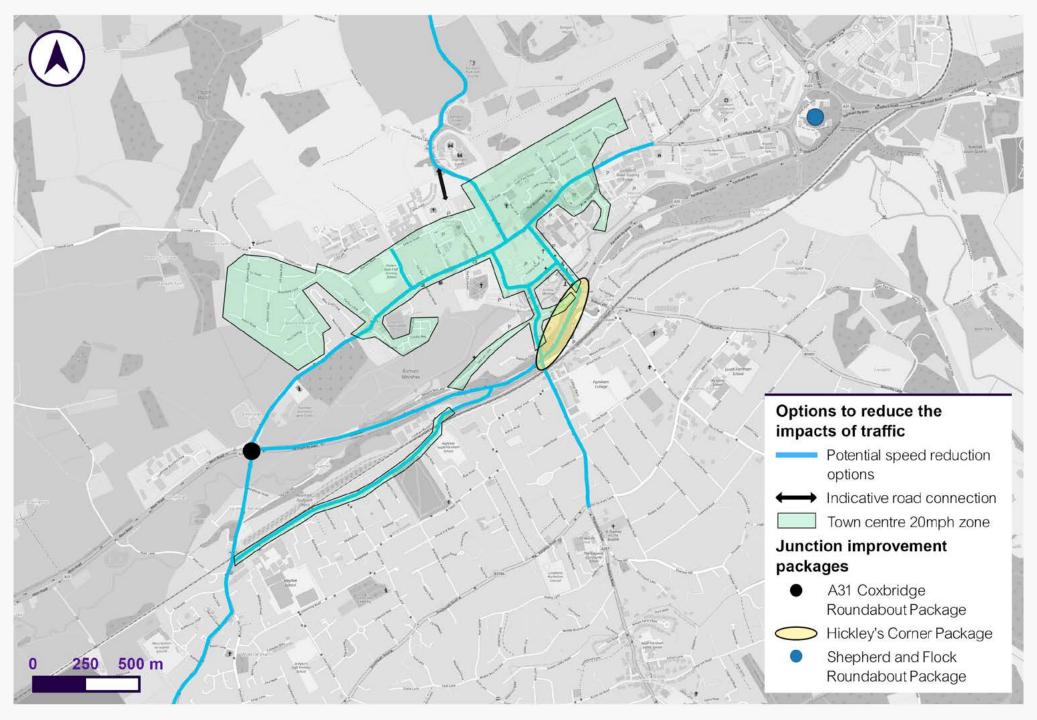
### A31 corridor

The A31 is the main east-west route through western Surrey and eastern Hampshire and plays a vital role in the regional economy. The main bottleneck on the route is the Hickley's Corner junction, with long queues on the approaches. The area is forecast to experience rapid growth in population, which will exacerbate delays at the junction.

The OIP proposes more detailed study work to assess the A31 corridor and develop a programme of improvements between Coxbridge Roundabout and Shepherd and Flock. This will include a comprehensive solution to address the challenges at Hickley's Corner. This will be fully integrated with the wider OIP and will ensure full integration with the proposals for the town centre and South Farnham.







### **Emerging strategy and next steps**

### **Farnham-wide improvements**

Providing environmental improvements across Farnham to help people travel and tackle the causes of climate change will be vital to the success of the programme, and to bring the change people in the town want to see.

### Helping people leave the car at home:

- Creation of a travel app, which brings public transport, walking and cycling options together in one place.
- Introducing car clubs to the town, for people who do not need regular use of a car.
- More work with schools to encourage more walking and cycling.
- More emphasis on supporting pedestrians including improved footpaths, priority streets and new crossing points.
- Increased cycle parking in the town centre and other key locations.
- · Dedicated cycle paths.
- Hire or subsidised purchase of e-bikes and e-scooters.

### **Reclaiming roads from cars:**

• Piloting and then rolling out low traffic neighbourhoods – where it is harder for drivers to 'rat run' through residential areas instead of using more suitable 'main' roads.

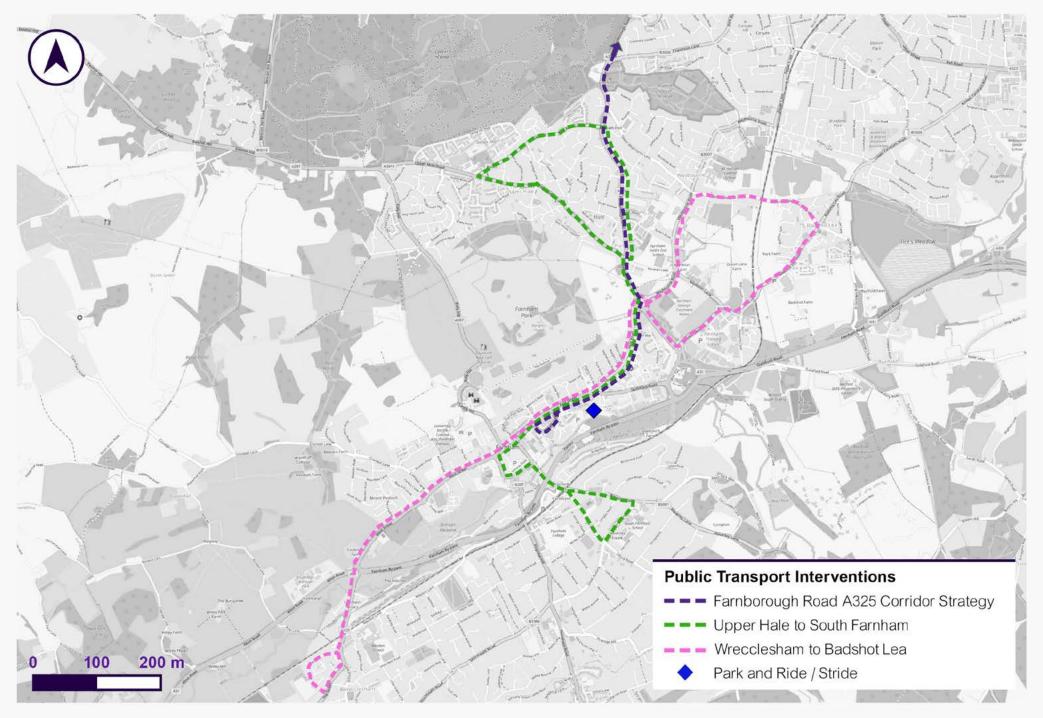
### **Using buses:**

- Improved services, passenger infrastructure and bus stops.
- Using electric and ultra-low emission buses.
- Review fares including free passes and 'Hoppa' tickets.
- Review bus routes.

### **Enabling a rapid shift to electric vehicles:**

• A comprehensive strategy for rapid delivery of Electric Vehicle (EV) chargepoints across the town.





# **Emerging strategy and next steps**

The table below shows the components of the strategy in each part of the town.

	Town-wide Town centre North Farnham South Farnham A31 corridor
Behaviour Change	V
Low Traffic Neighbourhoods and Safer Streets	VV
Town Centre Strategy	V
Walking	VVVV
Cycling, E-bikes and E-scooters	VVVV
Public transport	VVV
Parking and Demand Management	VV
Electrification of the transport system	V
Freight and deliveries	VV
Better journeys by road	<b>VVVV</b>



Scheme(s) theme	Short-term (1-3 years) (2021-2024)	Medium term (4-8 years) (2025-2029)	Long-term (>8 years) (From 2030)
Behaviour Change	<ul> <li>Development of 'Mobility as a Service' platform</li> <li>Personal Journey Travel Planning service</li> <li>Incentivising active travel to schools (e.g. 'Golden Boot Challenge', Eco Schools and School Travel Plans)</li> <li>Car club / car share schemes</li> <li>Part-time home working.</li> </ul>	<ul> <li>Full roll-out of 'Mobility as a Service' platform</li> <li>Continued focus on delivery of Behaviour Change programmes.</li> </ul>	<ul> <li>Long-term funding and support for Behaviour Change programmes to embed sustainable travel choices.</li> </ul>
Low Traffic Neighbourhoods and Safer Streets	<ul> <li>Low Traffic Neighbourhoods pilots</li> <li>School Safety Zones and school streets</li> <li>Refresh existing speed signage</li> <li>Measures to manage HGVs through town</li> <li>Reduced speed limits at appropriate locations</li> </ul>	Low Traffic Neighbourhoods - wider roll-out of programme.	-
Town centre strategy	<ul> <li>Complete assessment of optimum traffic management strategy for town centre ('Project 2')</li> <li>Public realm: enhance public realm in Castle Street and Downing Street; The Borough will also be considered</li> <li>Potential short-term improvements to road layouts in town centre.</li> </ul>	<ul> <li>Public realm: enhancements to public realm in town centre car parks</li> <li>Potential further improvements to road layouts and pedestrian facilities across the town centre.</li> </ul>	-

Scheme(s) theme	Short-term (1-3 years) (2021-2024)	Medium term (4-8 years) (2025-2029)	Long-term (>8 years) (From 2030)
Walking	<ul> <li>Development and publication of Local Cycling and Walking Improvement Plan (LCWIP)</li> <li>Improve north-south and east-west routes and routes through Farnham Park</li> <li>Pedestrian priority zones</li> <li>Narrow carriageway and widen footways at key locations</li> <li>New and improved pedestrian crossings</li> <li>The programming of improvements to walking facilities will be informed by the LCWIP. Further improvements will be informed by the area studies.</li> </ul>	<ul> <li>New / improved pedestrian / cycle crossing facilities over A31</li> <li>Corridor strategies: improved walking facilities.</li> </ul>	_
Cycling	<ul> <li>Development and publication of Local Cycling and Walking Improvement Plan (LCWIP)</li> <li>Improve routes to / from town centre, railway station and through Farnham Park</li> <li>New segregated routes</li> <li>Increase cycle parking in town centre and other key locations</li> <li>The programming of improvements to cycling facilities will be informed by the LCWIP. Further local improvements will be informed by the area studies.</li> </ul>	<ul> <li>New / improved pedestrian / cycle crossing facilities over A31</li> <li>Corridor strategies: improved cycling facilities.</li> </ul>	-

Scheme(s) theme	Short-term (1-3 years) (2021-2024)	Medium term (4-8 years) (2025-2029)	Long-term (>8 years) (From 2030)
E-bikes and e-scooters	<ul><li>Subsidised electric bike purchase</li><li>Electric bike rental scheme and hire hubs</li><li>Investigate feasibility of e-scooter hire scheme.</li></ul>	-	-
Public transport	<ul> <li>Improve service frequencies</li> <li>Improve bus stops</li> <li>Electric bus fleet</li> <li>Further study to investigate viability of Park &amp; Ride and optimal locations.</li> <li>Improved passenger infrastructure.</li> </ul>	<ul> <li>New bus routes and demand responsive services</li> <li>Bus priority infrastructure</li> <li>Bus corridor strategies (Farnborough Road, Wrecclesham)</li> <li>Expansion of free bus pass</li> <li>Hoppa bus ticket fares</li> <li>Park &amp; Ride sites at strategic locations (sites to be determined following further assessment).</li> </ul>	-
Parking and Demand Management	<ul> <li>Variable Messaging Signs – showing live car park capacities</li> <li>Reduction of on-street parking at key locations.</li> </ul>	<ul> <li>Rationalisation of town centre car parking</li> <li>Workplace Parking Levy or</li> <li>Road Pricing (regional and / or national approach).</li> </ul>	-

Scheme(s) theme	Short-term (1-3 years) (2021-2024)	Medium term (4-8 years) (2025-2029)	Long-term (>8 years) (From 2030)
Electrification of the transport system	<ul> <li>Electrification of taxi fleet</li> <li>EV charging – car parks and on-street</li> <li>Electric bus fleet.</li> </ul>	<ul> <li>Continued roll-out of Electrification of taxi fleet</li> <li>Continued roll-out of EV charging</li> <li>Electric bus fleet.</li> </ul>	-
Freight and deliveries	<ul> <li>Guide / protocol for town-centre servicing</li> <li>Loading pads (timed use only) on widened footways</li> <li>Town-centre freight CCTV survey to inform loading locations and freight protocol</li> <li>Further study to investigate viability of freight consolidation.</li> </ul>	<ul> <li>Freight consolidation amongst businesses</li> <li>Electric cargo bikes</li> <li>Provide dedicated town-centre off-street loading locations</li> <li>E-commerce lockers for residents / employees / visitors</li> <li>Freight consolidation centre outside town centre.</li> </ul>	Freight consolidation centre outside town centre.

Scheme(s) theme	Short-term (1-3 years)	Medium term (4-8 years)	Long-term (>8 years)
	(2021-2024)	(2025-2029)	(From 2030)
Better journeys by road	<ul> <li>Study to develop options for A31 corridor, including schemes at Coxbridge Roundabout, Hickleys Corner, and Shepherd &amp; Flock (Project 3).</li> <li>This study includes options to reduce traffic flows at the level crossing and improve connections to A287 at Firgrove Hill.</li> <li>Submission of initial Business Case for shortlisted options to DfT in late 2021. Continued development of options, design, and business case during 2022-2024.</li> <li>Feasibility study for A325 Wrecclesham Bypass ('Project 4').</li> <li>Subject to the findings of the feasibility study, further work to develop options and business case.</li> <li>Initial assessment of the viability of a new Western Bypass. Further technical assessments would depend on conclusions from initial viability assessment.</li> <li>Study to examine feasibility of a local access from Castle Hill to Upper Hart Car Park. To be assessed as part of integrated town centre strategy.</li> <li>Localised traffic management measures.</li> <li>Re-design of junctions.</li> </ul>	<ul> <li>Construction of local junction improvements.</li> <li>Construction of improvements in A31 corridor programme (assumption that works start late 2025, completion end 2027).</li> <li>Subject to a case being made, and funding and powers being secured, construction of A325 Wrecclesham Bypass (Project 4) (assumed early 2029).</li> <li>If appropriate, potential construction of a local access from Castle Hill to Upper Hart Car Park, to complement strategy for town centre.</li> </ul>	<ul> <li>Complete works on A325 Wrecclesham Bypass (Project 4) (assumed late 2030).</li> <li>Potential longer-term pipeline for new transport links, including Western Bypass (assumed after 2030).</li> </ul>

# **Emerging strategy and next steps**

### Realising the benefits

Following the publication of the Draft OIP in February, the OIP team has undertaken further work to assess the potential impacts and benefits of the OIP.

Chapter 3 discussed the current and future transport challenges facing the town, which are primarily due to the high levels of car dependency for many journeys. The OIP sets out a coordinated strategy for helping to reduce car dependency, support the uptake of alternative modes of travel, and improve the operation of the road network.

Appendix 1 shows the 'logic maps' that have guided the development of the strategy and these form the basis for articulating the benefits of the programme. These identify common themes that must be addressed to support the four outcome objectives of the programme. These include:

 Reducing the need to travel or making shorter journeys - the recent pandemic has demonstrated the high potential for more people in the area to work from home more often, which will also support the local economy. This will require high-quality internet connectivity to maximise productivity of homeworking. In addition, local work hubs should be considered, to enable people to meet and collaborate, facilitating creativity and innovation: Farnham town centre would be an ideal location.

- Delivering a shift to walking, cycling, and travel by bus for local journeys - the numbers of people currently cycling and travelling by bus are small, so there would need to be large increases to have discernible impacts on traffic. This will, in turn, require major improvements to the quality of the walking and cycling environment and local bus services. Local mobility hubs - including bike hire, e-scooters, and high-quality bus facilities - could support the further acceleration of sustainable travel alternatives. Locations should be identified in the town centre, North Farnham, and South Farnham (to be addressed within the area studies).
- More effective management of travel demand including car parking policies to encourage people to consider walking and cycling for shorter journeys to the town centre, and a coordinated regional approach to managing travel demand across the wider South East, including options such as Road User Charging.
- A comprehensive freight strategy this requires action to reduce the numbers of lorries entering the town, through freight consolidation, shifting to fully electric vans for local deliveries and e-cargo bikes in the town centre. There is also a need for coordinated national and regional action to enable a shift to hydrogen or battery electric lorries for longerdistance movements. The switch to zero emissions vehicles (lorries, vans, and cars) will also help tackle the air pollution problems in the town.

- A rapid shift to zero emissions cars Waverley is ahead of the national average in terms of the proportion of the total vehicle fleet, but there is no room for complacency. Multi-faceted action will be needed to give residents and businesses the confidence to shift to zero emissions vehicles, including adequate provision of public charge points. Failure to meet demand could constrain the switch that will be urgently needed to rapidly decarbonise car travel. One option to accelerate uptake would be the widespread roll-out of car clubs, where people can easily access low emissions vehicles. These could also be co-located with local mobility hubs across the town.
- **Efficient management of the road network** recognising that most journeys will continue to be made on the road network, ensuring that roads are well maintained, safe, and meet the needs of all users. This will mean reducing traffic capacity in several places to create better conditions for walking and cycling. In other parts of the town (notably the A31 corridor) this could require enhanced capacity to improve network performance, and a bypass at Wrecclesham could play a key role in reducing traffic in the village.

The most urgent challenge is in reducing carbon emissions from the transport network. The Surrey Climate Change Strategy sets firm targets for reductions in transport emissions, which will require rapid action to reduce the need to travel, a shift to walking, cycling, and buses, and accelerating the uptake of zero emission vehicles. These actions will support the delivery of all four of the OIP outcome objectives.

### Reducing the need to travel

Waverley experienced a large increase in homeworking during the pandemic. The table below shows the scale of the change during 2020.

+27.5%
+13.7%

Source: Homeworking in the UK, broken down by unitary and local authority districts, 2020 - Office for National Statistics (ons.gov.uk)

This shows that a large proportion of the labour force in Waverley are working in jobs where homeworking is a feasible option. There is considerable uncertainty about how working patterns could evolve after the pandemic, but it is likely that many people will move to 'hybrid' working models, with a combination of home- and office-based working.

If this is the case, it would be reasonable to assume that 50% of the shift experienced during 2020 could be maintained over the longer-term. It is estimated that this could mean a reduction of around 12% in trips to work, with a similar potential scale of reduction in business trips.

It will be more difficult to reduce the need to travel for other types of journey: children and young people will need to travel to schools and colleges, people will want to meet friends, and shopping and leisure activities will be critical to the future vitality of the town centre. Commuting is estimated to account for 25% of traffic in Farnham, and this is estimated to translate into around 2% reduction in carbon emissions.

### **Delivering modal shift**

There are already relatively high levels of walking in many parts of Farnham, but cycling is significantly below the national average. This is caused in part by the steep hills to the north and south, but heavy traffic, narrow streets, lack of segregated facilities and perceived dangers are a major barrier to cycling. Narrow and/or non-existent footpaths in certain locations can also pose barriers to travelling on foot.

The OIP has used the Propensity for Cycling Tool (Propensity to Cycle Tool - Surrey (pct.bike)) to estimate the potential changes in demand with the introduction of new infrastructure. Two scenarios have been considered. The first applies the 'Go Dutch' scenario to movements served by improved infrastructure. It is estimated that this could result in a 150% increase in cycling in Farnham, of which 60% would be attracted from cars. These trips are relatively short (typically 1-5km), so it is estimated that this would enable a 0.7% reduction of carbon emissions in the town.

A second scenario would assume application of the 'e-bikes' scenario to travel in the town, in which there would be large-scale improvements to cycling infrastructure and widespread take-up of e-bikes to meet dayto-day travel needs. If this were applied at scale, with a comprehensive programme of measures to support cycling, this could have the potential to transform the attractiveness of cycling. It is estimated that, under the right conditions, there could be a ten-fold increase in cycling, with a potential reduction of up around 5% in carbon emissions. However, this is a highly ambitious assumption and will be highly challenging to achieve in practice.

Demand for bus travel has reduced significantly during the pandemic, and it is recognised that it will be challenging to return to the levels of prepandemic demand. The OIP has set an ambitious target for a 20% increase in passenger demand above the pre-pandemic baseline, which will require new and improved services and better infrastructure to attract new users. Research has shown that 25% of new bus users tend to be attracted from cars (most new demand is more frequent users, or a shift from walking and cycling). The bus market is relatively small, so it is estimated that this could enable an overall 0.3% reduction in carbon emissions in the town.

### Better managing traffic demand

The OIP emphasises the importance of effective car parking policies to encourage people to consider their travel choices and to consider walking, cycling or use the bus for shorter trips. The OIP has assumed an overall 20% increase in the costs of parking, focused on longer-stay trips, whilst maintaining the attractiveness of the town centre for shopping trips. It is estimated that this could influence up to 20% of trips across the town and, overall, this is estimated to enable around 0.6% reduction in traffic and carbon emissions. Traffic reductions would be concentrated across the town centre, which would also help to mitigate the effects of traffic in the town centre.

The OIP also proposes measures to reduce the demand for vans and lorries, through freight consolidation facilities. It is estimated that this could support a 10% reduction in van traffic, and 5% reduction in lorry traffic in the town (lorries would still be using busy routes including the A31 corridor). Overall, this is estimated to translate into around 2.5% reduction in carbon emissions (2% from vans, 0.5% from HGVs). The reductions in van traffic would be beneficial in improving conditions for residential communities across the town. Reduced volumes of lorries would be beneficial for traffic conditions and quality of place in the town centre.

### Accelerating the shift to zero carbon vehicles

The planned ban on the sale of petrol and diesel cars in 2030 will play an important role in enabling the decarbonisation of the transport system. As discussed above, this will require multi-faceted action to ensure that residents and businesses of the town are ready for this change. However, further action is required to accelerate change in the vehicle fleet

One option is a network of car clubs across the town, which would enable people to live without their own vehicle, and to instead rent vehicles to meet their travel needs when they arise. This would help people to make more informed travel choices and to use zero emissions vehicles when they choose to use a car.

Research indicates that users of these clubs tend to travel 25% less by car, and each one car tends to be shared by 10 people. The provision of 30 cars in Farnham could therefore be accessed by up to 300 people: at this scale, the reduction carbon emissions would be less than 0.5%. Increasing the scale of the scheme would deliver a larger reduction in emissions.

### Efficient management of the road network

The OIP proposes a transformational programme to improve the performance of the road network in Farnham. This includes reconfiguration of the road network in the town centre, major improvements to the A31 corridor and a bypass at Wrecclesham. This programme will be informed by traffic modelling, which will provide detailed insights on changes in traffic flows, speeds, and queues.

The town centre strategy is proposed to include a range of measures that will alter traffic routings, including potentially converting Union Road and South Street to two-way operation and narrowing to one lane on Downing Street and the eastern section of The Borough. These measures are expected to reduce the amount of circulating traffic but will need to be carefully planned to avoid increasing congestion at town centre junctions.

The A31 Farnham corridor strategy will be designed to reduce congestion at the Coxbridge, Hickley's Corner, and Shepherd and Flock junctions. It will also rationalise movements between the A31 and South Farnham. reducing queueing traffic at the level crossing. The Wrecclesham Bypass will also help reduce congestion in South Farnham. Increased road capacity in the target areas of intervention will be used to enable reallocation of roadspace in other parts of the town, and measures should be taken to minimise the risk of induced traffic demand.

It is considered that changes to the road network are likely to have a relatively modest impact on carbon emissions. It has been assumed that the measures would help to significantly improve traffic conditions on the 10% most congested links in the town. On this basis, it is estimated that there could be a reduction of almost 1% in carbon emissions. However, there could be a more significant impact on local air pollutants, particularly in the Air Quality Management Area in the town centre, although this is subject to extra traffic not being generated in the area.

# **Emerging strategy and next steps**

### **Overall scale of impact**

The individual components can then be brought together to provide an assessment of the overall potential scale of impact of the OIP programme. The table below summarises the initial assessment of impacts on travel demand and potential scale of impact on carbon emissions. The second part of the table then provides a (qualitative) assessment of the potential scales of impact on the four outcome objectives. This uses the following convention:

- +++ large beneficial.
- ++ moderate beneficial.
- minor beneficial.
- 0 Neutral (or no discernible impact).

	Overall impacts			ts	<b>5</b>	
Component of OIP programme	Impact on travel demand (Compared with pre-pandemic demand)	Impact on carbon emissions (percentage reductions)	Reduce carbon emissions	Well-connected communities	Support economic vitality	Improve quality of place
Reducing the need to travel	-12% commuting -3% all trips	Moderate beneficial (~2%)	++	++	++	++
Delivering modal shift	150% increase in cycling 20% increase in bus travel	Minor beneficial (~1%)	+	++	++	++
Better managing traffic - cars	Parking charges increase by 20% for 20% of trips in the town	Minor beneficial (<1%)	+	0	0	+

# **Emerging strategy and next steps**

			Overall impacts			
Component of OIP programme	Impact on travel demand (Compared with pre-pandemic demand)	Impact on carbon emissions (percentage reductions)	Reduce carbon emissions	Well-connected communities	Support economic vitality	Improve quality of place
Better managing traffic - vans and lorries	10% reduction in vans 5% reduction in lorries	Moderate beneficial (~2%)	++	+	+	++
Accelerating the shift to zero carbon cars	300 people using car club vehicles, travelling 25% less with 25% more efficient vehicles	Minor beneficial (<0.5%)	+	+	0	0
Efficient management of the road network	Improvement in speeds on the 10% most congested links	Minor beneficial (~1%)	+	+	++	++
Overall assessment		Moderate beneficial ~7% total reduction	++	++	++	++

Overall, it is considered that the OIP programme would have a moderate beneficial impact on all four outcome objectives. It is estimated that, overall, the programme could support a reduction of around 7% in carbon emissions. This compares to a required reduction of around 25% in the late 2020s. This is clearly not sufficient in its own right: more ambitious action will be needed to reduce the need to travel, further accelerate mode shift, manage demand, and accelerate the move to zero emissions vehicles. This will need to be led at the Surrey and regional level and should include consideration of measures such as Road User Charging.

# **Emerging strategy and next steps**

### **Next Steps**

This document is the next step in a process that began with the publication of the Farnham Vision Statement, and which has continued through the Local Liaison Fora with residents over the last few months. This final version of the document has taken account of more detailed technical work during 2021 to assess potential components of the programme. This has also drawn on the consultation feedback from the Farnham community on the draft document published in February 2021. Your feedback has been vital in helping to shape this document.

This is an important milestone in creating a blueprint for Farnham that can command the support of residents, businesses, and other local stakeholders. But this is only a further step in the journey: significant further work is now needed to plan and design the different components of the programme. Options that are selected to be progressed will be subject to more detailed assessments, to meet legal requirements and best practice in the development of transport projects. This will include Environmental Impact Assessment (EIA), Equality Impact Assessment (EqIA), Ecological Impact Assessment (EcIA) and Flood Impact Assessment.

In addition, options will be developed in accordance with Inclusive Design Standards and best practice. This includes ensuring safe use of the environment by all users, including those defined as having protected characteristics under the Equality Act. These include age, disability, gender reassignment, marriage and civil partnership, pregnancy and maternity, race, religion or belief, sex, and sexual orientation.

Options will also be actively considered to maximise the environmental benefits of the programme, by promoting biodiversity net gain, together with maximising opportunities for greening and urban tree-planting.

In parallel with the development of scheme packages, business cases will be produced with a view to exploring options for securing capital funding either from central government or alternative routes for scheme funding.

A position paper on funding is currently being produced. This will consider potential sources of funding for new investment (capital programmes) and ongoing operations and maintenance (revenue funding). This will be issued separately to the OIP report.

Early action is required to meet Surrey's place, transport, infrastructure, and decarbonisation objectives, and for Farnham to deliver its part in the UK's overarching legal obligations – to become a Net Zero carbon nation by 2050.

This is reflected in the structure, approach, and content of the OIP. A programme has been developed to allow early action to be taken to address the most critical challenges, with a longer-term pipeline to address the challenges that will come with more people living and working in the area.

Early action will be imperative to meet our local, regional, and national targets and to enable Farnham to thrive in the future.

The OIP is not, however, solely focused on meeting national objectives and targets or resolving existing issues. It is a framework to identify, select, test, design, fund and deliver the preferred interventions to shape the place and character of the town. It will help to deliver a Farnham where people want to live, do business, visit, and enjoy spending time.

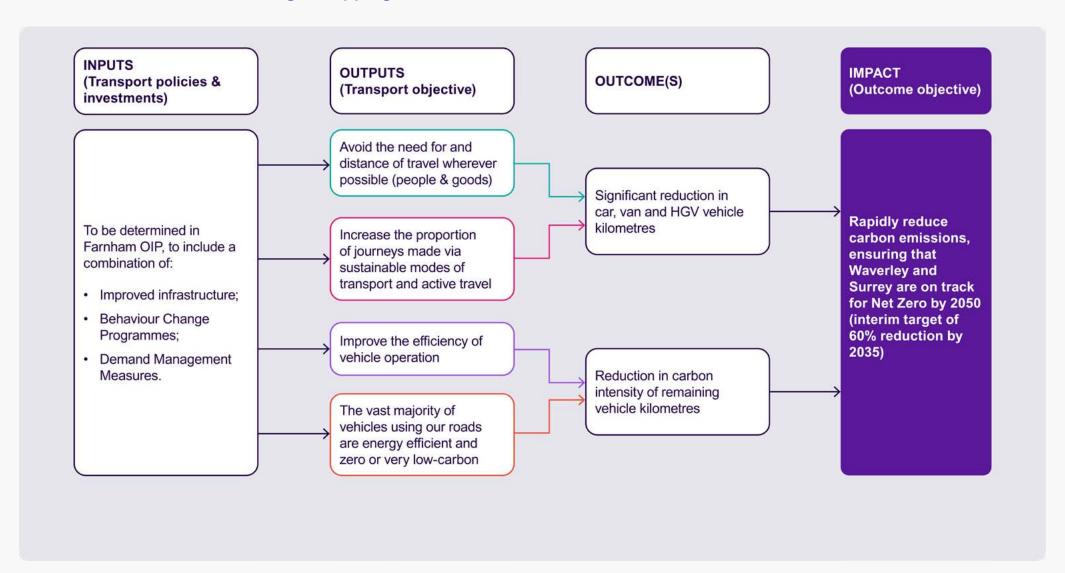
The OIP is intended to help shape the direction for Farnham's transition to a better, healthier, more resilient, and environmentally friendly place - one that is best positioned to thrive in the future.

**APPENDIX 1** 

# Logic maps

# Logic maps

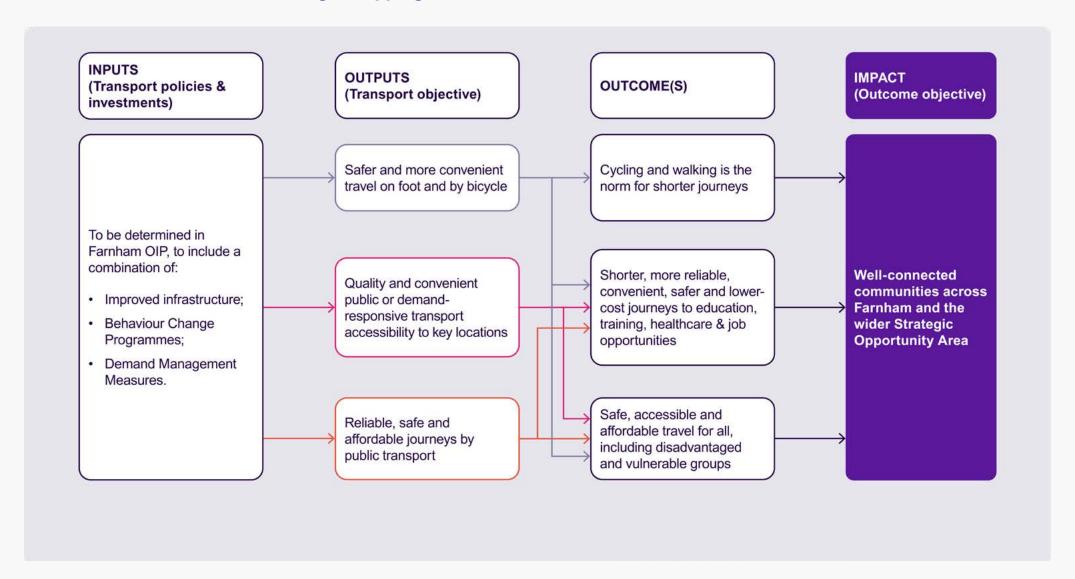
### Reduce carbon emissions: Logic mapping



### **APPENDIX 1**

# Logic maps

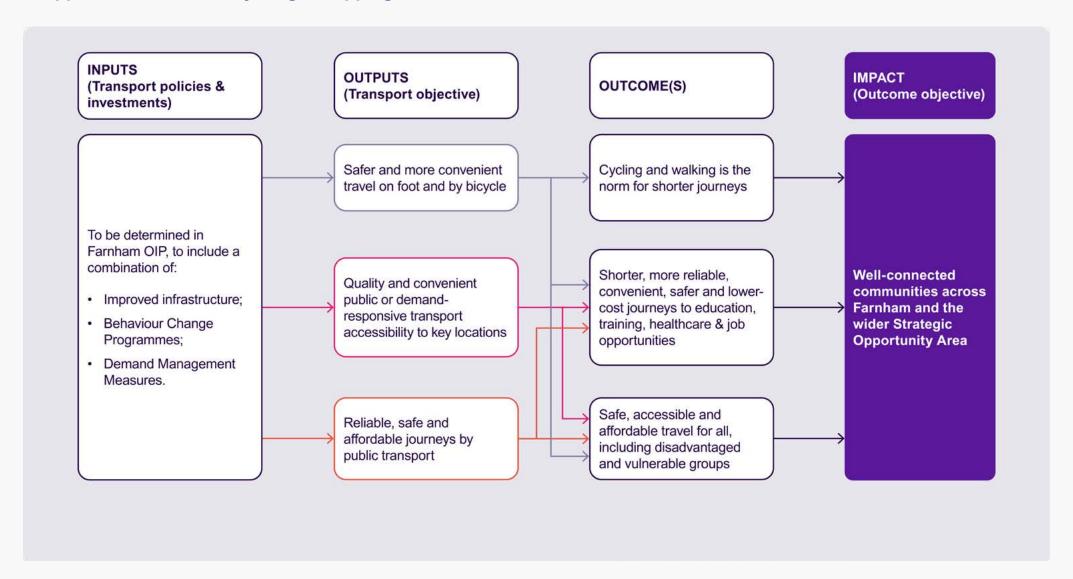
### Well-connected communities: Logic mapping



### **APPENDIX 1**

# Logic maps

### Support economic vitality: Logic mapping



# Logic maps

### Improve quality of place: Logic mapping

