

Appendix 2

Local Transport Plan Evidence Base Report

Version: 6

Cheshire East LTP

13 January 2025

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1. Introduction

1.1 Introduction

In 2019, Cheshire East Council (CEC) adopted a Local Transport Plan (LTP) for the period of 2019-2024. The strategy considers all forms of transport over the plan period, providing a framework for how transport will support wider policies to improve the economy, protect the environment and make attractive places to live, work and play. The LTP therefore outlines the role transport will play in supporting the long-term goals of the council.

To support the LTP, CEC developed Local Transport Development Plans (LTDPs) that set out a range of potential scheme options that could be delivered to improve the transport network to support towns and surrounding areas. The plans identify how a coordinated and integrated transport network can be delivered, covering all forms of transport including walking, cycling, buses, rail, and road traffic.

Given the existing LTP is due to expire at the end of 2024, now is the right time to develop a new LTP, which starts with an evidence base for the borough to ensure issues and opportunities are understood.

1.2 Rationale for producing a new LTP

The Transport Act 2000 introduced a statutory requirement for local transport authorities to produce a LTP every five years and to keep it under review. The Transport Act 2008 updated statutory requirements to give local transport authorities more flexibility about how and when they updated their LTP. Local transport authorities are now free to replace their LTP as they see fit.

The current LTP was prepared pre-Covid and prior to many recent changes in transport policy including, but not limited to: Gear Change (2020), The Transport Decarbonisation Plan (2021), Electric Vehicle Infrastructure Strategy (2022) and Bus Back Better (2021). Numerous non-transport policies have also come forward which impact transport including the Levelling Up White Paper (2022) and Clear Air Strategy (2019) for example. Furthermore, the government announcement to cancel HS2 from Birmingham to Manchester will further impact the borough – particularly Crewe with the potential for alternative schemes to be introduced in lieu of HS2.

CEC is now well placed to undertake a significant update of the LTP so it maintains a document that is robust and relevant to national, regional and local priorities for which this evidence base will underpin.

1.3 Purpose of this document

The purpose of the evidence base is to provide a baseline of the existing situation to inform and support the development of transport policy and the LTP. A data-driven approach will ensure the LTP and supporting documents are based on a robust evidence base to inform local transport needs in the context of recent and emerging changes in Cheshire East. The evidence base will be used to develop the LTP vision and objectives which will form the basis of the future strategy development and investment.

The evidence base draws information from a range of data sources and has been grouped under six key themes:

- Our community – explores the socio-economics, health and digital connectivity profile of Cheshire East;
- Improve transport for all – examines travel trends within the borough and the existing situation regarding the transport network;
- Grow the economy – sets out key details of the economic profile of the borough and how jobs impact travel behaviour and connectivity requirements;

- Reduce environmental impacts – considers the relationship between transport and the environment within Cheshire East; and
- Trends – reviews keys trends and likely transport technology pathways alongside potential implications for the borough.

The evidence base concludes with a section which outlines the main issues and opportunities that the LTP strategy should take into consideration.

1.4 Vision-led approach

A vision-led approach (also known as ‘vision and validate’ or ‘decide and provide’) sets out a clear vision and objectives for transport and then uses this to define the policies and investment required to realise this vision. Developing a place-based and context specific vision will support the development of a high-level strategy and support assessment of scenarios to test future policies.

Figure 1-1 shows the process in which the LTP Vision can inform the high-level strategy and scheme development.

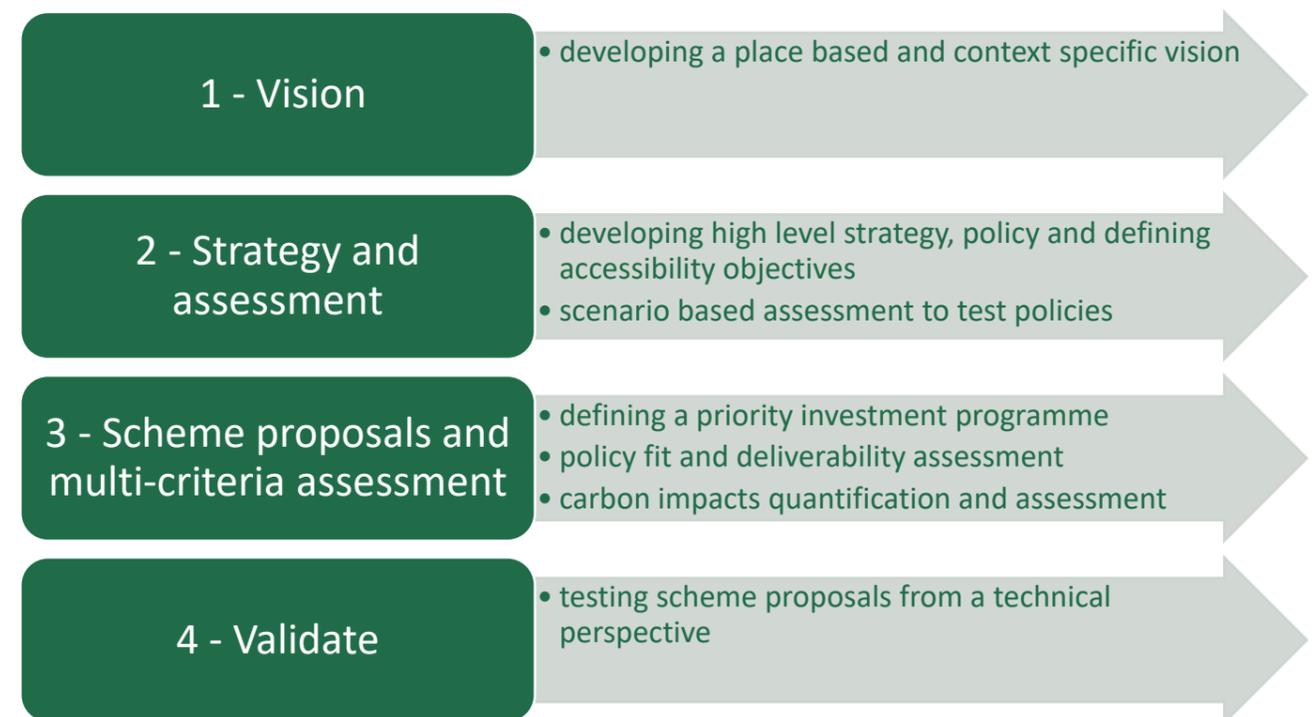


Figure 1-1 Vision-led approach

As set out in Figure 1-1, there are four key steps associated with a vision-led approach. Firstly, the vision created should incorporate a wider vision and identity (i.e., not just transport focussed) that clearly identifies the role of transport in delivering the vision. This should incorporate wider outcomes, targets and SMART objectives. Secondly, the strategy and assessment phase should consider what is needed to best deliver the vision. The scenario-based assessment will assess whether the policy is robust across a range of scenarios to be considered and agreed. A robust policy would perform well under a range of scenarios. Next, scheme proposals are developed, and an assessment is undertaken on these options. For example, considering deliverability, effectiveness and policy fit. Finally, the proposals are tested via modelling or other means to ensure practicality.

An emerging theme in the transport planning industry is Triple Access Planning (TAP) which looks at how future sustainable urban accessibility can be achieved through three factors which combined create a Triple Access System;

- Transport system – physical mobility;
- Land-use system – spatial proximity; and
- Telecommunications system – digital connectivity.

These three elements and their relationship are shown in Figure 1-2¹. This highlights that access is not just about physical transport which has traditionally been the focus, but digital connectivity and land use are important elements to consider too. In the past, whilst land use and digital connectivity have been acknowledged by LTPs, there have been challenges with implementation. Land use planning can be optimised to encourage active travel and public transport use and can heavily influence travel choices made. Digital connectivity has become increasingly important since the pandemic, and technology will continue to develop going forwards. Digital technology can heavily influence how we work and access goods and services, which in turn impacts travel behaviour for example how we shop, work, and access healthcare. Therefore, this evidence base considers the transport evidence base through these three linked accessibility considerations.

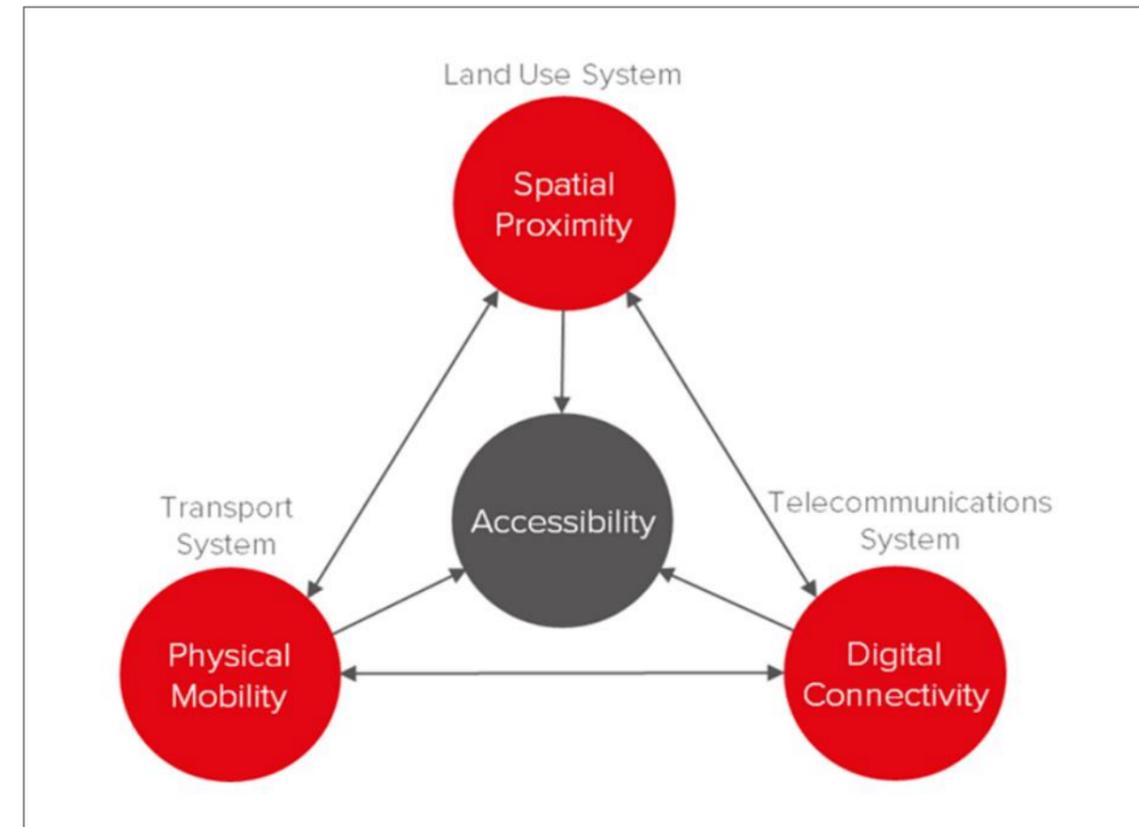


Figure 1-2 The Triple Access System

¹ <https://www.tapforuncertainty.eu/>

2. Policy Review

This policy review has been undertaken to set out the key national, sub-national and local policy which the next LTP for Cheshire East will need to align to. By developing this review, it will ensure the LTP aligns with policy across all scales. The review is set out in Table 2-1 below.

In addition to the review set out in Table 2-1 below, it is important to note the National Planning Policy Framework² (NPPF) which sets out the government's planning policies for England and outlines how these policies should be applied. First published in 2012 and most recently updated in December 2024, the NPPF emphasises achieving sustainable development through a balanced approach to economic, social, and environmental objectives. It provides a framework for local authorities to develop their own plans, ensuring that they align with national priorities while addressing local needs. This framework is particularly relevant to the CEC Local Transport Plan, as it guides the integration of transport infrastructure with broader planning goals, promoting efficient, safe, and sustainable transport solutions.

² National Planning Policy Framework

Table 2-1: Policy Review

Key Themes/ Scale	National	Sub-national / Regional	Local	What does this mean for the LTP?
Health and Wellbeing	<p>The DfT policy document <u>Gear Change (2020)</u> states physical inactivity costs the NHS up to £1bn per annum, with further indirect costs calculated at £8.2bn.</p> <p><u>Uniting the Movement (2021)</u> is Sport England's vision for a country where people live happier, healthier and more fulfilled lives. They believe being active is one of the most effective and sustainable ways to achieve this.</p> <p>The policy paper <u>Get Active: a strategy for the future of sport and physical activity (2023)</u> states the government's intention to help build a healthier nation by tackling high levels of inactivity, and by making sure that the sport and physical activity sector thrives for future generations. This strategy sets out how the government will work with the sector to achieve these aims by ensuring that everyone has the opportunity to be active.</p>	<p>The <u>TfN Decarbonisation Strategy (2021)</u> states a shift away from private vehicle use and any uptake in active travel is likely to lead to health and wellbeing benefits.</p>	<p>The <u>Cheshire East Corporate Plan 2021-2025 (2021)</u> prioritises reducing health inequalities across the borough.</p> <p>The <u>Joint Local Health and Wellbeing Strategy for the population of Cheshire East (2023)</u> sets out a vision with a local focus on prevention and early intervention, health improvement, and creating healthy environments that support and enable good physical and mental health and wellbeing and contribute to keeping people independent and at home for as long as possible.</p> <p>The key findings from the <u>Cheshire East Tartan Rug (2023)</u> show that for many residents across Cheshire East health and wellbeing is similar to or better than the England average, other local authorities across Cheshire and Merseyside, and geographically neighbouring local authorities. However, low levels of physical activity across the board in the UK is an issue for health. Some stark health inequalities remain across Cheshire East with some wards in Crewe and Macclesfield experiencing significantly worse health and wellbeing compared to the England average and other areas of Cheshire East.</p> <p>Within the <u>Cheshire East Sustainable Modes of Travel to School Strategy (2018)</u> targets have been set to increase the number of schools participating in promotional campaigns. If the targets set are achieved, then there should be increased health and wellbeing due to the increase in active travel as a mode for travelling to school.</p> <p>The <u>Cheshire East Rights of Way Improvement Plan 2011-2026 (2011)</u> sets out the aims to create and enhance routes for active travel use which will promote healthy activity.</p>	<p>There is a clear link between health outcomes and being active. This LTP will need to encourage active travel (walk, wheel, cycle) over the next LTP period, as well as help to reduce the health disparities spatially across CEC. Uptake of active travel can contribute to improved health and wellbeing across the borough and reduce health deprivation. This, alongside addressing air quality will also have health benefits as a result of cleaner air.</p>
Accessibility	<p>One of the <u>Future of Mobility (2019)</u> principles states that the benefits of mobility innovation must be available to all parts of the UK and all segments of society.</p> <p>The <u>Equality Act (2010)</u> includes legislation to ensure access for disabled persons. For example, this includes making it possible to get on to and</p>	<p>The <u>TfN Decarbonisation Strategy (2021)</u> states to achieve significant mode shift, investment will be required in bus, rail and cycling infrastructure to improve journey times and ensure networks are accessible to all. The decarbonisation of transport also provides an important opportunity for reducing transport-related social exclusion (TRSE).</p>	<p>The <u>Cheshire East Corporate Plan 2021-2025 (2021)</u> mentions pockets of deprivation in urban communities and their relation to life chances. The plan aims to help tackle and reduce these pockets of deprivation.</p>	<p>The LTP should strive to provide accessibility for all communities and abilities to encourage modal shift.</p>

Key Themes/ Scale	National	Sub-national / Regional	Local	What does this mean for the LTP?
	off regulated public service vehicles, rail vehicles and taxis in safety and without unreasonable difficulty. Those in wheelchairs should be able to do so while remaining in their wheelchairs.			
Walking, Wheeling, and Cycling	<p><u>Gear Change (2020)</u> states that increasing cycling and walking can help improve air quality, combat climate change, improve health and wellbeing, address inequalities and tackle congestion on roads.</p> <p>One of the <u>Future of Mobility (2019)</u> principles states that walking, cycling and active travel must remain the best options for short urban journeys.</p> <p>The <u>second cycling and walking investment strategy (CWIS2) (2019)</u> reaffirms the government's commitment to making walking, wheeling and cycling the natural choices for shorter journeys or part of a longer journey.</p>	<p>The <u>TfN Strategic Transport Plan (2024)</u> has prioritised understanding how the North's highway network and the space available should be used to encourage active travel.</p> <p>The <u>TfN Decarbonisation Strategy (2021)</u> states that local action should be prioritised in implementing policies to enhance dedicated cycle networks, low-traffic neighbourhoods, and activities to promote behaviour change.</p>	<p>The <u>Cheshire East Cycling Strategy (2017)</u> provides a framework to guide future investment in cycling, working collaboratively with partner organisations and local cycling groups.</p> <p><u>Local Cycling and Walking Infrastructure Plans (2021)</u> were adopted for Crewe, Congleton, Macclesfield and Wilmslow. These set out the council's ambitions for a high-quality walking and cycling network within each area.</p> <p>The <u>Cheshire East Rights of Way Improvement Plan 2011-2026 (2011)</u> sets out the aims to create and enhance routes for active travel use which will promote healthy activity.</p>	<p>Over the next LTP period, investment is needed in high quality active travel facilities to encourage modal shift to walk, wheel and cycle. The next LTP should also aim to reduce inequalities associated with access to active travel so that everyone has access to the benefits related to walking, wheeling and cycling.</p>
Public Transport	<p><u>Bus Back Better (2021)</u> states buses need to become more frequent, reliable, easier to understand and use, better co-ordinated and cheaper.</p> <p>One of the <u>Future of Mobility (2019)</u> principles states that mass transit must remain fundamental to an efficient transport system.</p> <p><u>Great British Railways</u> aim to 'make the railway simpler and better for everyone.' GBR believe this aim will be achieved by creating a railway that is:</p> <ul style="list-style-type: none"> • Easier and better to use • Lower cost to taxpayers • Better at supporting local and national ambitions • A simpler sector to work in and do business with 	<p>The <u>TfN Strategic Transport Plan (2024)</u> states that to achieve their vision and strategic ambitions they need to address connectivity challenges that enables a safe, reliable and accessible public transport network, both at pan-regional and local level, which enable access to opportunities for all communities across the North. Regarding rail, the plan also states how 'The North requires a fit-for-purpose rail network with strong North-South and East-West connections. This would act as the backbone of a high-quality, reliable, resilient, and equitable passenger network, capable of supporting the future growth of rail patronage, and with the capacity and capability to adapt to modern freight requirements.'</p> <p>The <u>TfN Decarbonisation Strategy (2021)</u> states less than half of car trips in the North are under 5km. Given the short distance, a notable proportion of these trips could be switched to walking, cycling, e-bikes, or public transport.</p> <p><u>Northern Powerhouse Rail</u> 'is a major strategic rail programme, specifically designed to support the transformation of the North's economy by providing effective and efficient rail connectivity between the North's major economic centres,</p>	<p>The <u>Cheshire East Corporate Plan 2021-2025 (2021)</u> sets out that some transport routes are constrained due to congestion and a limited commercial bus network. One of the priorities of the plan is for a safe transport network, the plan states a measure of success for this is having a number of routes connecting with rail or tram services.</p> <p>The <u>Cheshire East Bus Service Improvement Plan 2024</u> states that since 2010/11 the total number of passenger journeys on local bus services per year has decreased from 5.6 million (2010/11) to 3.8 million in 2019/20, a decrease of 32% in ten years. The BSIP refresh continues to seek to stabilise the bus network with medium and longer-term aspirations to improve Cheshire East's bus offer by initiating plans and policies that will drive quality improvements in the local bus market, develop provisions for network growth and in delivering infrastructure improvements to support bus service delivery.</p>	<p>The LTP should consider supporting a more effective and accessible public transport network to encourage modal shift away from car travel.</p>

Key Themes/ Scale	National	Sub-national / Regional	Local	What does this mean for the LTP?
		offering a faster and more reliable service across the entire region.'		
Electric Vehicles (EVs)	<p><u>Taking charge: the electric vehicle infrastructure strategy (2022)</u> states the rollout of high-powered chargers and seamless integration of charge points needs to be accelerated.</p> <p>One of the <u>Future of Mobility (2019)</u> principles states that mobility innovation must help to reduce congestion through more efficient use of limited road space.</p>	<p><u>TfN Strategic Transport Plan (2024)</u> states how TfN aim to transition rapidly from internal combustion engine vehicles to low and zero emission vehicles. They aim to do this by providing intelligence and supporting collaboration towards the roll-out of electric vehicle charging infrastructure (EVCI).</p>	<p>The Cheshire East Council <u>EV Charging Infrastructure Strategy (2023)</u> sets out objectives to support EV uptake in Cheshire East, these are:</p> <ul style="list-style-type: none"> • To support the uptake of electric vehicles by individuals, businesses, and organisations within Cheshire East • To contribute towards improved air quality and reduced carbon emissions from transport • To guide the provision of infrastructure that is safe, easy to use and represents good value for money both on installation and throughout its life • To help ensure infrastructure makes a positive contribution to the streetscape through sensitive placement and appearance, avoiding any negative impacts on other road users, particularly pedestrians • To seek to overcome inequalities in infrastructure provision, enabling our communities to transition to electric vehicles in a timely way • Supporting electric vehicles in the context of a wider transport system that encourages mileage reduction, active travel and public transport 	<p>The LTP should aim to promote a switch towards Electric Vehicles and alternative modes of travel to the car.</p>
Highways	<p><u>The Plan for Drivers (2023)</u> details the plan to create smoother journeys for drivers through measures such as fixing roads faster and harnessing the latest road technology, as well as easier parking through measures such as challenging unfair parking rules and better parking technology.</p> <p>The <u>Highways Act 1980</u> places a duty on the Local Highway Authority to maintain the public highway in a condition that is safe for users, this includes all adopted roads, footpaths and verges.</p> <p>The code of practice '<u>Well Managed Highway Infrastructure</u>' (2016) provides guidance to councils regarding the management and maintenance of local roads. Cheshire East Council</p>	<p><u>TfN Strategic Transport Plan (2024)</u> states how TfN work collaboratively with National Highways to inform and influence the Road Investment Strategy. The strategy highlights how TfN will invest in the road network and states how highways should be reliable, resilient, safe and conducive to movement by all travel modes. Improvements to facilities for pedestrians, cyclists, and public transport should be equally important as for the movement of cars, vans and lorries.</p>	<p>The Cheshire East Council <u>Highway Asset Management Policy (2023)</u> sits below the LTP and Corporate Plan and states that local highway network and its management to asset management principles supports the authority's vision and its strategic priorities. The document outlines specific objectives and priorities that will be followed to achieve the vision for the borough.</p> <p>The Cheshire East Council <u>Highway Infrastructure Asset Management Plan (2022)</u> links directly to the Highway Infrastructure Asset Management Guidance Documents 14 recommendations and provides the basis for the Council to adopt a risk-based approach founded on sound asset management principles which guides the</p>	<p>The LTP should aim to maintain the highways assets to provide a safe, high quality and available asset for the residents and visitors of Cheshire East. It is important that the LTP ensures the delivery of financially sustainable highway infrastructure. This involves supporting the growth and development of the highway asset through effective financial planning and provision to ensure that it can continue to be maintained.</p>

Key Themes/ Scale	National	Sub-national / Regional	Local	What does this mean for the LTP?
	<p>follow this guidance as best practice to deliver an efficient and effective service that is safe in all conditions, including winter.</p> <p>The National Highways Route Strategies Initial Overview Reports (2023) are one of the key steps of initial research in the development of the Road Investment Strategy. They set out the mid to long term strategies and needs for the network. In regard to Cheshire East, the 'London to Scotland West (North)' route along the M6 starts at the south of Crewe and connects Scotland, North West England and the West Midlands.</p> <p>The 'South Pennines (West)' route connects into Cheshire East via the M56 and provides access to the city regions of Liverpool and Greater Manchester, and other cities and towns in Lancashire and Cheshire. It also provides trans-Pennine connectivity to West Yorkshire, serving Huddersfield, Bradford, and Leeds.</p>		<p>maintenance and management of the highway asset. The HIAMP forms part of a suite of documents which define Cheshire East's Asset Management approach.</p> <p>The Cheshire East Council Highway Asset Management Strategy (HAMS) sets out how the council will best manage the Highway Network taking into consideration customer needs, local priorities, asset condition and the best use of available resources through invest to save initiatives to realise the benefits of early intervention.</p> <p>The Cheshire East Council Code of Practice for Highway Safety (2021) has been developed following the recommendations of the WMHI. This document forms part of the Council's wider Asset Management Strategy and helps to deliver an asset management led approach. Condition data from Highway Safety Inspections helps to inform future maintenance programmes, supporting the overall objectives of the Council's Asset Management Strategy.</p>	
Grow the Economy	<p>The National Infrastructure Strategy (2020) sets out how the government will boost growth and productivity across the whole of the UK.</p> <p>The Future of Freight (2022) has a vision for freight to be valued by society in a way that reflects its critical importance to the wider economy. The vision will deliver a strong, efficient and green freight sector that will power UK economic wellbeing and global influence.</p> <p>The Levelling Up (2022) White Paper sets out how 'levelling up' will require the country to boost productivity, pay, jobs and living standards by growing the private sector, especially in those places where they are lagging and spread opportunities and improve public services, especially in those places where they are weakest.</p>	<p>The TfN Strategic Transport Plan (2024) sets out a vision for transforming economic performance in the north and the role that transport can play in supporting this growth.</p> <p>The Cheshire and Warrington Local Enterprise Partnership Strategic Economic Plan (2017) details ambitions to see the economy grow to at least £50 billion per annum of Gross Value Added and be 20% more productive per resident than the UK average. It also aims to create 120,000 jobs and build up to 127,000 new homes.</p>	<p>Cheshire East Corporate Plan 2021-2025 (2021) states Cheshire East has thriving and successful sectors - life sciences, advanced manufacturing, digital and carbon zero industry. The plan sets out aims to reduce inequalities, promote fairness and opportunity for all and support the most vulnerable residents.</p> <p>The Local Plan Strategy 2010-2030 (2010) details how economic prosperity is fundamental to a healthy and sustainable borough.</p> <p>The Cheshire East Economic Strategy 2019 to 2024 Draft (2019) sets the ambitions to grow the Cheshire East Economy to at least £15 billion, create an additional 7,240 jobs, build up to 11,065 new homes and be 4% more productive than the UK average.</p> <p>The Cheshire East Visitor Economy Strategy 2023 – 2028 (2023) details its ambition to see the value of the Cheshire East Visitor Economy grow to being worth over £1 billion.</p>	Transport should help link people with employment opportunities and support the economy.
Reduce Environmental Impacts	Gear Change (2020) states that meeting the targets to double cycling and increase walking	The TfN Decarbonisation Strategy (2021) highlights the need to ensure that climate change	Cheshire East Corporate Plan 2021-2025 (2021) states urgent action is needed to avoid	Decarbonisation is an important topic, therefore the LTP should consider the importance of

Key Themes/ Scale	National	Sub-national / Regional	Local	What does this mean for the LTP?
	<p>would lead to savings of £567 million annually from air quality alone and improve green spaces and biodiversity.</p> <p>The Future of Freight (2022) sets out a vision for supporting broader environmental objectives for air quality and noise reduction. It also sets out a vision for a net zero freight and logistics sector by 2050.</p> <p>The Clean Air Strategy (2019) shows how the government will tackle all sources of air pollution, making our air healthier to breathe, protecting nature and boosting the economy.</p> <p>The Decarbonising Transport (2021) document states that the government will invest £2 billion over five years to deliver a bold future for cycling and walking to make it the natural first choice for many journeys. The aim is that by 2030 half of journeys in towns and cities will be cycled or walked. It also states a fleet of fully zero emission road vehicles will remove the source of 91% of today's domestic transport greenhouse gas emissions.</p> <p>One of the Future of Mobility (2019) principles states that new mobility services must lead the transition to zero emissions.</p> <p>The National Infrastructure Strategy (2020) sets out how the government will Put the UK on the path to meeting its net zero emissions target by 2050.</p> <p>The Net Zero Strategy: Build Back Greener (2021) policy document sets out a vision for a decarbonised economy by 2050. The document states this will be done by following the four principles:</p> <ul style="list-style-type: none"> • we will work with the grain of consumer choice; • we will ensure the biggest polluters pay the most for the transition; • we will ensure that the most vulnerable are protected through Government support; and • we will work with businesses to continue delivering deep cost reductions in low carbon tech. 	<p>adaptation and resilience is a key consideration in policy and project development. It also highlights the importance of considering the localised impacts of decarbonisation policies and measures. The strategy builds upon their Strategic Transport Plan by being able to understand the full range of clean growth opportunities within the North because of transport decarbonisation. They also want to integrate decarbonisation measures into existing and future programmes and projects.</p> <p>The TfN Strategic Transport Plan (2024) sets out a vision for the rapid decarbonisation of our transport system.</p>	<p>temperatures increasing to dangerous levels leading to extreme weather events.</p> <p>The Local Plan Strategy 2010-2030 (2010) sets out how a stronger economy and sufficient housing of the right type to meet our future needs will be delivered in a way that is appropriate environmentally and socially.</p> <p>The Cheshire East Council Environment Strategy 2020-2024 (2018) sets out the council's strategic goals and summarises the key strategies and action plans to ensure these goals are delivered. It also provides a policy framework for the council to evaluate all emerging strategies, policies, action plans, and projects to consider the environmental and climate change impact and how they can contribute positively to the goals of this strategy. The goals set out are:</p> <ul style="list-style-type: none"> • Cheshire East Council will be carbon neutral by 2025 (since updated to 2027) • Reduce waste • Improve air quality • Ensure new development is sustainable • Increase sustainable transport and travel • Protect and enhance our natural environment <p>The Carbon Neutrality Action Plan states that in May 2019 the council declared an environment and climate emergency, and committed to becoming a carbon neutral council by 2025. This target has since been pushed back to 2027.</p> <p>The Cheshire East Carbon Neutrality Action Plan 2020-2025 (2020) is focused on actions that CEC should consider deploying directly in support of the carbon neutral target.</p> <p>Cheshire East are aiming to become a carbon neutral borough by 2045 the council are now in the process of setting up an action plan for the first five years.</p> <p>The aim of the Cheshire East Air Quality Strategy (2024) is to provide a strategic framework to deliver local air quality improvements within Cheshire East. This will be done by engaging in all practicable opportunities to improve air quality through the transport and spatial planning</p>	<p>decarbonisation and reducing emissions. This could consider encouraging the uptake in electric vehicles and supporting behavioural change away from car travel to other more sustainable forms of transport. More broadly, the LTP should aim to reduce environmental impacts.</p>

Key Themes/ Scale	National	Sub-national / Regional	Local	What does this mean for the LTP?
	<p><u>Climate Change Act (2008)</u> is a UK legislation that sets a legal framework for reducing greenhouse gas emissions to 80% below 1990 levels by 2050.</p> <p>The <u>Plan for Drivers (2023)</u> details the government's plan to help transition to zero emission driving through measures such as easier on-street and ChargePoint charging and installation.</p>		<p>processes and through wider policy initiatives, such as climate change and health improvement programmes. It also states there are a number of AQMAs across the borough, with high levels of nitrogen dioxide, relating to traffic levels and congestion.</p> <p>Within the <u>Cheshire East Sustainable Modes of Travel to School Strategy (2018)</u> if the targets they have set are achieved then there should be a reduction in vehicle emissions and an overall improvement in air quality.</p>	

3. Our Community

Cheshire East is a unitary authority area based in North West England, bordering with other areas including Cheshire West and Chester, Greater Manchester, the Potteries, Shropshire and Derbyshire, as shown in in Figure 3-1³.

Cheshire East is home to approximately 412,500 residents and more than 175,000 households. It contains the major towns of Crewe, Macclesfield, Congleton and Wilmslow with populations above 20,000. There are also a number of other significant centres of populations over 10,000 in Sandbach, Poynton, Nantwich, Middlewich, Knutsford and Alsager. However, Cheshire East in terms of its geography is predominately rural and semi-rural, and these areas have their own distinct characteristics and needs.

Whilst the population is predominantly white British, Cheshire East is becoming an increasingly diverse borough due to its proximity and transport links to Manchester, Birmingham and London. There are also numerous migrant communities within the borough.

Whilst most residents enjoy a good standard of living, there are pockets of deprivation, which impact on the quality of life and opportunities for some people. Average life expectancy varies from 74 years in the most deprived areas to 83.3 years in the more affluent areas⁴. Cheshire East has an ageing population which brings particular challenges for the way the council provides services, however following national trends and considering impacts from the pandemic, there are increasingly complex needs across all age ranges.

Table 3-1 Principal Towns, Key Service Centres and Local Service Centres in Cheshire East as identified in the Local Plan Strategy

Settlement	Town
Principal Town	Macclesfield
	Crewe
Key Service Centre	Alsager
	Congleton
	Knutsford
	Middlewich
	Nantwich
	Poynton
	Sandbach
	Wilmslow
Local Service Centres	Handforth
	Alderley Edge, Audlem, Bollington, Bunbury, Chelford, Disley, Goostrey, Haslington, Holmes Chapel, Mobberley, Prestbury, Shavington and Wrenbury

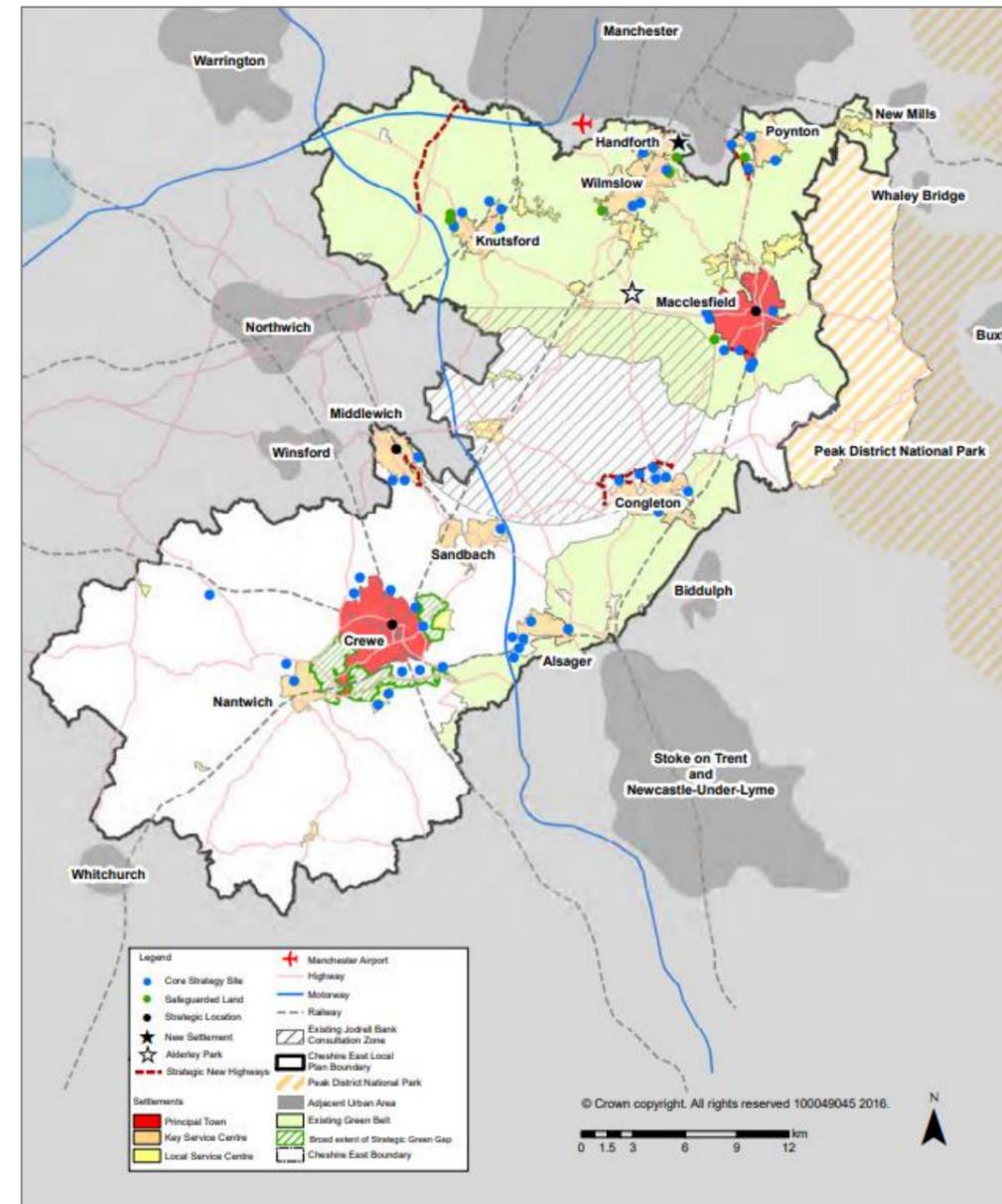


Figure 3-1 Cheshire East Local Plan Strategy (2010 - 2030)

³ Cheshire East Local Plan Strategy (2010 - 2030)

⁴ Cheshire East Corporate Plan

3.1 Demographics

3.1.1 Population estimates

The population of Cheshire East has increased by 7.7% to 398,772 between the 2011 and 2021 Census. The 2023 mid-year population shows a further increase to 412,500⁵. Table 3-2 illustrates town and village populations in Cheshire East by settlement. Population growth for Cheshire East was higher than the North West (up 5.2% since the 2011 Census), and England (up 6.6% since the 2011 Census).

Table 3-2 Population of Cheshire East 2011 - 2021⁶

Settlement Name	Total population 2021 Census (usual residents)	Total population 2011 Census (usual residents)	Population Percentage Change 2011-2021
Alderley Edge	5,267	5,276	-0.2%
Alsager	13,386	11,775	13.7%
Audlem	4,414	3,946	11.9%
Bollington	7,943	7,593	4.6%
Bunbury	2,287	2,136	7.1%
Chelford	1,528	1,219	25.3%
Congleton	28,482	26,482	7.6%
Crewe	75,720	72,717	4.1%
Disley	4,945	4,444	11.3%
Goostrey	3,994	3,846	3.8%
Handforth	7,031	6,570	7.0%
Haslington	4,637	4,737	-2.1%
Holmes Chapel	6,669	5,605	19.0%
Knutsford	13,256	13,191	0.5%
Macclesfield	53,164	52,186	1.9%
Middlewich	14,426	13,595	6.1%
Mobberley	3,119	3,050	2.3%
Nantwich	18,778	17,885	5.0%
Poynton	12,865	13,016	-1.2%
Prestbury	3,431	3,398	1.0%
Sandbach	21,924	17,976	22.0%
Shavington	5,600	3,822	46.5%
Wilmslow	25,355	23,662	7.2%
Wrenbury	2,110	1,976	6.8%

Settlement Name	Total population 2021 Census (usual residents)	Total population 2011 Census (usual residents)	Population Percentage Change 2011-2021
Other Settlements and Rural Areas	58,443	50,024	16.8%
Overall	398,774	370,127	7.7%

The largest settlements in Cheshire East are Crewe (75,720) and Macclesfield (53,164), whilst the smallest settlements are Chelford (1,528) and Wrenbury (2,110). There were eight towns that had an above average population increase for Cheshire East. Most prominent was Shavington, where the population increased by 46.5% - albeit this was from a small base (population increase circa 1.8k). These increases were likely as a result of housing development between 2011 and 2021. There were three towns however that experienced a population decrease, the largest population decrease in Cheshire East was Haslington, where the population decreased by -2.1%.

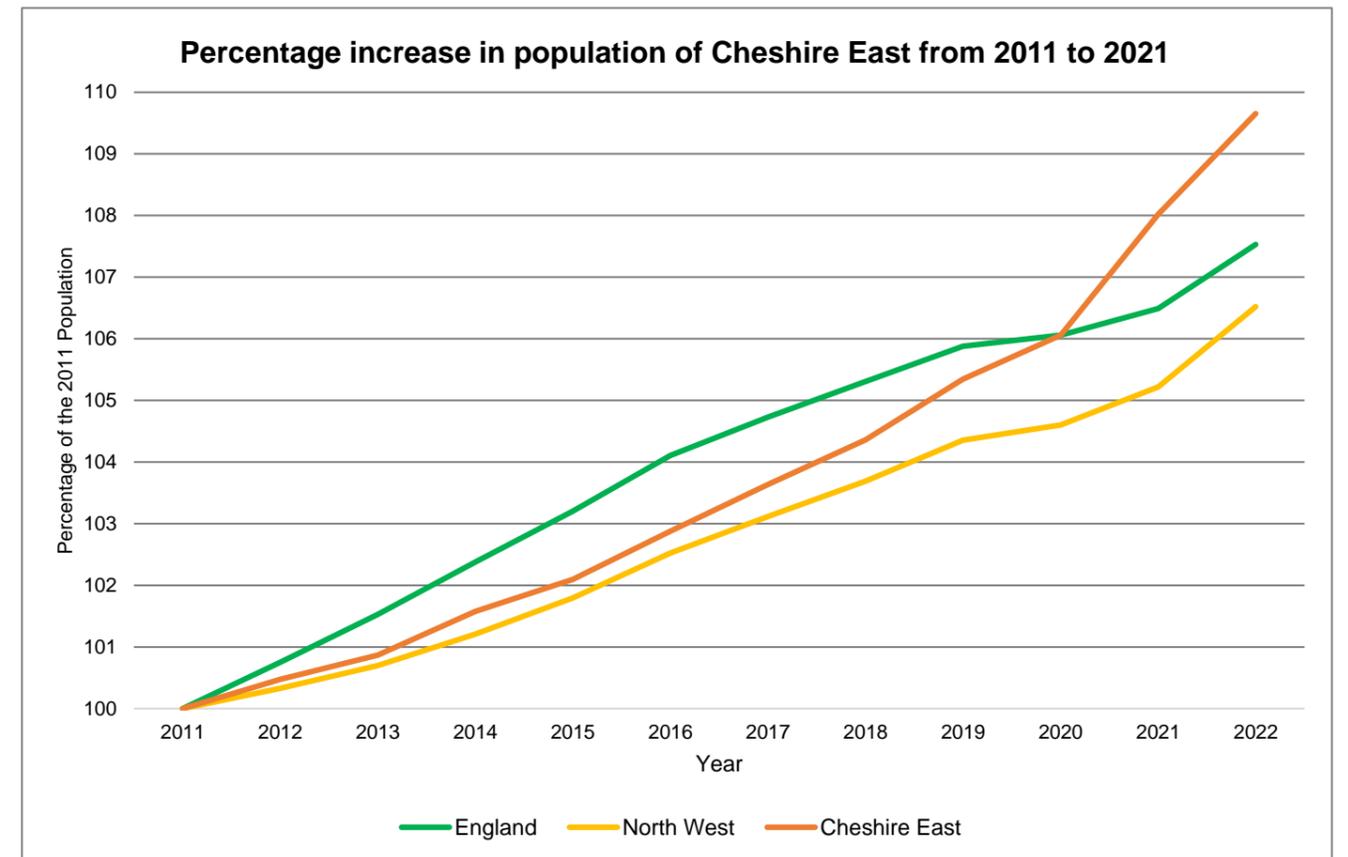


Figure 3-2 Percentage increase in population of Cheshire East from 2011 to 2021

⁵ ONS Mid-Year Population Estimates, England and Wales, July 2023

⁶ Census2021_PopAndHholds_BySettlementAndRuralUrbanClass_SummaryVersion_Issued281122

Figure 3-2 shows the mid-year population estimates for Cheshire East⁷, compared to the North West of England and England. Both England and the North West have shown a steady increase in population between 2011 and 2021. Cheshire East's population grows steadily until 2020/21 where the population then increases at a much higher rate. This is likely to be as a result of housing growth across the borough.

3.1.2 Population forecasts

Figure 3-3 shows the population forecast for Cheshire East compared to the North West and England between 2018 and 2043⁸. Since 2018, Cheshire East has experienced population growth each year and this is forecast to continue at a higher percentage compared to the North West of England; however, growth of Cheshire East is expected to be at a similar rate when compared to England.

To accommodate forecasted population growth, it is essential the LTP promotes sufficient capacity on the transport network through sustainable planning. Without this, there will be direct implications to the population and transport network in terms of accessibility, ability to travel, increased delays and reduction in journey quality placing additional pressures on the network, including managing traffic congestion on key strategic routes in the borough.

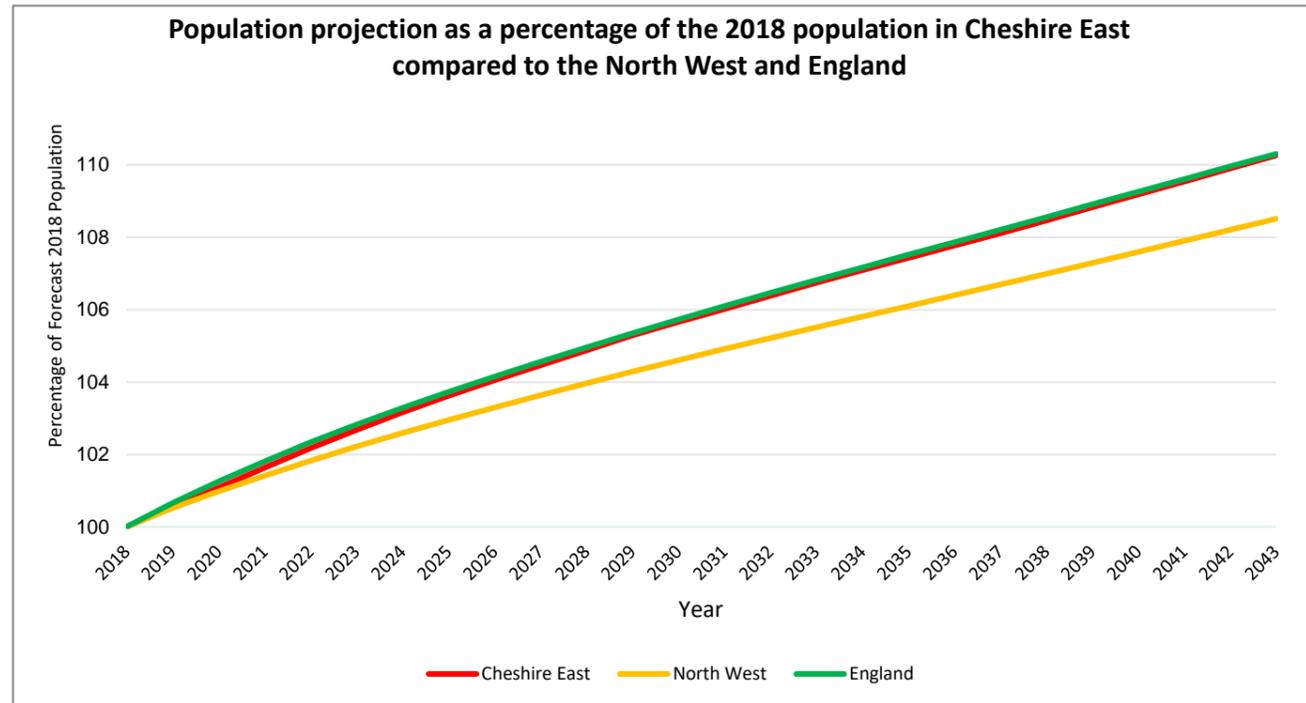


Figure 3-3 Population projection as a percentage of the 2018 population in Cheshire East compared to the North West and England

3.1.3 Population density

Figure 3-4 shows population density across the borough. This shows that more densely populated areas in Cheshire East are located in urban areas, such as Crewe, Macclesfield and Nantwich where there is a population density of between 5,000 and 6,400 people km². This shows that a majority of the population live in and around the principal towns and key service centres. Generally, in areas outside of the principal towns in Cheshire East population density is significantly

lower. This can be seen in Holmes Chapel, Chelford, Haslington and Audlem. Overall Cheshire East is much less densely populated when compared to the North West or England, as illustrated in Table 3-3.

Table 3-3 Average population density of Cheshire East compared to the North West and England

Cheshire East	North West	England
329 inhabitants per km ²	497 inhabitants per km ²	430 inhabitants per km ²

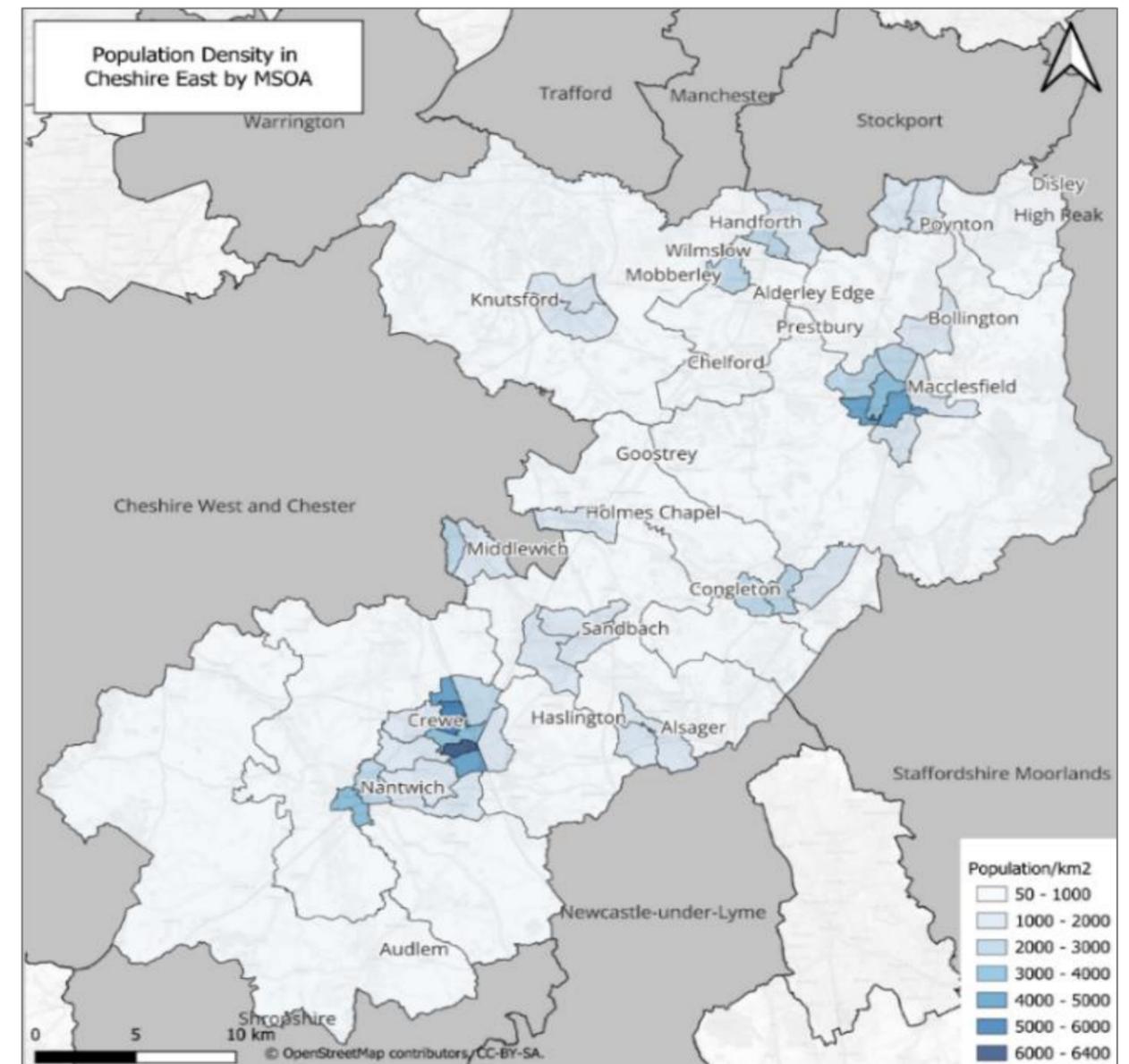


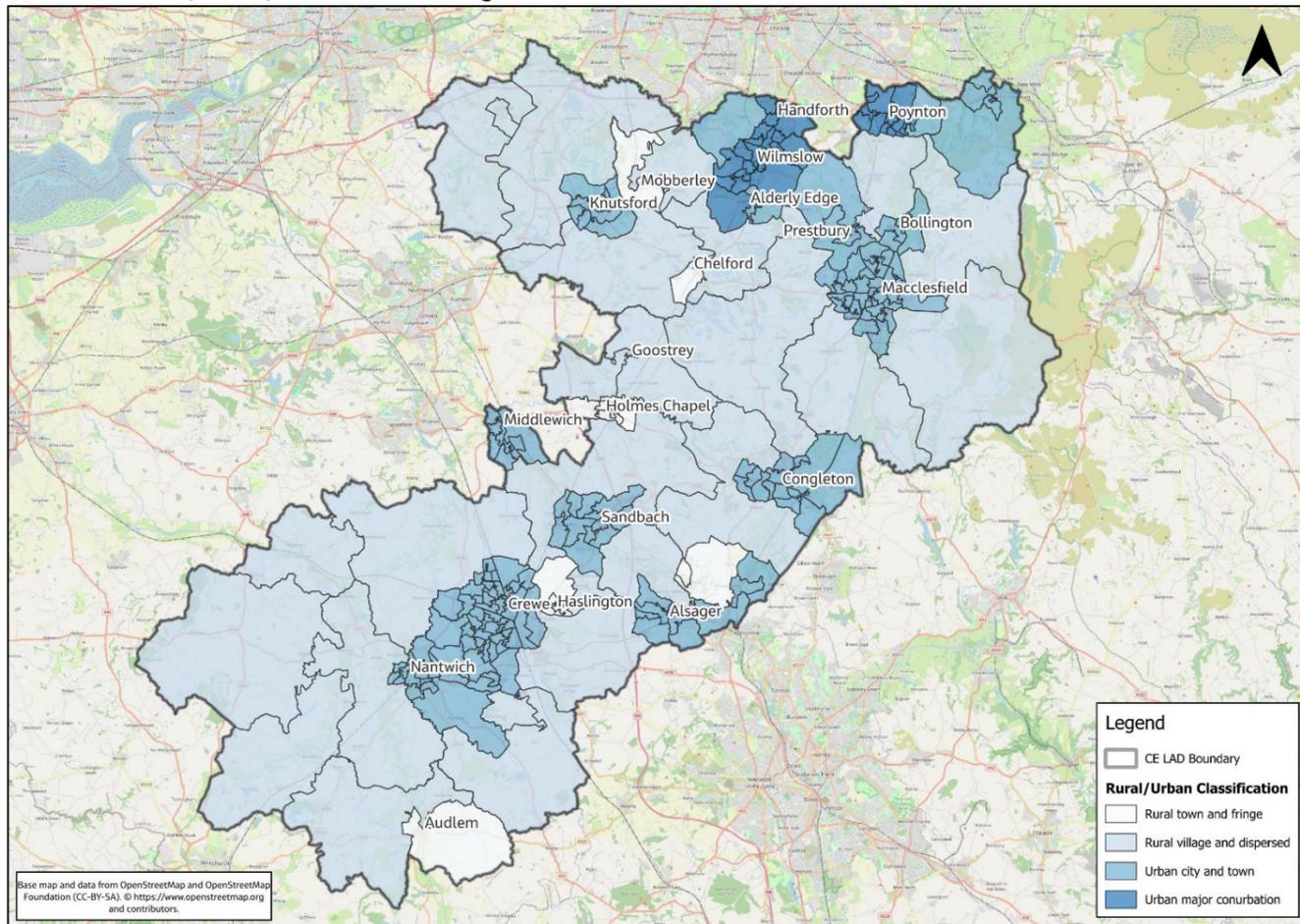
Figure 3-4 Population density in Cheshire East by MSOA (sourced from Cheshire East BSIP)

⁷ Estimates of the population for England and Wales - ONS

The towns across Cheshire East play an important role in providing the essential amenities for the surrounding rural areas. The LTP should therefore play a crucial role in improving urban sustainability in line with the principles of Triple Access Planning – these principles facilitate resident’s access to key services, job opportunities and other amenities through an integrated system of transport planning, land-use and digital connectivity. Efficient planning can influence spatial proximity enabling better transport connections in both densely and sparsely populated areas to improve accessibility for all, and ensure developments are in suitable locations; moreover, as detailed in Section 4.10, digital connectivity also plays a significant role in shaping the transport and land-use system.

3.1.4 Rural vs urban classification

Figure 3-5 shows the rural and urban classification of Cheshire East from the latest available data in the 2011 Census. It shows the majority of Cheshire East is made up of ‘rural village and dispersed’ classification; this is defined as areas which have an average population density of around 0.5 people per hectare. Areas of ‘urban city and town’ where less than 26% of the population are living in rural settlements and hub towns, are found surrounding the major settlements such as Nantwich, Crewe, Knutsford and Congleton.



Analysis of the 2021 Census⁹ shows that the population of Cheshire East’s rural areas has increased by 17,430 residents between 2011 and 2021, which equates to 12.7% growth. Cheshire East’s urban population increased by 11,171 residents, which is a 4.8% increase. The much higher level of rural population growth compared to urban population growth may in significant part be explained by the allocation of housing land at the edge of the borough’s towns and larger villages in the Local Plan. In practical terms, these sites effectively become part of the urban area once they are developed. According to analysis undertaken by CEC⁸, the proportion of Cheshire East’s population living in communal establishments is higher in rural areas (1.4%), compared to urban areas (0.9%). A communal establishment is an establishment with full time or part time supervision providing residential accommodation such as student halls of residence, boarding schools or care homes. Alongside this, the population of communal establishments decreased by 13% between the years of 2011 and 2021. This contrasts with growth of household populations which was 8% between 2011 and 2021.

Figure 3-5 Rural vs urban classification of Cheshire East (2011 Census)

⁹ 2021 Census tables TS001 (Number of usual residents in households and communal establishments), TS041 (Number of Households) & TS017 (Household size), Office for National Statistics (ONS), NOMIS (nomisweb.co.uk). 2011 Census tables KS101EW (Usual resident population), QS113EW (Household composition - Households) & QS406EW (Household size), 2011 Census, ONS, NOMIS.

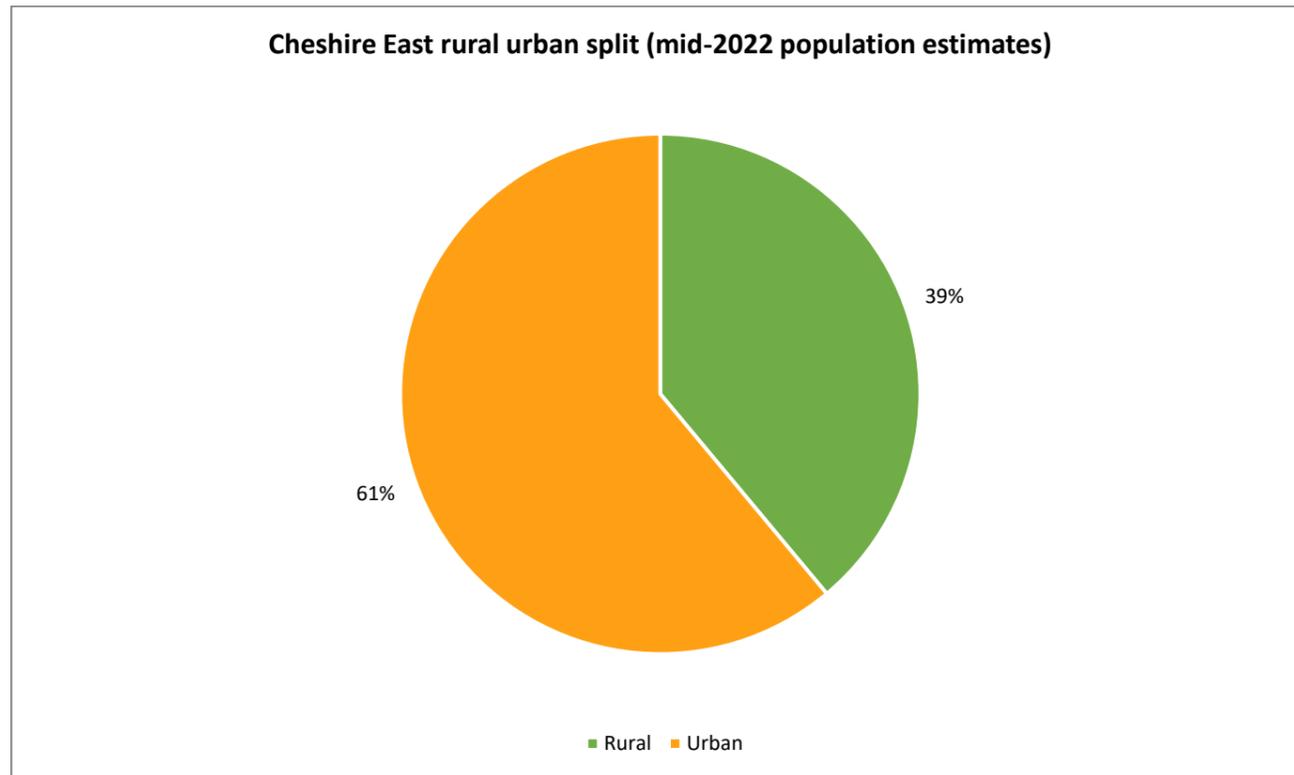


Figure 3-6 Cheshire East Rural Urban Split (mid-2022 population estimates)

Figure 3-6¹⁰ shows that 39% of Cheshire East's residents live in rural¹¹ areas. It is therefore important that the transport network within Cheshire East seeks to provide regular and reliable transport connections in order to reduce the reliance on the private car within rural areas.

¹⁰ Mid-year population estimates ('Population estimates by output areas, electoral, health and other geographies, England and Wales: mid-2022' statistical release), Office for National Statistics (ONS), March 2024. ONS Crown Copyright.

¹¹ The rural-urban classification used here is the 2015 Rural-Urban Classification for Cheshire East (at Lower Layer Super Output Area level), produced by the Research & Consultation Team, Cheshire East Council. At its most detailed, this classification involves 6 classes: "Rural", "Predominantly rural", "More rural than urban", "More urban than rural", "Predominantly urban" and "Urban". However, the council's analyses

(including the statistics presented in this file) commonly condense these into 2 broad classes: "Rural" (covering the 3 mainly or entirely rural classes from the 6-category system) and "Urban" (covering the other 3 classes).

3.1.5 Age profile

Figure 3-7 shows the age profile of Cheshire East utilising data from the 2021 Census. Some key analysis of the age profiles is set out below along with a comparison between 2011 and 2021 age structure:

- Between 2011 and 2021, the average age of people living in Cheshire East has increased by two years from 43 to 45 years of age;
- The number of people aged 50 to 64 increased by 13.9% in comparison with the previous Census. The growth in 50 to 64-year-olds contrasts with a 9.1% decrease in the number of residents aged between 35 and 49;
- In the 2021 Census, the age group with the highest population is between the ages of 50 to 59 which makes up 15.2% of the borough's population;
- The age category 50 to 64 rose by 13.9% between the 2011 and 2021 Census; and
- In 2021, 10.6% of Cheshire East's residents were aged 75 and above compared to 9% in 2011.

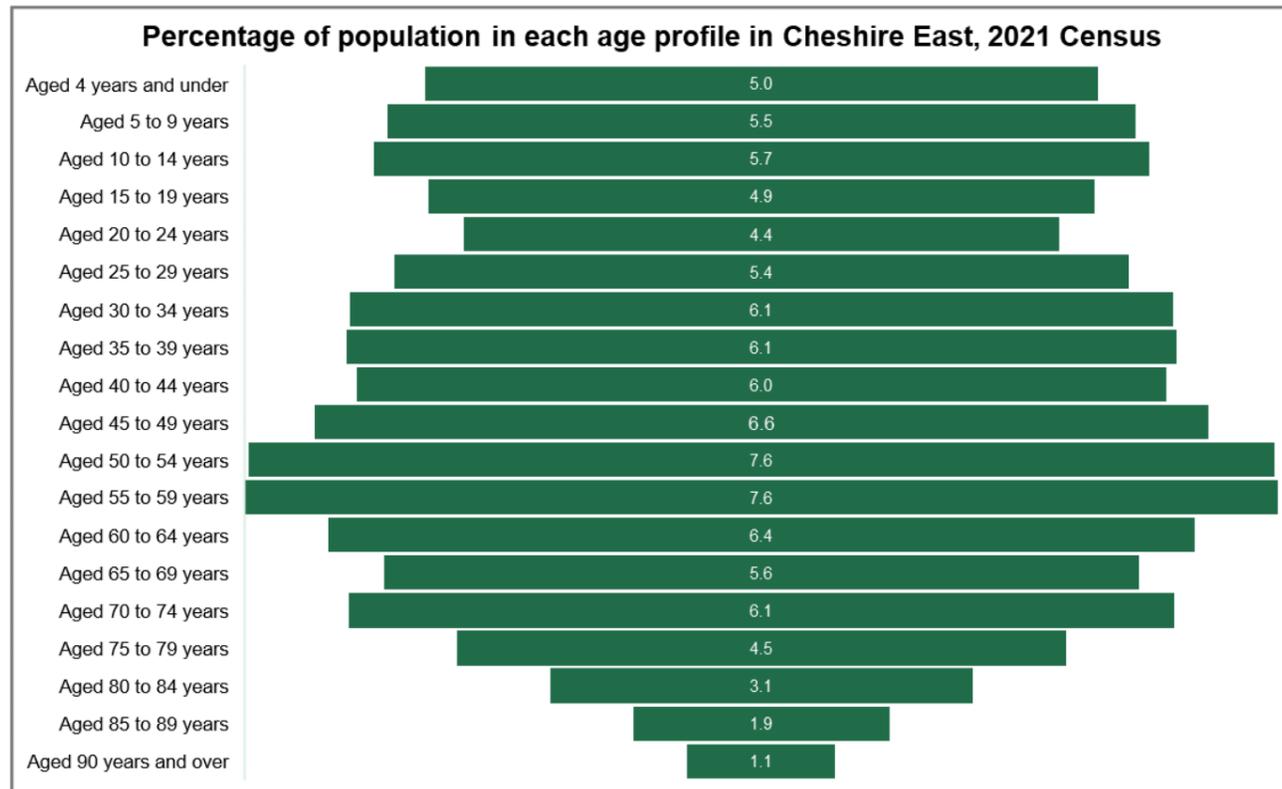


Figure 3-7 Percentage of population in each age profile in Cheshire East, 2021 Census

The data shows there is a significant proportion of the Cheshire East population in the 65+ age category which has increased since the 2011 Census. Cheshire East has a larger proportion of the population in the older age category of over 65 (22.3%) compared to Cheshire West (21.3%), the North West (18.7%) and England (18.4%) which demonstrates that Cheshire East has a higher ageing population.

It is necessary to ensure residents can access the key services and facilities that are needed in everyday life, such as GPs, hospitals, supermarkets and leisure opportunities. This is increasingly important for older people and more vulnerable groups, helping to reduce social isolation. It is important to recognise that different ages groups have differing needs for transport. Younger adults prioritise convenience and affordability, whereas working age adults commute for work

and therefore need reliable travel. However, older, more elderly adults face mobility issues, and therefore rely on more specialised transport services such as community shuttles to maintain their independence. The three figures below show the breakdown of three different age groups within Cheshire East: The Young Age Group (under 15), Working Age Population (16-64) and the Older Population (over 65).

Young population (under 15s)

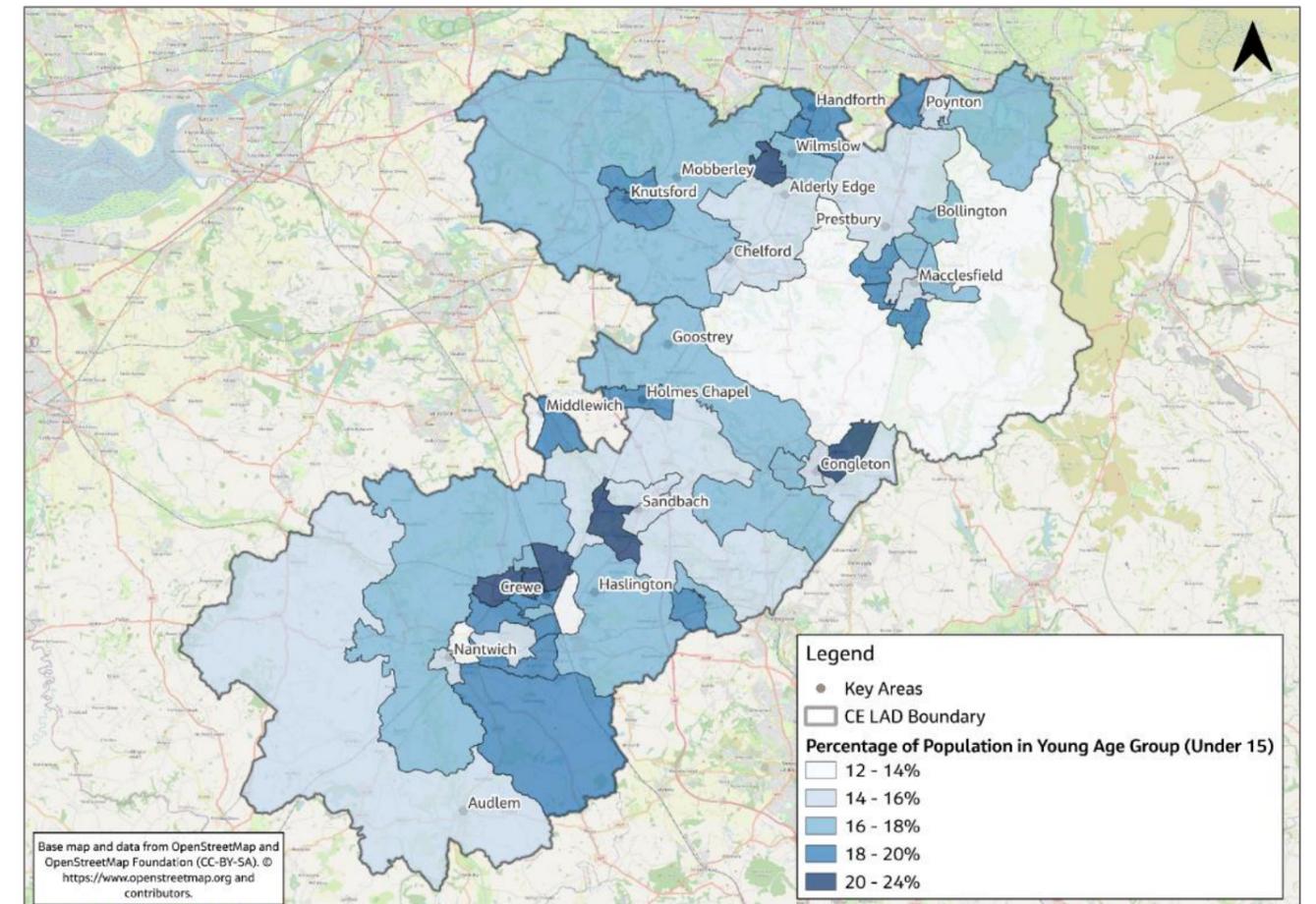


Figure 3-8 Distribution of Cheshire East's young population (under 15)

Figure 3-8 shows the percentage of the young population (under 15) within Cheshire East by Middle Super Output Area (MSOA). In 2021, 16.2% of Cheshire East's population was under 15 years old compared to 17.3% in England. This shows that Cheshire East has a lower proportion of under 15-year-olds compared with England. Figure 3-8 shows the highest concentrations of a younger population are MSOAs in the vicinity of Crewe, Sandbach, Congleton and west of Wilmslow where the young population ranges between 20-24%. Across Cheshire East, most MSOAs fall into the category of having 18-20% of a young population, which include Audlem, Sandbach and Holmes Chapel.

Working age population (16-64)

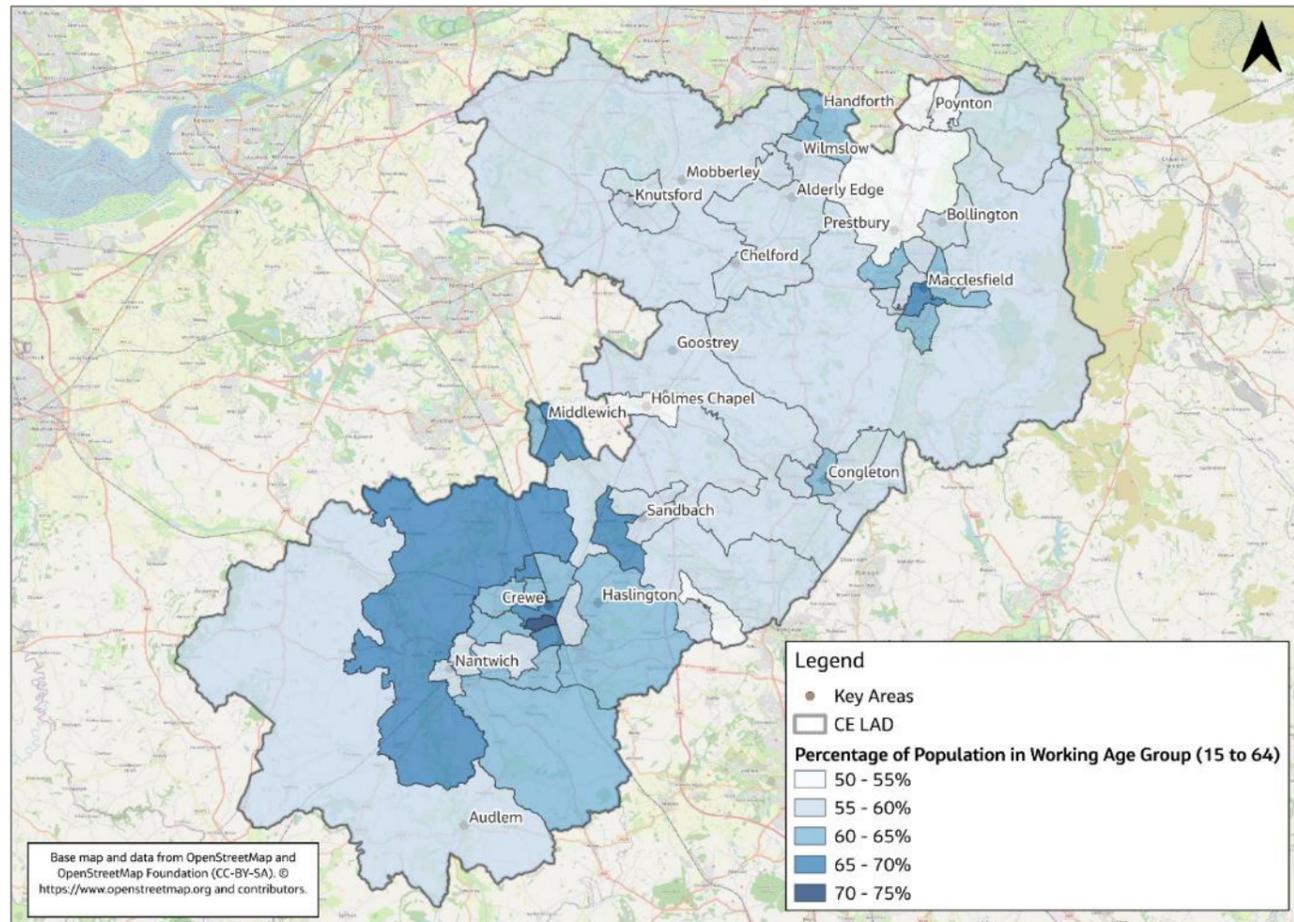


Figure 3-9 Distribution of Cheshire East's working age population (15 to 64)

Figure 3-9 shows the percentage of working age population within Cheshire East by MSOA. The working age population is aged between 15 and 64 and accounts for 61.1% of Cheshire East's population (240,248 individuals). This compares to England, which has a working population of 64.1% and shows that Cheshire East has a lower percentage of working age population compared to England. Figure 3-9 also shows the areas with the highest concentrations of working age population are Crewe and the surrounding areas to the north and west, central Macclesfield and Middlewich. These areas have a range 65-70% of the population being between the ages of 15 to 64.

It is important that good transport links exist to enable people to access a wider net of employment and education. Without good transport connectivity, opportunities for individuals can become limited and adversely impact economic opportunities and growth in the area.

Older population (over 65s)

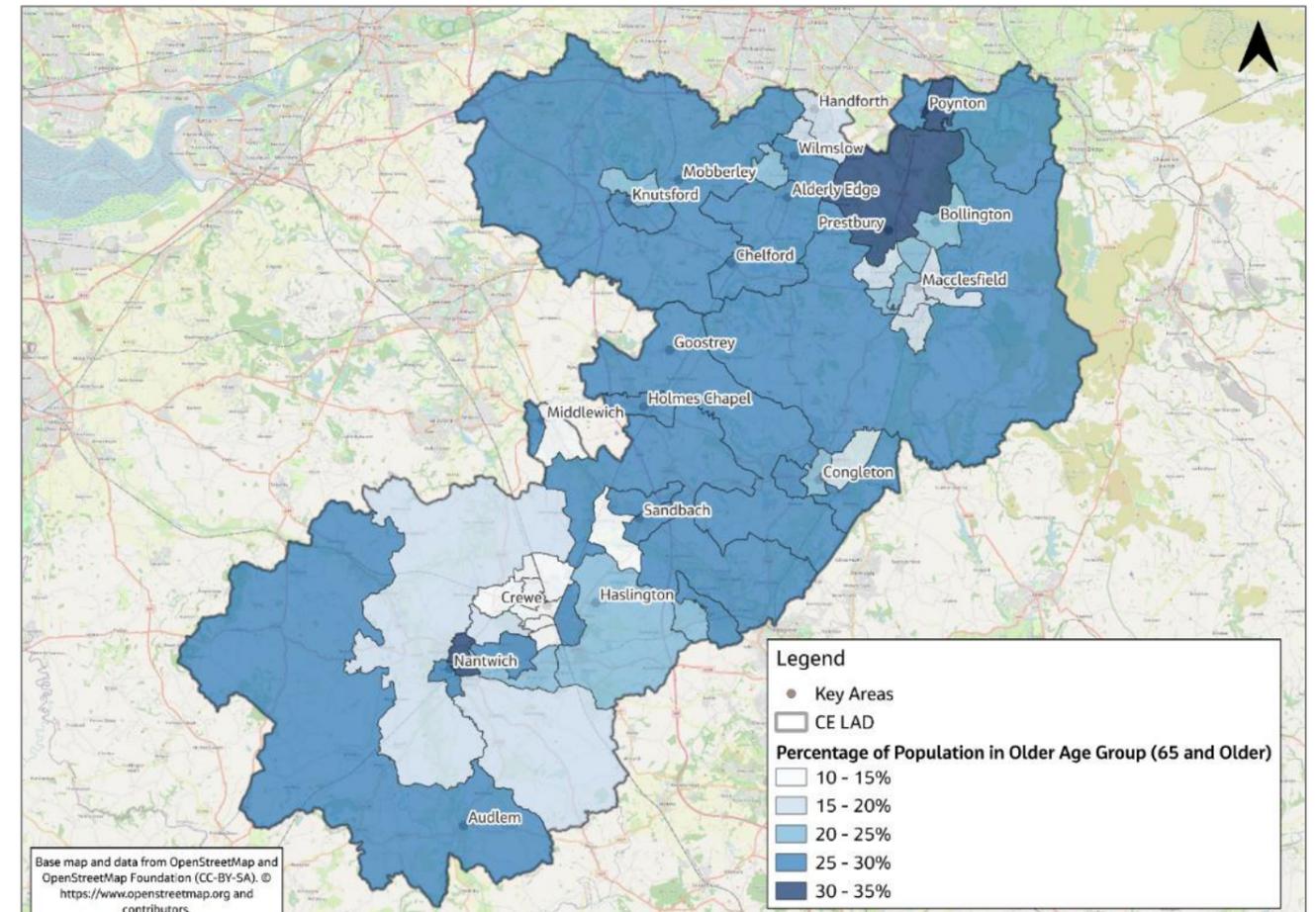


Figure 3-10 Distribution of Cheshire East's older population (over 65s)

Figure 3-10 shows the percentage of elderly population (over 65) throughout Cheshire East by MSOA. The older age group of 65+ makes up 22.3% of Cheshire East's population (89,225 individuals). By comparison, England has 18.4% of people within this older age category which shows that Cheshire East has a higher proportion of elderly population compared to England. The majority of Cheshire East MSOAs range from 25-30% of the population of age 65 and older which include Audlem, Mobberley, Chelford and Goostrey. Areas in Poynton, Nantwich and Prestbury have around 30-35% of their population in the age category of 65 and older.

An ageing population brings many complex challenges that need to be addressed, such as a more accessible transport system with direct and reliable transport links to key services including healthcare. A study on transport accessibility for the elderly¹² found that the majority of the older population stop driving personal vehicles at around 75 years old¹³ due to poor health. Along with this, confidence and anxiety about public transport increases the feeling of not being able to use the services. Therefore, it is essential that the needs of the elderly are considered when it comes to developing transport schemes which align to the needs of an ageing population and follow the Triple Access Planning principles.

¹² Fatima, Kaniz & Moridpour, Sara. (2019). Measuring Public Transport Accessibility for Elderly. 259. 03006. 10. 1051/mateconf/201925903006

¹³ Older car drivers | AA (theaa.com)

3.1.6 Index of Multiple Deprivation

Figure 3-11¹⁴ shows the Index of Deprivation (IMD) across Cheshire East. The IMD is an official measure of the levels of deprivation across England and is split down into Lower Super Output Area (LSOA) level.

The IMD can be split into seven different types of deprivation, these are;

1. Income;
2. Employment;
3. Education;
4. Health;
5. Crime;
6. Barriers to Housing and Services; and
7. Living Environment.

All these factors combine to create a score for each LSOA in England. These range from 1, being the most deprived area, to 32,844, being the least deprived area¹⁵. For Cheshire East, the overall IMD Decile Score is mapped. This ranks the 32,844 LSOAs from most deprived to least deprived, where LSOAs that fall into the category of 1 are in the top 10% most deprived LSOAs nationally and those that fall into decile 10 are in the top 10% least deprived LSOAs in England.

Figure 3-11 shows that in Cheshire East there are areas with higher levels of deprivation around key towns such as Crewe, east of Congleton and south of Macclesfield. These fall into some of the most deprived areas nationally due to their low IMD Decile Score.

Cheshire East overall is seen to be relatively affluent with the map showing the majority of the borough scoring above 6 on the IMD Decile Score and are in the 40% least deprived areas nationally. However, there are areas of deprivation and transport needs to promote equal opportunities throughout the borough.

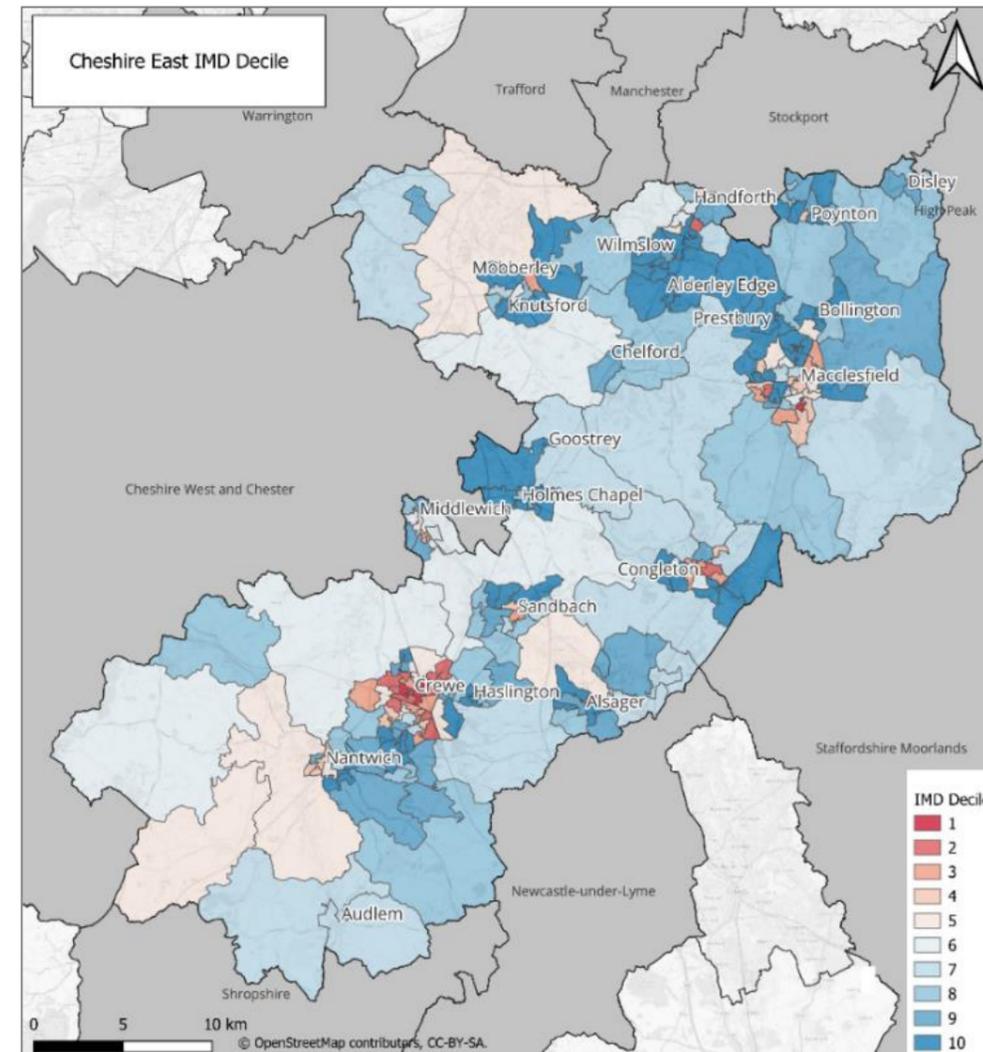


Figure 3-11 Cheshire East Index of Deprivation (Cheshire East BSIP)

¹⁴ Cheshire East BSIP

¹⁵ The English Indices of Deprivation 2019 (publishing.service.gov.uk)

3.1.7 English as a first language and ethnicity

Figure 3-12 shows the percentages of households in Cheshire East that speak English as their first language. This shows that the majority of Cheshire East's households speaking English as their first language are between 90 and 100%. The areas with a lower percentage are some LSOAs in and around Crewe, with around 60% to 90%.

In addition, the ethnicity breakdown in Table 3-4 shows that Cheshire East has a larger percentage of white population compared to the North West and England, being 6.5% higher than the North West and 10.7% higher than England.

Table 3-4 Ethnicity breakdown in Cheshire East compared to the North West and England

Category	Cheshire East	North West	England
White	96.7%	90.2%	86%
Mixed – Multiple Ethnic groups	1%	1.6%	2.2%
Asian/Asian British	1.6%	6.2%	7.5%
Black/African/Caribbean/Black British	0.4%	1.4%	3.3%
Other ethnic group	0.2%	0.6%	1%

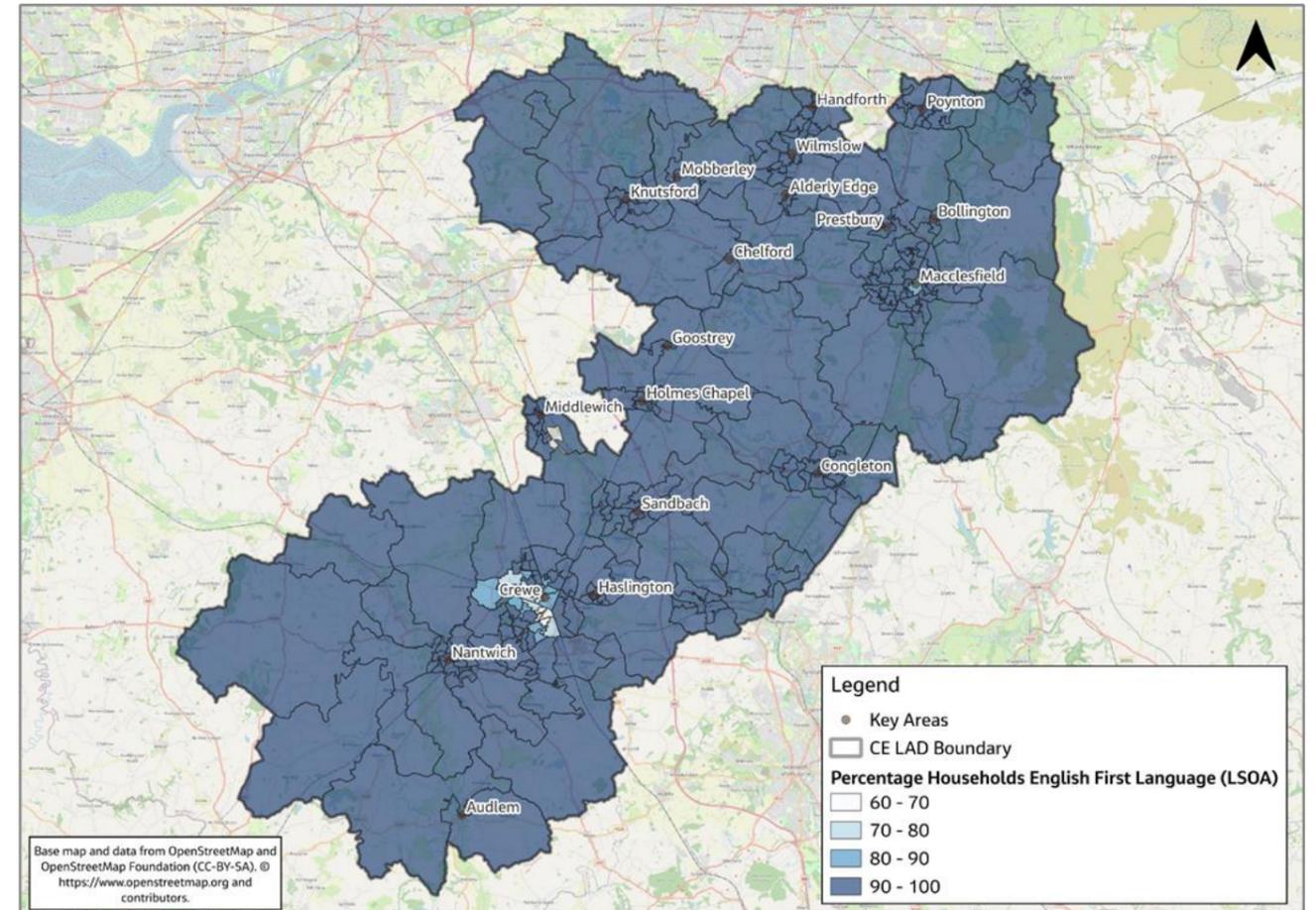


Figure 3-12 Percentage of each ethnicity in Cheshire East compared to the North West and England

3.1.8 Place and people types

Transport for the North (TfN) has recognised that the region is a diverse area that has a mix of transport related needs, challenges, and opportunities. Therefore, they have created nine distinct place types across the North in their Draft Strategic Transport Plan¹⁴ to help provide a framework that can be used to inform the LTP process. The data below breaks down the different place types within Cheshire East and the different areas of focus in relation to transport within these areas. Transport for the North has also outlined the North's people typology. The largest people typologies are made up of urbanites (15%), hard pressed living 2 (15%), with rural residents (8%) and inner-city cosmopolitans (3%) making up the smallest percentage of the North's population. The comparison to Cheshire East can be found in Table 3-6.

Table 3-5 below shows the breakdown of place types within Cheshire East. A majority of Cheshire East is made up of 'Transformational Places' and 'Other Urban' (both 47%). 'Transformational Places' categorise areas that have a lower population and high productivity growth and low unemployment levels. In the North there are 959 LSOAs that fit into this category, with 111 of them being located in Cheshire East¹⁶. 'Other Urban' categorises areas that have the second

¹⁶ Transport for the North Agglomeration and Clustering Research 2019

highest population density and are made up of low numbers of people working in traditional industries and a higher number of people working in the public sector¹⁷.

Table 3-5 Place types in Cheshire East (data provided by TfN¹⁸)

Type of Area	Percentage of Cheshire East
Visitor Centres, Industrial Places, Former Metropolitan Countries, Large Conurbations, Commuter Towns	0%
Rural Town and Fringe	3%
Transformational Places	47%
Rural Village and Dispersed	3%
Other Urban	47%

Transformational Places are home to a wide range of different people typologies including a mix of suburban and rural people segments¹⁴. This can be seen in Table 3-6 overleaf where, based on 2015 population estimates, 39% of Cheshire East's population live in small town suburbs, 26% higher than the North as a whole and made up of 18% urbanites, 3% higher than the North. This is categorised by older individuals that do not have children, located outside metropolitan areas, and often live in detached and semi-detached owner-occupied properties. Please note this data uses 2015 population estimates. These individuals need to travel more due to living further away from urban centres and employment centres. They are therefore reliant on transport infrastructure and services.

Other Urban Areas are home to predominantly sub-urban car dependent segments including hard pressed living¹⁴. This can be seen in Table 3-6 overleaf where 17% of Cheshire East's population is home to hard pressed living 1, 4% higher than the North. This is categorised as families, having a high percentage of no qualifications and living in smaller towns and cities outside of metro areas in terraced and semi-detached houses. These individuals travel less and shorter distances, however, affordable public transport needs to be provided in order to connect these individuals to economic and educational opportunities. Areas with higher levels of deprivation need to be connected to sustainable transport to ensure equal opportunities throughout the borough.

¹⁷ [Transport for the North Strategic Transport Plan 2023](#)

¹⁸ *This information is licensed under the Open Government Licence v3.0 ([Open Government Licence \(nationalarchives.gov.uk\)](https://nationalarchives.gov.uk))*

Table 3-6 Transport for the North's people typology data for Cheshire East compared to the North (data provided by TfN¹⁹)

Segment	Percentage of the North's Population (2015 population estimates)	Percentage of Cheshire East Population (2015 population estimates)	Key Demographics	Key Property/Geography Characteristics	Key Travel Characteristics
Urbanites	15%	18%	Employed full-time in middle occupational roles. Families with children and couples with no children.	Smaller towns and outer fringes of larger cities. Semis and terraces, majority owner occupied.	Travel more, travel more by rail, less bus. Own car and greater propensity to commute by rail.
Hard Pressed Living 1	13%	17%	Families with children. High percentage with no qualifications. Working in manufacturing.	Smaller towns and cities outside metro areas. Terraced houses and semis - around half rented.	Travel less, shorter journeys, considerably less by rail but much higher bus. Greater car ownership.
Hard Pressed Living 2	15%	0%	Families with children. Lower occupations in public admin and education. Relatively high percentage no qualifications.	Inner suburbs and small towns within metropolitan areas. Approximately half owner-occupied, living in terraces or semis.	Travel less and shorter distances. Slightly higher rail and much higher bus. ~30% no car. Commute more likely by bus and rail.
Small Town Suburbs	13%	39%	Older and without children.	Outside metropolitan areas. Detached/semis majority owner occupied.	Travel more, travel further, less public transport. Greater car ownership and travel further by car. Significantly less bus use.
Metro Suburbs	13%	0%	Older, employed in high occupations. More likely to be employed full-time and aged 45-59.	Outer suburban areas of metropolitan areas. Majority owner occupied. Semis/detached.	Travel more and further by car and rail. Much lower bus. Car ownership higher. More likely to have 1-2 cars in household and travel to work by car.
Multiculturals	11%	2%	High percentage families with children. Younger with more children in households.	Larger towns and cities. Around half rented.	Travel less, shorter journeys. Much higher bus. Almost 50% have no car.
Constrained City Dwellers	9%	6%	High percentage singles divorced or widowed. High percentage with no qualifications, unemployed and long-term sick.	Densely populated, large towns and cities. High percentage social rented and flats.	Fewest trips, shortest distance, much more bus, much lower rail. More than 50% have no car. High walking/bus commute.
Rural Residents	8%	17%	Older, married, better educated. Working in primary industries.	Rural, less dense, detached houses.	High car ownership and car commuting.
Inner City Cosmopolitans	3%	1%	~50% students. Young, well educated, single.	Dense inner cities, private rented flats.	Significantly above average rail. Low car usage and ownership - almost 50% have no car.

¹⁹ This information is licensed under the Open Government Licence v3.0 ([Open Government Licence \(nationalarchives.gov.uk\)](https://nationalarchives.gov.uk))

3.2 Health and wellbeing

3.2.1 Life expectancy

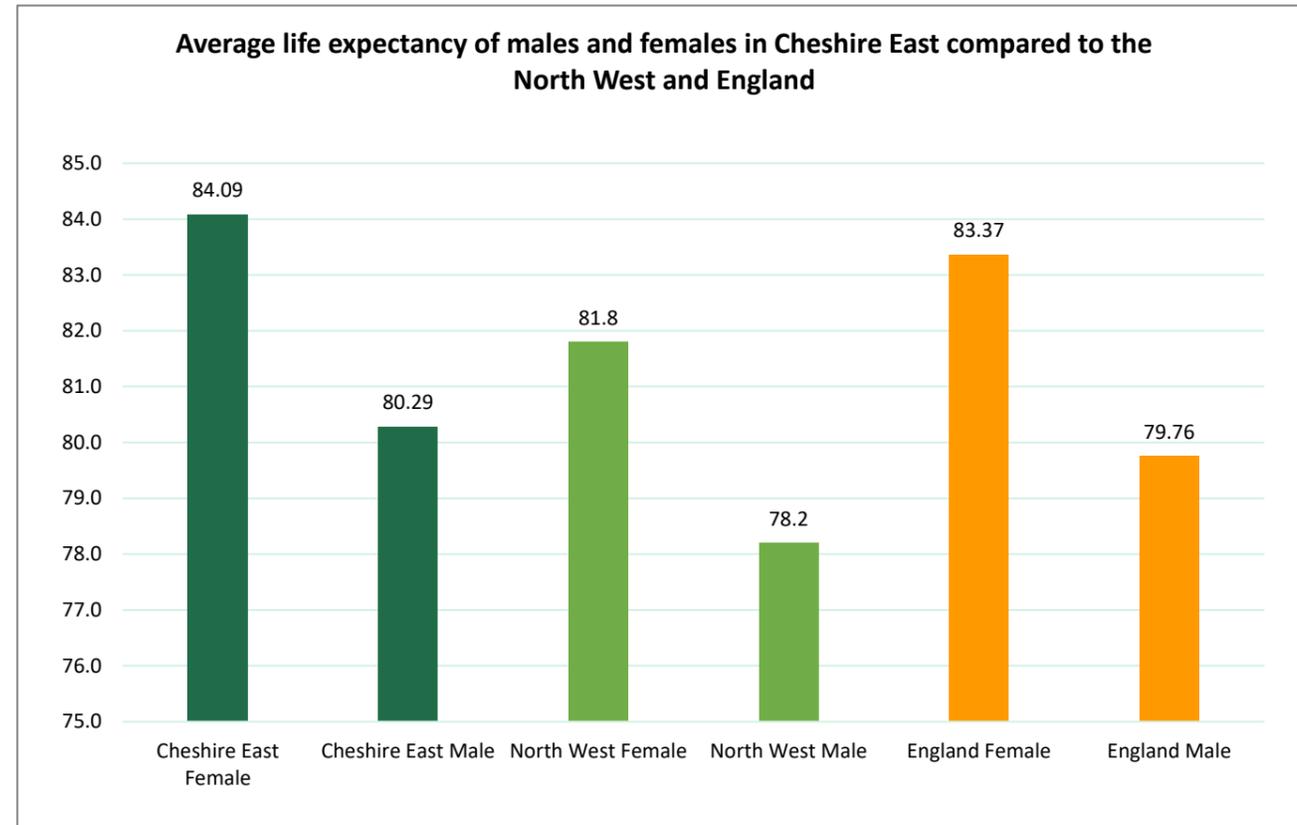


Figure 3-13 Average life expectancy of males and females in Cheshire East compared to the North West and England

Figure 3-13 shows the average life expectancy for males and females across Cheshire East between the years of 2017 and 2019²⁰ compared with the North West and England. On average Cheshire East residents have a higher life expectancy compared to the North West and England. Females in Cheshire East have a higher life expectancy compared to men with a life expectancy of 84 compared to 80. A breakdown of the life expectancy for males and females on an electoral ward level can be found in Cheshire East’s Tartan Rug²¹. Areas such as Crewe and Macclesfield (lower than 80 in some areas) have much lower life expectancies compared to areas such as Wilmslow and Poynton (above 80 in most locations).

²⁰ [Life expectancy for local areas of the UK - ONS](#)

²¹ [Cheshire East Tartan Rug 2022](#)

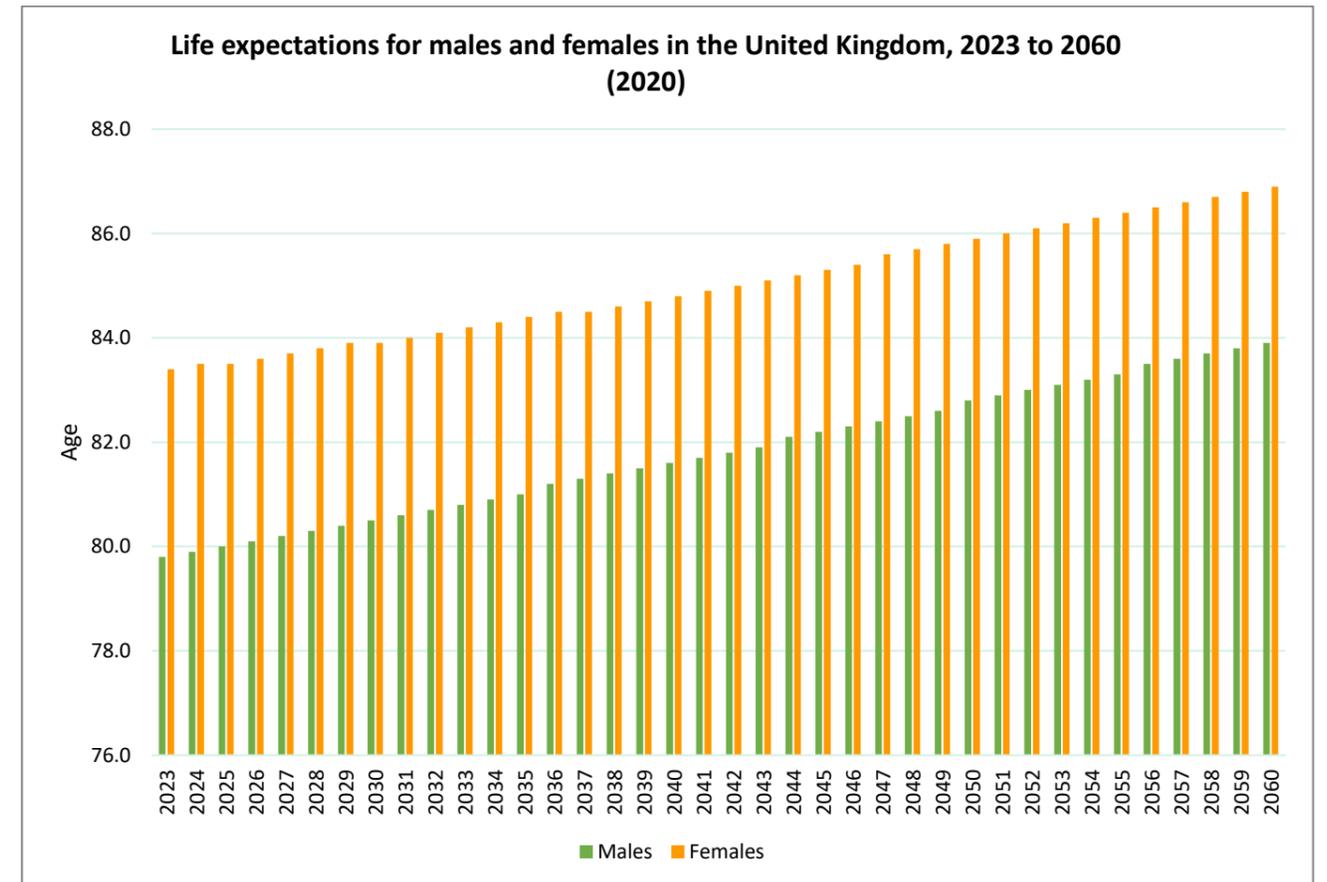


Figure 3-14 Life expectations for males and females in the United Kingdom, 2023 to 2060 (2020)

Figure 3-14 shows the life expectancy for males and females in the United Kingdom from 2023 to 2060. This shows that life expectancy is predicted to increase each year. For example, for females, this is expected to increase from nearly 84 today to 87 by 2060. As set out in section 3.1.5, Cheshire East has a higher elderly population compared to the North West and England so an ageing population and people living for longer is particularly relevant in the borough. This pattern of people living longer in the UK shows the importance of providing accessible transport for all which should be a key consideration of the next LTP. This is due to the elderly having reduced mobility due to complications with age, and this means they are more likely to rely on public transport to access key services. Therefore, there is a greater need to improve access to public transport in order to access key services.

3.2.2 Cheshire East Local Authority Health Profile

Table 3-7 lists the range of health indicators for the whole of Cheshire East, compared to the North West and England²², including mortality rate, smoking prevalence and obesity levels.

Cheshire East has a lower rate (per 100,000) compared to the North West and England for mortality from all causes, cardiovascular diseases, cancer and smoking prevalence. Overall Cheshire East, the North West and England all have low levels of physically active adults. There is a strong link between low levels of physical activity and ill health, therefore, it

²² [Local Authority Health Profiles - Data - OHID \(phe.org.uk\)](#)

is important to ensure there is provision of active travel throughout Cheshire East to encourage more individuals to become physically active, and therefore reduce ill health in the borough.

Table 3-7 Cheshire East's Local Authority Health Profile (Public Health England)

Indicator	Cheshire East	North West	England
Under 75 mortality rate from all causes (rate per 100,000 population) 2021	303.7	431.4	363.4
Under 75 mortality rate from all cardiovascular diseases (rate per 100,000 population) 2021	64.8	92.8	76
Under 75 mortality rate from cancer (rate per 100,000 population) 2023	109.5	136	121.5
Smoking Prevalence in Adults (18+), %, 2022	9.40%	13.40%	12.70%
Adults (18+) classified as overweight or obese, %, 2021/22	62.50%	66.70%	63,8%
Physically active adults, %, 2021/22	67.30%	65.30%	67.30%

Whilst Cheshire East has a lower mortality rate than the North West - it is important to ensure sufficient provision of accessible active travel throughout the borough to promote better health outcomes. A study conducted by The Health Foundation in 2021²³ found that an estimated average of 125 early deaths per year can be prevented from increased walking and 58 early deaths per year can be prevented from increased cycling. This demonstrates active travel can deliver significant health benefits such as maintaining a healthy weight, reducing the risk of cardiovascular disease, cancer, and depression. Additional benefits also include improved morbidity/absenteeism rates and improved air quality for the borough. Finally, it is important to ensure good access to healthcare services – especially for vulnerable groups such as the elderly due to higher risks discussed earlier. Table 3-7 shows that even though physically active adults for the years of 2021/22 is similar for Cheshire East, North West and England, the overall levels of physically active adults is low. Despite existing initiatives, additional measures are needed in Cheshire East to encourage physical activity among adults in the borough.

Table 3-8 Percentage of children overweight and obese in Cheshire East compared to the North West and England (Cheshire East Borough Profile)

Area	Percentage of children overweight (including obese) ages 4-5	Percentage of children overweight (including obese) ages 10-11
Cheshire East	21.6	30.2
North West	23.9	35.5
England	22.4	34.3

As shown in Table 3-8, obesity rates in children have remained at a similar level since 2009-2010 to 2018²⁴ and are lower in Cheshire East compared to the North West and England. Even though obesity levels are lower in Cheshire East, the overall percentage of children overweight in the age categories for 4-5 and 10-11 are still high. Despite existing initiatives, additional measures are crucial to tackle childhood obesity and promote healthier lifestyles among children. In order to address this Cheshire East needs to encourage programmes and initiatives as well as improve existing walking and cycling networks, as covered in 4.1 and 4.2, to encourage children to walk or run to school in order to help reduce the number of children classes as overweight.

3.2.3 Annual Personal Wellbeing Estimate

Annual Personal Wellbeing Estimates are taken from the Office for National Statistics (ONS) 2023 data and provide estimates of life satisfaction, feeling that the things done in life are worthwhile, happiness and anxiety in the UK, including analysis on the characteristics that are most likely to impact personal well-being²⁵.

A scoring system of 0 to 10 is given where 1 is a low score and 10 is a high score. Individuals are asked to respond on a scale of 0 to 10, where 0 is "not at all" and 10 is "completely"²⁶. The Annual Personal Wellbeing Estimates are shown in Figure 3-15 below.

²³ Source: Health Foundation analysis using Department of Transport, National Travel Survey (NTS), Table TSGB0101, ONS, UK population estimates, 1838 to 2018. Note: Private transport includes: cars, vans, taxis and motor cycles; Rail includes: national rail, metros, trams

²⁴ Cheshire East Borough Profile Borough Profile (2019/20) (arcgis.com)

²⁵ Annual personal well-being estimates - ONS

²⁶ Personal well-being in the UK - ONS

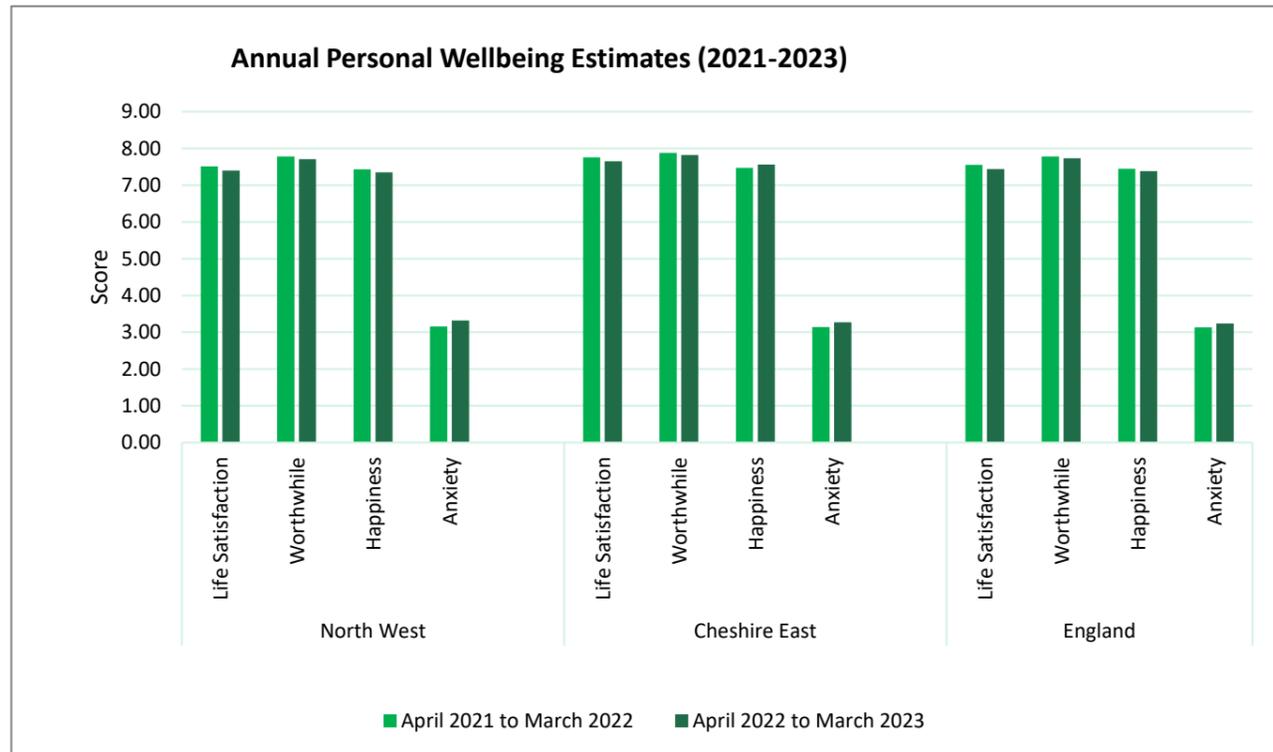


Figure 3-15 Annual Personal Wellbeing Estimate score for Cheshire East compared to the North West and England (ONS 2023)

The scores for life satisfaction, worthwhile and happiness are relatively high; however, there is opportunity for improvement to ensure individuals are feeling worthwhile, happy, and satisfied with life. Anxiety can be seen to be lower, scoring just above three in each location, this shows that overall, individuals feel a low sense of anxiety, but again, there is opportunities for improvement.

Overall, the wellbeing of Cheshire East is on similar levels to the rest of the nation as life satisfaction, worthwhile and happiness are high, and anxiety is low.

3.2.4 Physical Inactivity

In Cheshire East, there are significant proportions of the population who are physically inactive. The UK government recommends adults do at least 150 minutes of moderate physical activity per week, however, as can be seen Figure 3-16²⁷ only 67.1% of Cheshire East residents achieve this figure with 22.4% physically active for less than 30 minutes per week. As set out in section 3.2.2, 62.5% of adults in Cheshire East are classified as obese or overweight and worryingly this is increasingly seen in children with 21.6% of children aged 4-5 and 30.2% aged 10-11 falling into this category. Car dependency and the associated low levels of walking, cycling and public transport use is a contributory factor to these health issues and the associated burden on health services from treating related conditions.

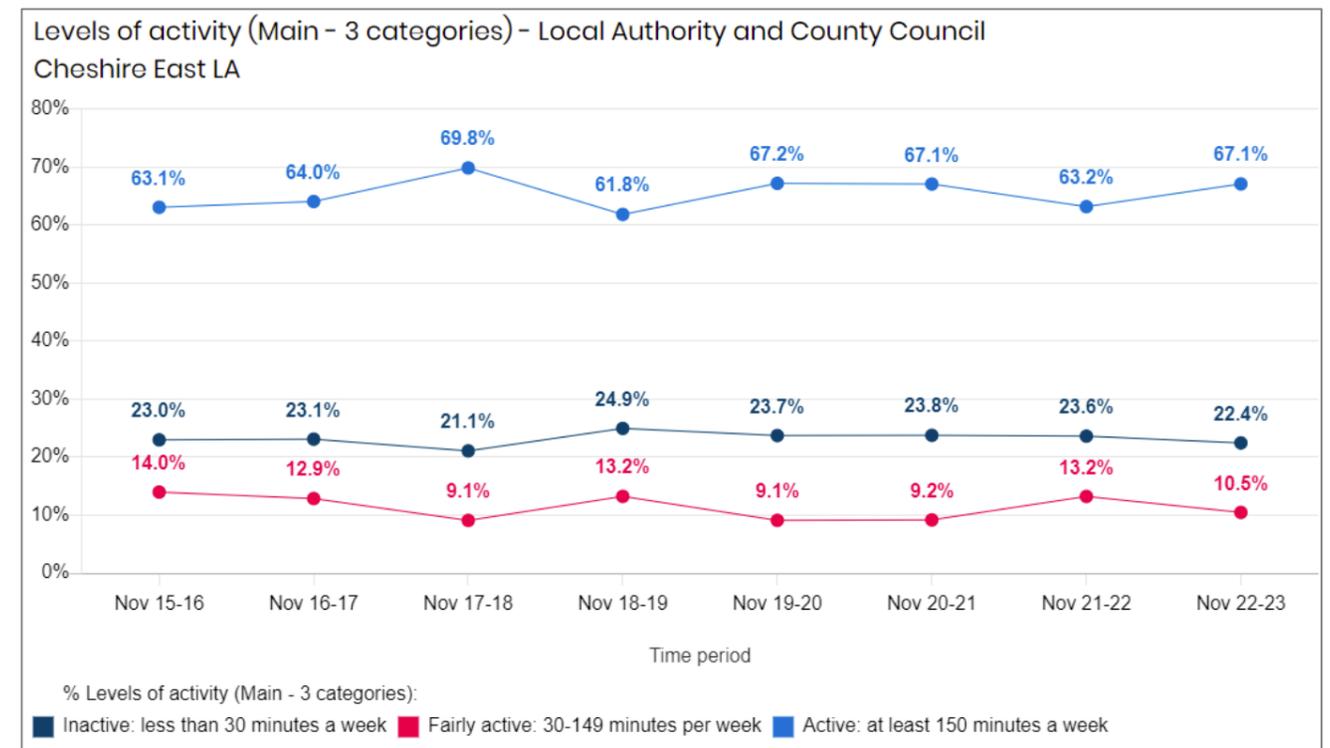


Figure 3-16 Levels of activity in Cheshire East (Sport England)

3.2.5 Thriving Places Index

The Thriving Places Index is a UK-wide tool to provide a new way to look at the strengths and challenges of the place where people live. It shows whether the conditions are in place for people to thrive – in a fair and sustainable way and helps inform local policy and decision making²⁸. The Thriving Places Index for Cheshire East is shown in Figure 3-17.

²⁷ Levels of activity

²⁸ Thriving Places Index | Centre for Thriving Places - Cheshire East



Figure 3-17 Cheshire East Thriving Places Index

Local conditions in the Thriving Places Index are rated 5.60 out of 10. When broken down into individual elements, Place and Environment has a score of 5.12 and Transport has a low score of 3.87. Looking at the category of mental and physical health, the overall health status of Cheshire East is rated 5.52 out of 10. This medium score, for Cheshire East is the same as or very similar to the England and Wales average²⁹ and reinforces the need to provide more active travel throughout the borough of Cheshire East. This will ensure individuals are encouraged to use active modes where possible, so that walking and cycling are chosen as the preferred and easier mode. For those who cannot engage in active travel, due to age or accessibility needs, sustainable transport needs to be made more attractive to reduce car dependency levels in the borough – a key issue explored in the next section. The LTP should look to address areas which score poorly in the Thriving Places Index to help shape future policy/plans to improve wellbeing through improved active travel infrastructure and better accessibility.

3.2.6 Cheshire East Tartan Rug

The Tartan Rug for the borough³⁰ shown in Figure 3-19. The Tartan Rug provides analysis of health and wellbeing of Cheshire East, and how this varies by ward across the borough. Overall reported health and wellbeing levels in Cheshire East are similar to England. However, there are large inequalities across the borough, especially in areas such as Crewe and Macclesfield - where health and wellbeing scores are below the England average.

For example, hospitalisations in Cheshire East have worsened for;

- Emergency admissions aged 0-4 years;
- Emergency admissions all causes; and
- Hospital stays for self-harm.

Figure 3-18 shows how the health and wellbeing picture in Cheshire East compares to other local authorities in Cheshire and Merseyside, this is taken from the Cheshire East Tartan Rug.

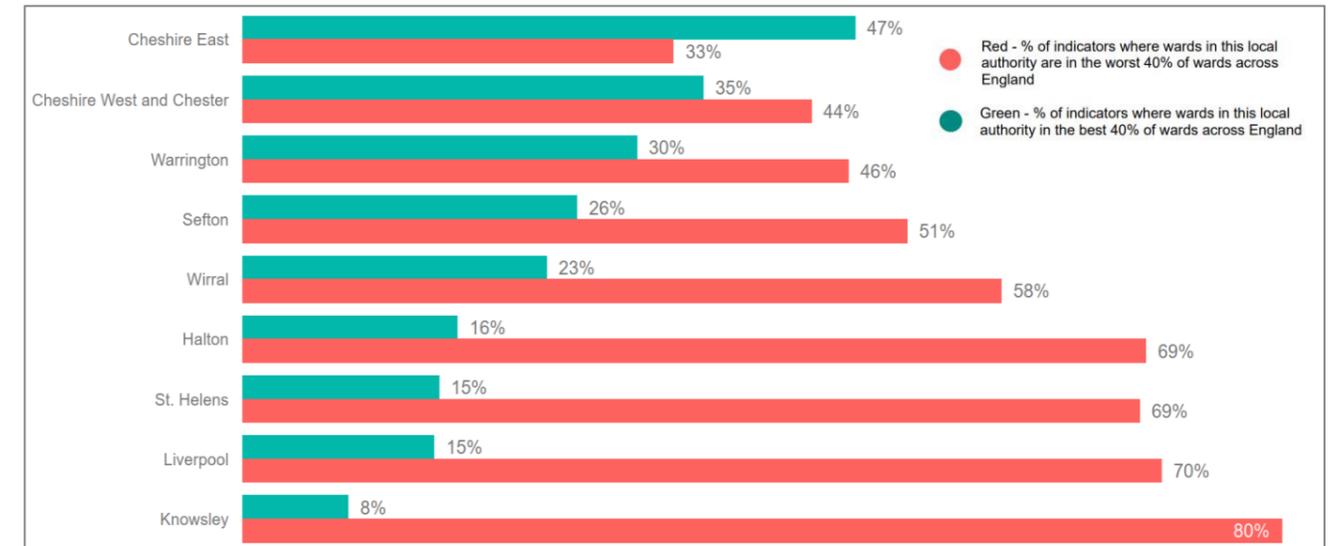


Figure 3-18 How does the health and wellbeing picture across Cheshire East compare to other local authorities in Cheshire and Merseyside? Cheshire East Tartan Rug²⁷

Figure 3-18 shows that Cheshire East generally perform better than other local authorities in terms of health and wellbeing. Cheshire East has the lowest percentage of wards in the worst 40% of wards across England the highest percentage of wards in the best 40% of wards across England. However, it is within Cheshire East where there are significant disparities in health and wellbeing.

Areas in Cheshire East which have deteriorating health and wellbeing levels are Nantwich, Congleton, Holmes Chapel, and Knutsford. Areas of improvement include Chelford, Handforth, Alderley Edge, Wilmslow, Bollington, Disley and Poynton. An analysis of Cheshire East's Tartan Rug³¹ shown in Figure 3-19, shows that Cheshire East compared to other local authorities in Cheshire and Merseyside and surrounding Local Authorities has the highest proportion of wards in the best performing 40% across England. However, Cheshire East has 33% of the borough's wards within the worst 40% of wards across England. This score of 33% shows that there are still many inequalities within Cheshire East, meaning the transport system throughout the borough needs to provide accessible and reliable services so people can access the health and care services that they need.

Figure 3-19 shows the Tartan Rug for Cheshire East. It shows that six areas in Crewe are in the top 20% most deprived wards nationally for:

- Deaths from respiratory diseases;

²⁹ Thriving Places Index | Centre for Thriving Places - Understanding Results

³⁰ Cheshire East Tartan Rug 2022

³¹ Cheshire East Public Health | Health Profiles & Tartan Rug 2022

- Emergency admissions of all causes;
- Admissions for alcohol;
- Excess weight of 10–11-year-olds;
- Children in poverty;
- Pensioners living alone; and
- Male and female life expectancy.

Similar scores putting these areas in the top 20% most deprived wards nationally, can be seen in two areas in Macclesfield (Macclesfield Hurdsfield and Macclesfield South). These areas are in the highest 20% of wards nationally for:

- Male life expectancy;
- All deaths under 75;
- All new cases of cancer;
- Binge drinking in adults; and
- Emergency admissions for ages 0–4.

As shown and analysed in Figure 3-13, Cheshire East has a higher life expectancy compared to the North West and England. However, when breaking this down to the towns and key service centres within the borough, areas in Crewe and Macclesfield are in the top 20% most deprived wards nationally for female (Crewe average 80.08) and male (Crewe average 76.8) life expectancy. Compared to Wilmslow, which sits in the top 20% least deprived wards nationally, which has an average life expectancy of 86 for females and 81.4 for males. In Cheshire East there have been efforts to enhance health and wellbeing, however there is still room for improvement to address specific challenges in specific areas of the borough such as life expectancy, to ensure inclusive access to health services for the entire population.

Figure 3-20 takes information from the Tartan Rug in Figure 3-19 to show the differences between the two principal towns and key service centres in the borough.

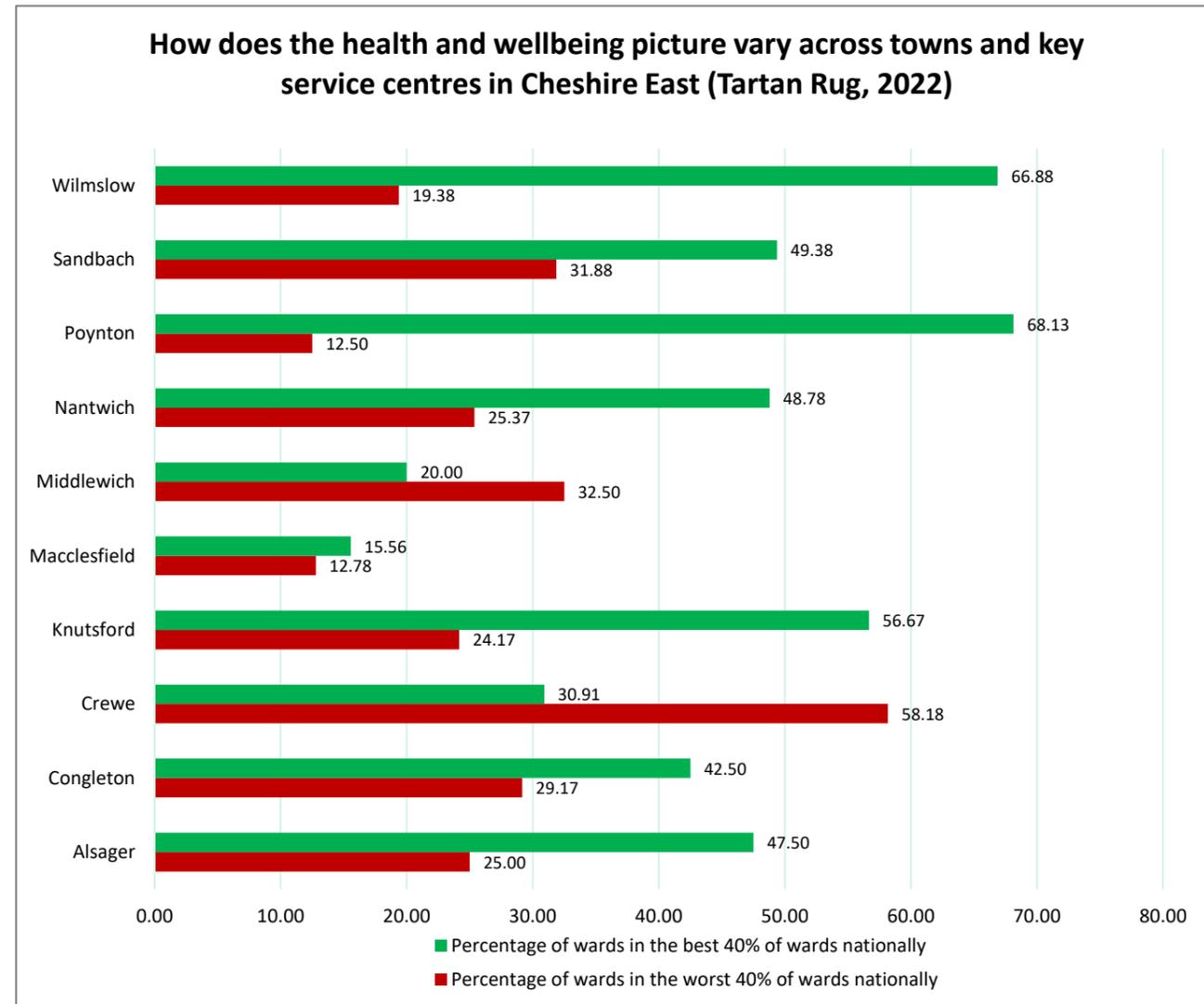


Figure 3-20 How does the health and wellbeing picture vary across towns and key service centres in Cheshire East (Tartan Rug, 2022)

This figure shows that two locations, Crewe, and Middlewich, have a higher proportion of areas in worst performing wards, compared to best performing wards. Figure 3-20 shows that Crewe has 58% of wards in the worst 40% of wards nationally. However, there are other key service centres in Cheshire East, such as Wilmslow and Poynton which have a large percentage of wards in the best 40% of wards nationally.

This uneven split in Cheshire East in terms of health and wellbeing shows that there is a lot of inequalities between the different towns. This shows that there needs to be targeted interventions unique to each area to address the disparities, whilst ensuring there is equitable access to healthcare services, education, employment, and income equality.

3.3 Accessibility

3.3.1 Transport-related social exclusion

Transport-related social exclusion (TRSE) is the inability of being able to access opportunities, key services, and community life; thereby, creating obstacles in everyday life. There are many causes of TRSE, and these can include:

- Fragmentation;
- Unreliability of transportation;
- High costs within the public transport system;
- Poor conditions for walking, cycling, and wheeling in car dominated environments; and
- High levels of dependency that results from poor conditions for walking, cycling, and wheeling.

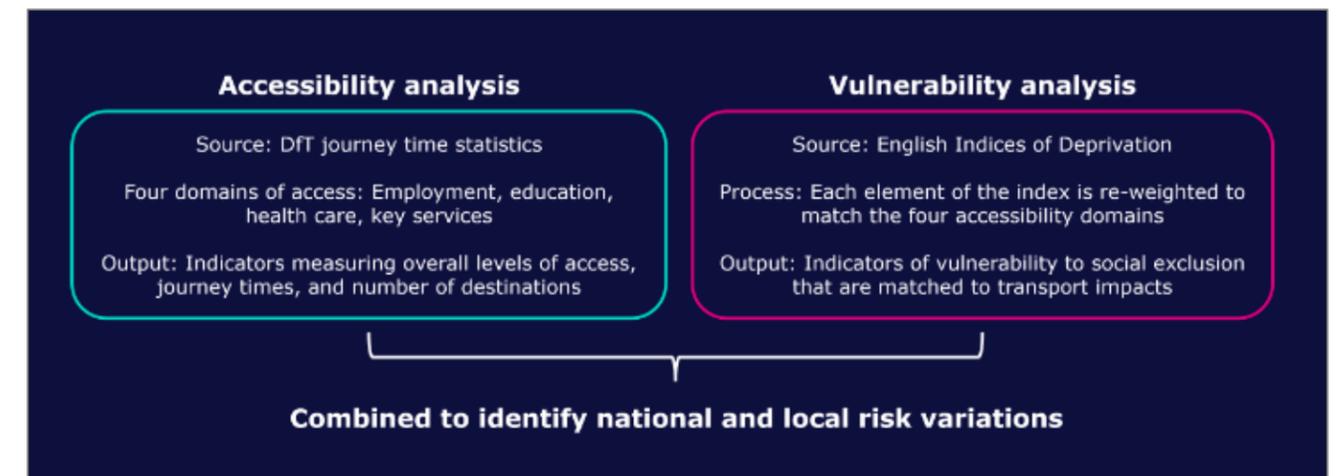


Figure 3-21 What is included within the TRSE calculation (TfN)

Figure 3-21 shows the different information that TfN include in calculating TRSE. This includes four domains of access, including employment, education, healthcare, and key services to analyse accessibility and journey times and number of destinations of these services. For vulnerability, each element of the index is re-weighted to match the four accessibility domains and are then matched to transport impacts.

Transport for the North have a TRSE tool as shown in Figure 3-22 that can be used to assess how the risk of TRSE varies across local areas³², which is based on 2019 data. For Cheshire East, 7.1% of the population live in areas with high risk of TRSE, which is much lower than 18% for England.

³² Transport-related social exclusion in England - TfN

Figure 3-23 shows how the risk of TRSE varies in Cheshire East, compared with an area average. A higher risk means that a greater proportion of residents are likely to be affected by TRSE, and that those affected are likely to be more severe. Figure 3-23 shows that north of Crewe, Sandbach, Middlewich, Congleton, north of Macclesfield, Knutsford and Handforth are areas of high TRSE risk with more than 100% above local average. This demonstrates that the barriers for accessing transport within Cheshire East may be resulting in significant transport-related social exclusions that need to be addressed within the borough. This impacts access to job opportunities, can contribute to poverty, stress, and anxiety. Therefore, an equal, accessible and efficient transport system is required to ensure nobody is left behind by reducing TRSE. Further information on how Cheshire East can create an accessible transport system can be found in section 4.

More recently in 2022, TfN carried out research where 3,000 individuals from diverse areas and communities were asked different questions to provide an in-depth empirical examination of TRSE across the North. Those with mobility difficulties have experiences issues with pavement conditions such as broken and uneven pavement surfaces. This has led some individuals not being able to travel independently and in some cases inhibiting their ability to independently access public transport. Data published by DfT shows that average public transport costs have consistently increased above the level of inflation and wage growth, and above the equivalent costs for car use. Increases in cost prohibits necessary journeys and have knock on effects and consequences for the social inclusion of those still able to travel. Some individuals described having to give up work due to the cost of commuting to work via public transport being too high and having to sometimes choose between accessing work and heating their homes.

It is expected that TfN will refresh the TRSE information at the end of 2024 and it is expected that even in areas that were previously lower risk areas, the issue will become more widespread. There is evidence that cuts to local public transport systems across the north of England and rising pressures on household finances are causing significant and entrenched social exclusion³³.

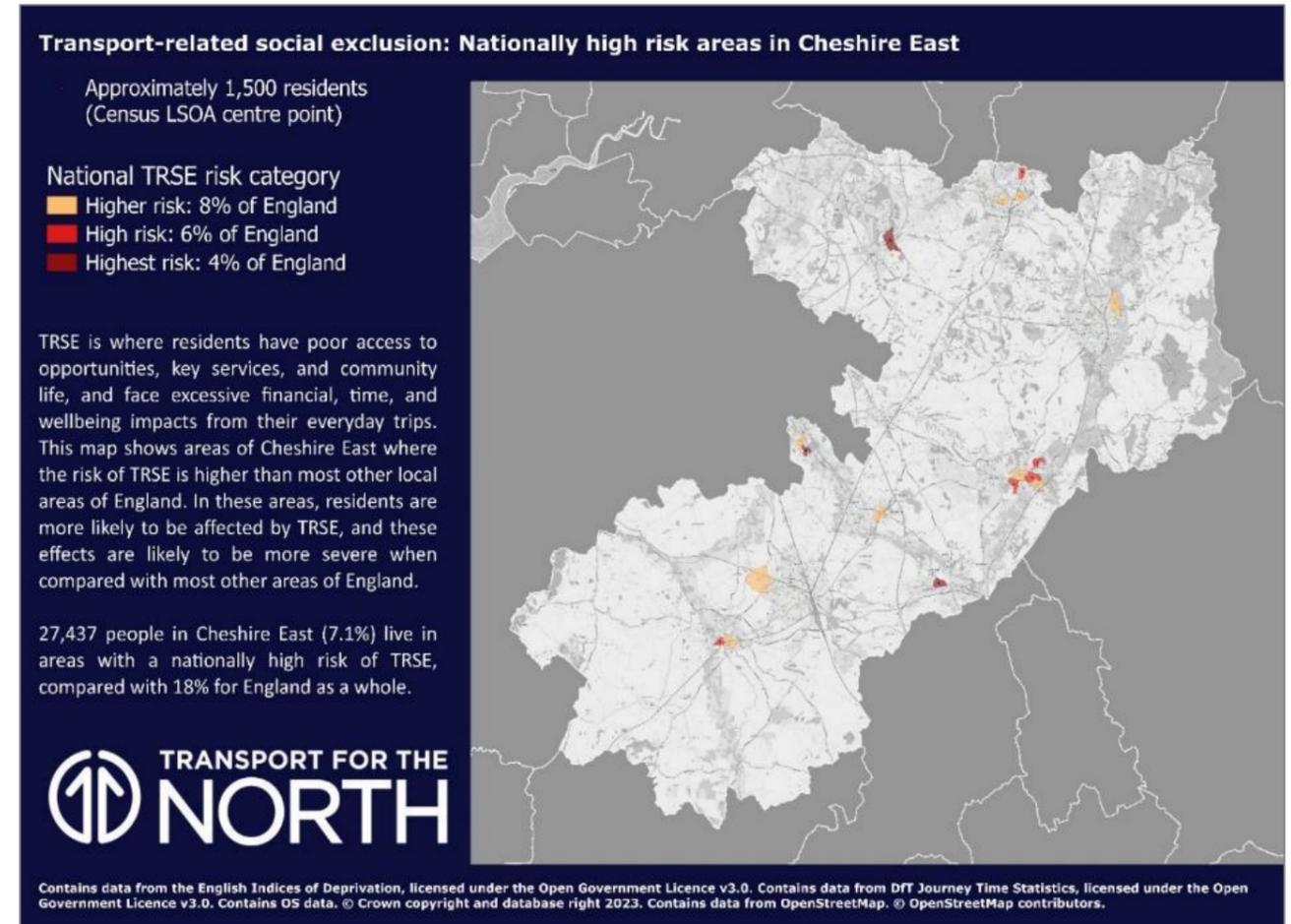


Figure 3-22 Nationally high-risk areas of TRSE in Cheshire East

³³ [Transport and social exclusion in the North in 2023/24 - TfN](#)

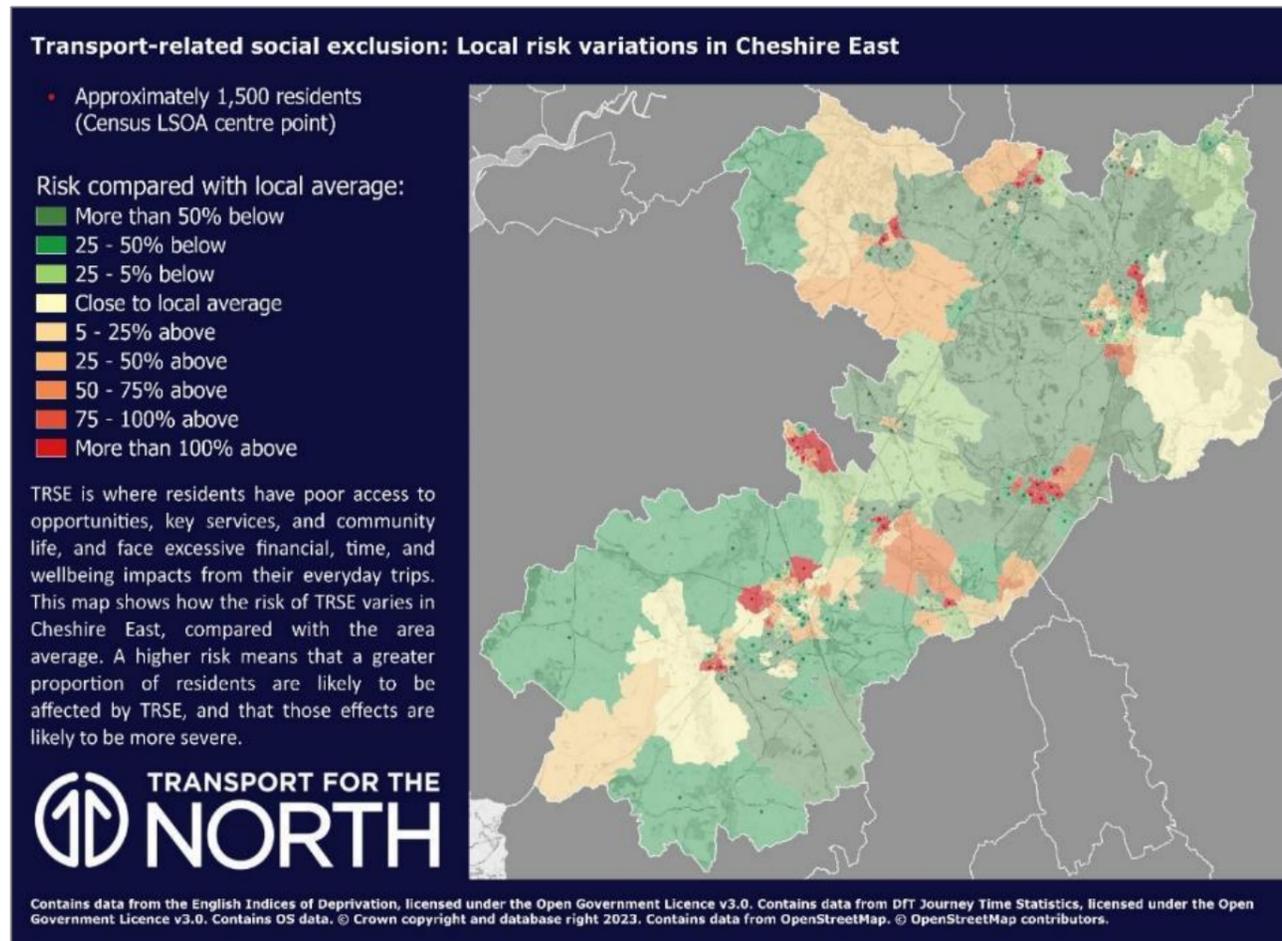


Figure 3-23 Local TRSE risk variations in Cheshire East

3.3.2 Average number of trips by mobility status

The National Travel Survey (NTS) 2021³⁴ in Table 3-9 shows the average number of trips by mobility status (trips per person per year) and main mode of transport for ages 16 and over³⁵. For individuals with mobility issues, driving a car or a van is the most popular mode of transport, whilst cycle, bus and rail have the lowest number of trips per year. This illustrates that individuals with mobility issues tend to choose to travel by driving by car or van rather than sustainable transport; this often engenders high private car usage. This can be perceived as being more convenient, direct, and less likely to face physical barriers compared to travelling via public transport. For example, the lack of mobility provisions such as lifts, step-free access to train station platforms or lack of ramps to get on and off buses. This is covered in more detail within section 4.

Interestingly there is little difference between the number of trips taken by bus for those with and without mobility difficulties. However, the number of trips by rail, car, cycle, and walking are significantly lower for those with a mobility

difficulty compared to those without. Therefore, it is essential that well connected, accessible bus routes, active travel routes, rail stations and services are provided around Cheshire East to better serve those with mobility difficulties.

Table 3-9 Average number of trips by mobility status (trips per person per year)

Mobility Status	Walk	Cycle	Car or van driver	Car or van passenger	Bus	Rail
Mobility difficulty	131	2	177	119	19	2
No mobility difficulty	243	17	389	97	18	14

3.3.3 Lived experiences of barriers to accessing transport

Flexi Link³⁶ is provided by Cheshire East Council and it is a flexible bus service for Cheshire East residents who are either disabled, over 80 or cannot use public transport. However, this service has some limitations:

- Advanced booking where individuals must book at least 24 hours in advance; and
- Reduced operating hours between 9:30am-2:30pm, therefore individuals may feel they can become isolated due to not being able to use this service outside of these hours.

The Cheshire East Community Joint Strategic Needs Assessment (JSNA) Report³⁷ has further findings of negative experiences of public transport that disabled individuals and the elderly have experienced. These include:

- Not enough suitable seating on public transport for those who cannot stand for long periods of time;
- Bus stops not having suitable timetables; and
- Dropped kerbs at stops which causes issues for wheelchairs.

3.3.4 Disability

The information in Figure 3-24 shows the percentage of individuals in each LSOA that are classed as Disabled under the Equality Act³⁸, taken from the 2021 Census. Cheshire East has a lower proportion of residents who have a registered disability compared to the North West, however it is similar to the national average of 17.3%.

Figure 3-24 shows areas with the largest number of individuals who are classed as Disabled under the Equality Act and have no access to a car or van are concentrated around Crewe, south of Macclesfield, Handforth and Congleton. There is a correlation between high levels of disability and areas of deprivation. This should be considered when developing transport schemes that are inclusive in these areas of strategic need. The LTP should look to address these existing challenges to ensure a more inclusive transport network. More information on the current transport network can be found in section 4.

³⁴ National Travel Survey: 2021 - GOV.UK

³⁵ Average number of trips by mobility status and purpose 2021

³⁶ Cheshire East Flexible Transport Service

³⁷ Community JSNA Transport Project 2020

³⁸ Disability by car or van availability - ONS

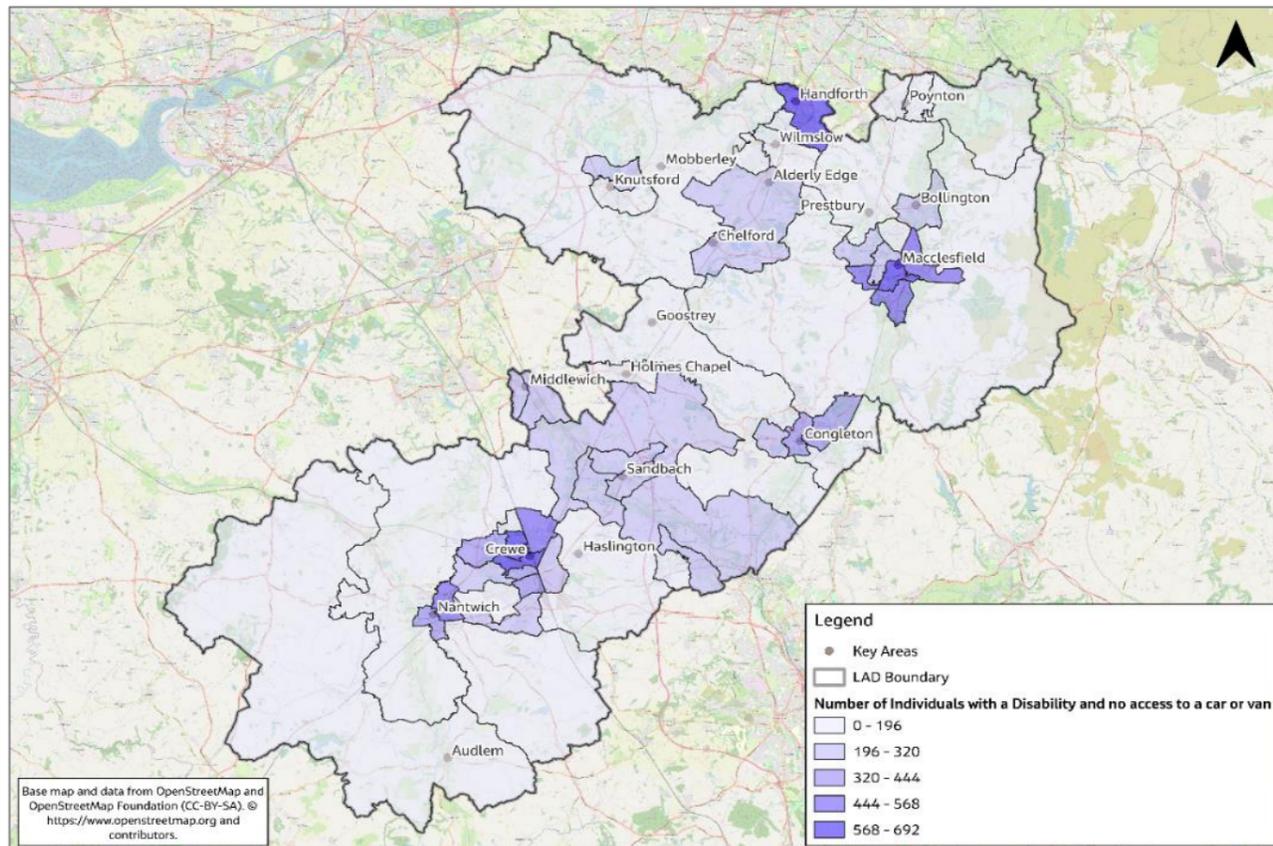


Figure 3-24 Number of individuals with a disability and no access to a vehicle (Census 2021)

Table 3-10 Percentage of individuals with a disability and those with no access to a vehicle in Cheshire East

	Cheshire East	North West	England
Percentage of individuals disabled under the Equality Act	17.0%	19.4%	17.3%
Percentage of individuals disabled under the Equality Act who have no access to cars or vans in household	20.7%	30.6%	27.9%

Table 3-10 shows that 20.7% of individuals that are disabled in Cheshire East have no access to a car or van in their household; whilst this is lower than the North West and England, it presents a challenge for this vulnerable group. It highlights the need for a cohesive, accessible public transport network for all in the borough – including those with disabilities which the previous data has shown suffer a higher risk of social isolation and poor standards of living.

3.3.5 Access to key amenities

Figure 3-25 shows the percentage of the North and Cheshire East's population able to access key services within a certain timeframe, provided by TfN.

The data shows that the majority of Cheshire East's population (over 99%) can access an employment centre with at least 5,000 jobs in 30 minutes and that the entire borough's population can access a hospital in 30 minutes by car.

However, for accessing an employment centre with at least 5,000 jobs in 30 minutes via public transport the percentage of the population being able to access is 55% which is much lower. When accessing a hospital, 100% of Cheshire East can access a hospital within 30 minutes by car and 95.51% by public transport.

Comparing the North and Cheshire East shows that for the majority of services, both populations have a very similar percentage of the population that is able to access the services. However, a much smaller percentage of the North can access a hospital in 30 minutes via public transport, 37.5% in the North and 95.51% in Cheshire East. This shows that in terms of hospitals, there are good links connecting individuals to this service compared to the North.

In order to ensure more of the Cheshire East population can access essential services via public transport, it is essential that the barriers to accessing public transport are addressed. This can include integrating public transport with other modes (e.g., walking, cycling) by improving footpaths, cycle lanes, and seamless connections between buses and trains. Further analysis on how Cheshire East can improve modal share via walking and cycling can be found in Sections 4.1 and 4.2.

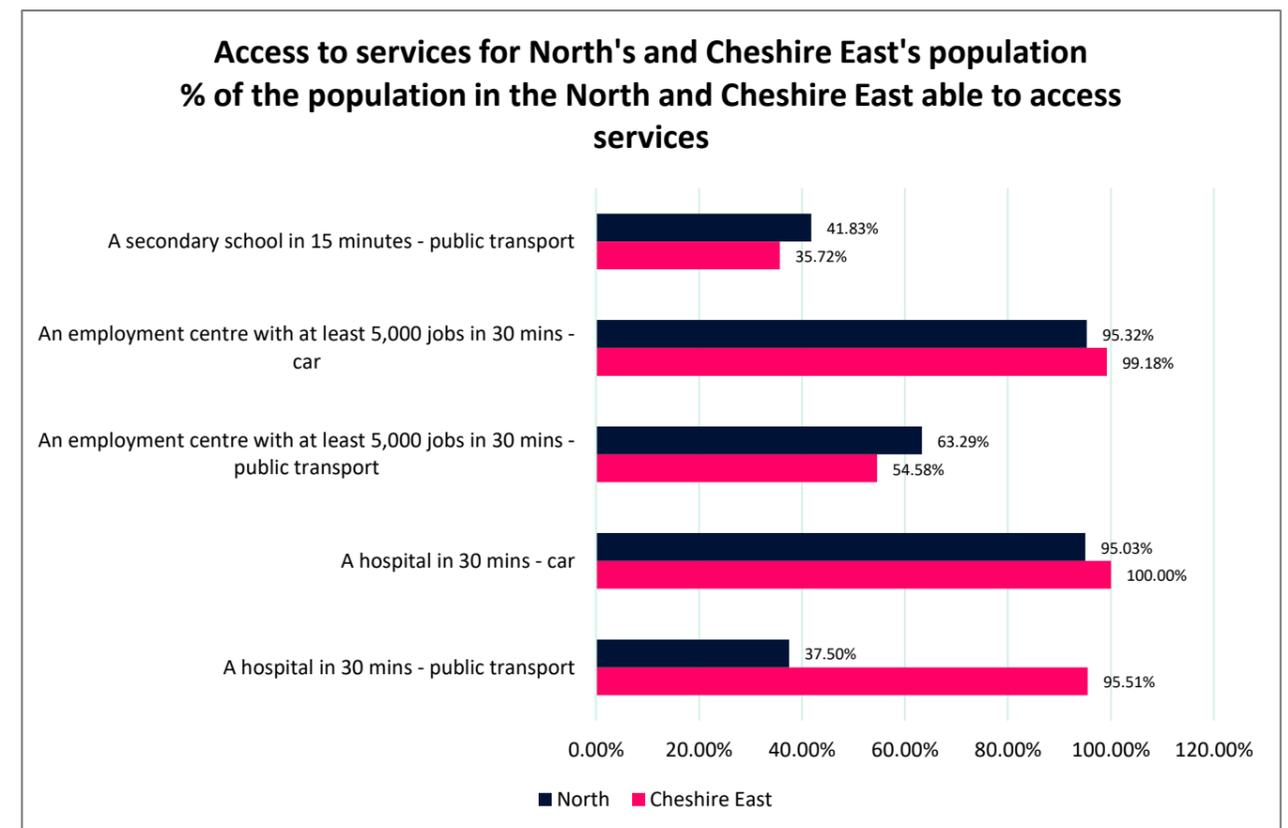


Figure 3-25 The percentage of the North and Cheshire East's population able to access services via different modes of transport (TfN)

Journey time

Journey time statistics³⁹ look at the time it takes to access key local services, for example employment centres, educational establishments, GPs, and town centres. It is essential that if journey times take too long to walk to these key local services, accessible public transport and active travel is available so everyone can access services no matter where they live. Maps for these various services can be found on the pages below.

Journey Time to the Closest Town Centre

Figure 3-26 and Figure 3-27 show travel time in minutes to the closest town centre via cycling and walking. As would be expected the areas closest to towns within Cheshire East have the shortest distance to travel to the closest town centre. As distance increases from these urban areas and into more rural areas, cycling and walking time significantly increases. This can be seen in Audlem, Holmes Chapel and Goostrey where it takes 25-50 minutes to cycle and 90-120 minutes to walk to the closest town centre. Due to this long journey time, it is essential individuals can access towns via public transport, so they are able to access the essential amenities located within the town centres. Further analysis of accessibility of the transport network can be found in section 4.

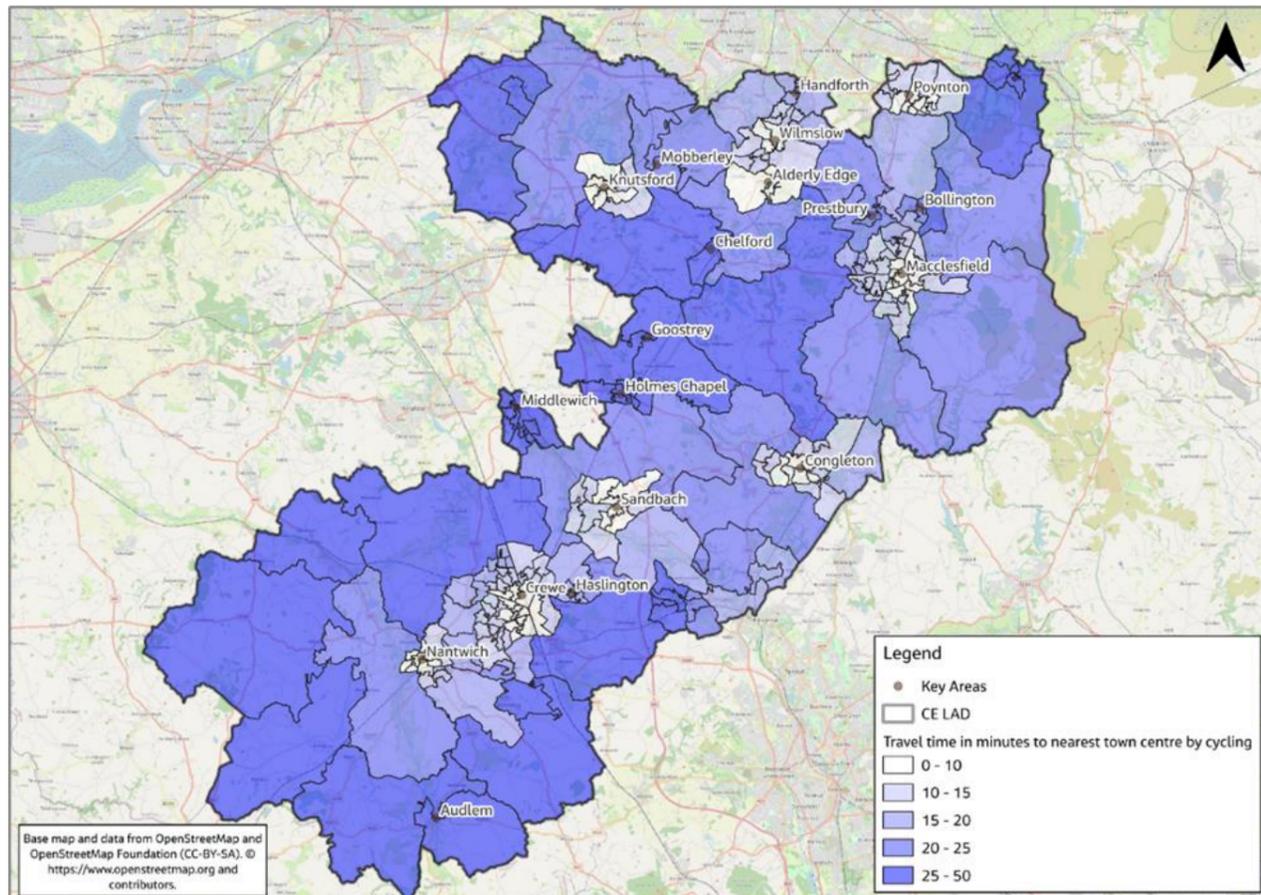


Figure 3-26 Travel Time in Minutes to Nearest Town Centre by Cycling

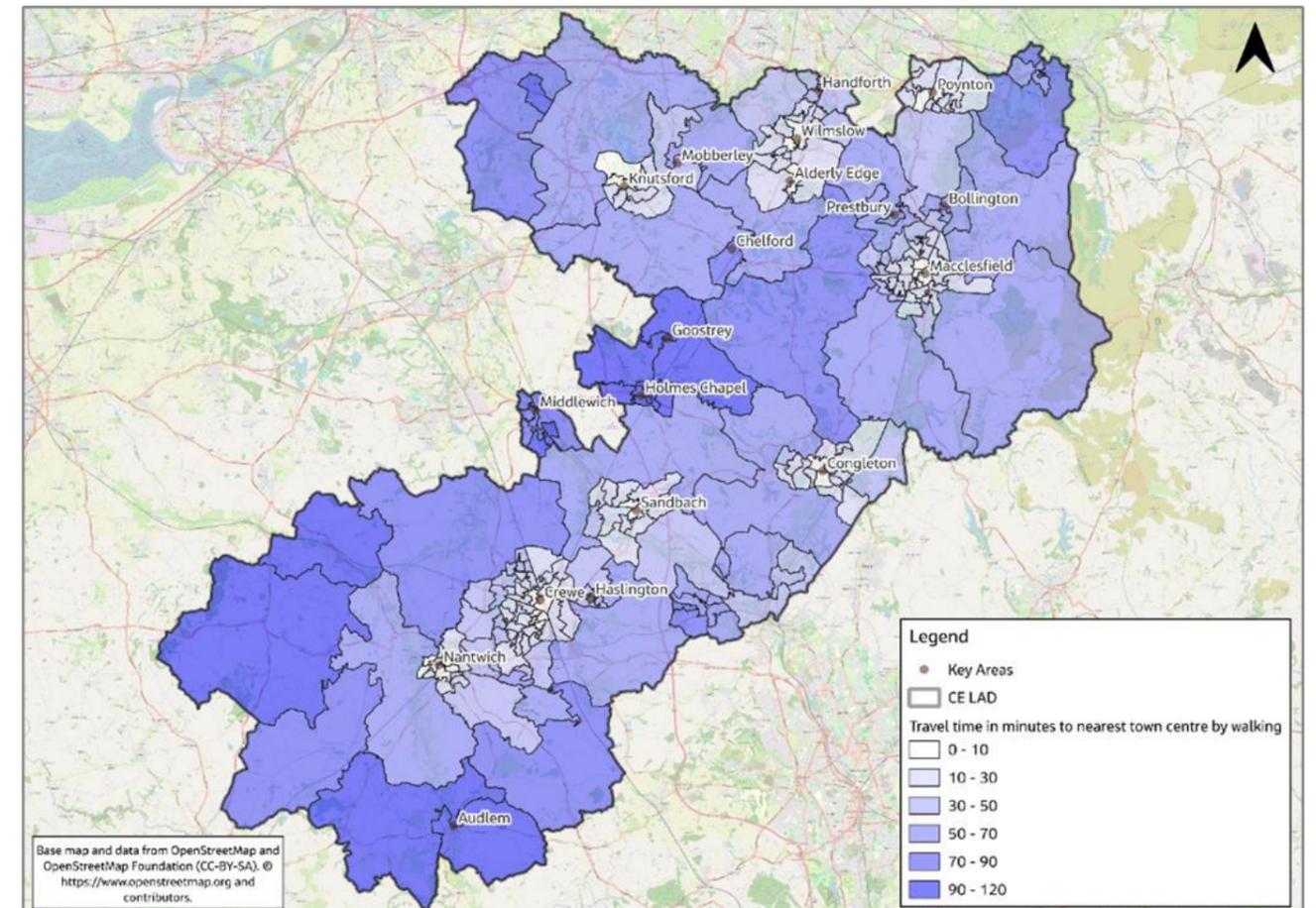


Figure 3-27 Travel Time in Minutes to Nearest Town Centre by Walking

Travel Time to Closest GP Surgery

Figure 3-28 and Figure 3-29 show travel time in minutes to the closest GP by walking and cycling. The maps show that journey times for walking and cycling to the closest GP Surgery is shorter compared to journey times to town centres. In terms of cycling, LSOAs surrounding towns are around a 5 to 15-minute cycle from their closest GP, but LSOAs located on the outskirts are up to 25 minutes away from their closest GP via cycling. With an improvement in active travel, cycling has the chance to become a viable option for individuals to access healthcare facilities. In terms of walking, those LSOA in towns within Cheshire East are around a 0 to 10-minute walk away from their closest GP Surgery, for example Nantwich, Knutsford, Sandbach, Macclesfield, Bollington etc. LSOAs that are further away from town centres have a much longer walking and cycling journey time. This can be seen in areas west of Nantwich, west of Crewe, south of Macclesfield etc where it would take 60-75 minutes to walk to the closest GP Surgery. Therefore, it is essential that the public transport network in these areas provides regular accessible services into the towns of Cheshire East, so individuals can access healthcare facilities if they cannot walk or drive their own private vehicle. Further analysis of accessibility of the transport network can be found in section 4.

³⁹ [Journey time statistics, England: 2019 - GOV.UK](https://www.gov.uk/government/statistics/journey-time-statistics-england-2019)

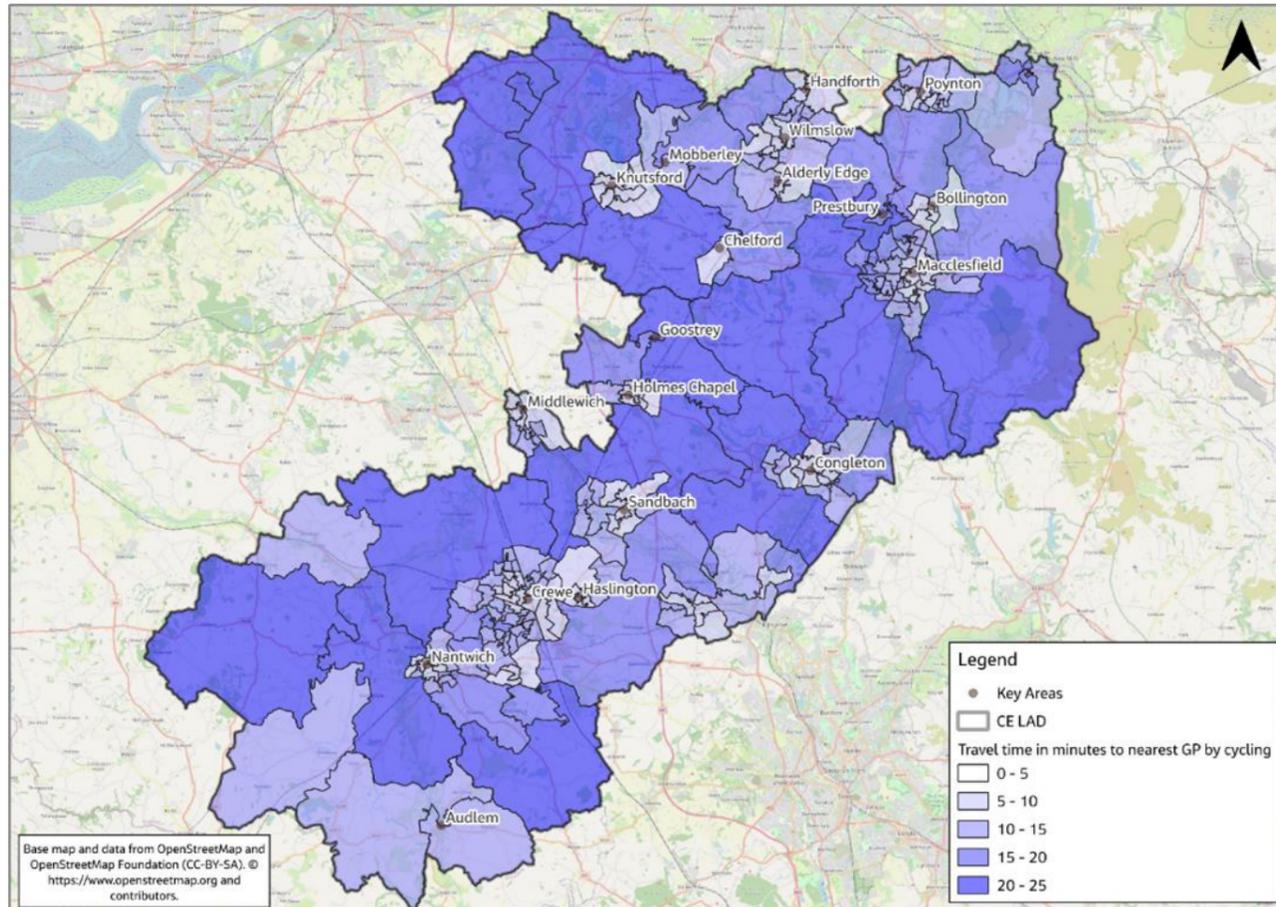


Figure 3-28 Travel Time in Minutes to Nearest GP by Cycling

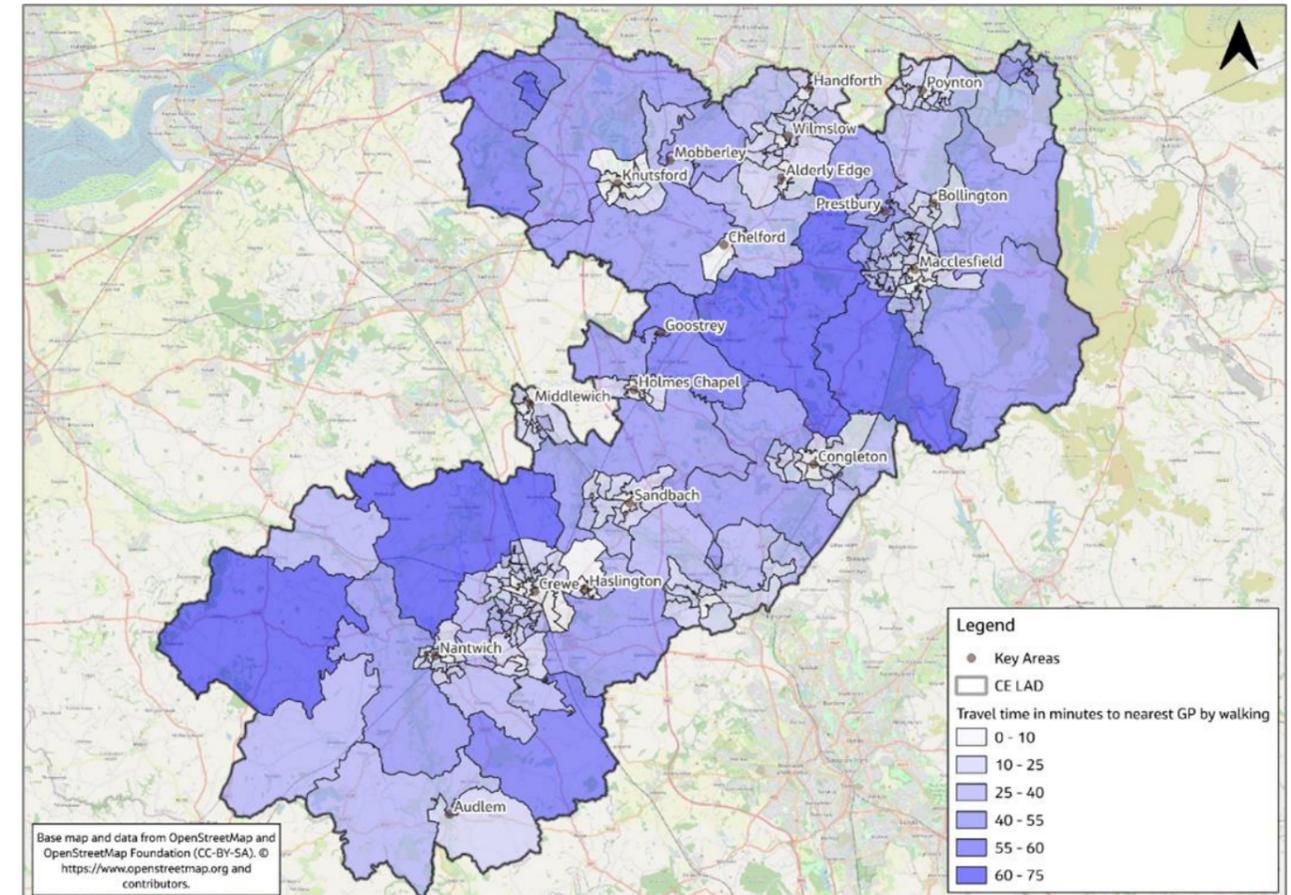


Figure 3-29 Travel Time in Minutes to Nearest GP by Walking

Journey Time to the Closest Employment Centre

Figure 3-30 and Figure 3-31 shows the travel time in minutes to the closest employment centre with 500 to 4999 employees. The maps show that journey time for walking and cycling to the closest employment centre is shorter for LSOAs closer to urban areas within Cheshire East. This can be seen around Knutsford, Nantwich, Haslington and Macclesfield; where individuals only have to walk 10 minutes to their closest employment centre. For cycling those individuals living in Knutsford, Middlewich, Nantwich, Crewe, and Macclesfield only have to cycle 5 to 10 minutes to reach their closest employment centre. In comparison, the further away LSOAs are from urban centres in Cheshire East the longer the journey time is to individuals' closest employment centre. Towns such as Audlem, north of Crewe and south west of Nantwich have a cycle time of 20-25 minutes and a walking time of 50 to 70 minutes. Therefore, it is essential there is an extensive and accessible public transport network within Cheshire East so individuals who live too far to walk or cycle to work can access employment opportunities and are not excluded from employment opportunities within the borough. Further analysis of accessibility of the transport network can be found in section 4.

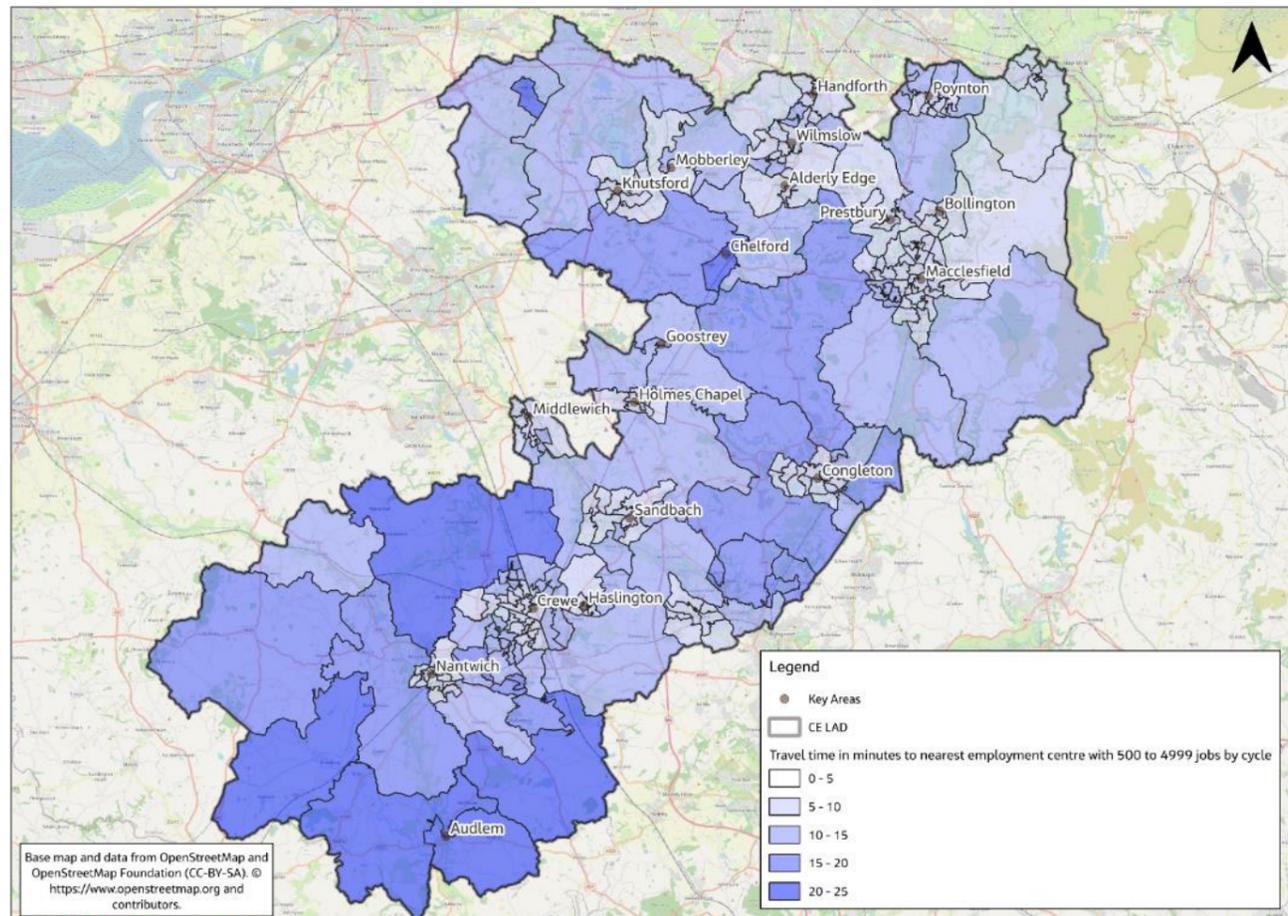


Figure 3-30 Travel Time in Minutes to Closest Employment Centre by Cycling

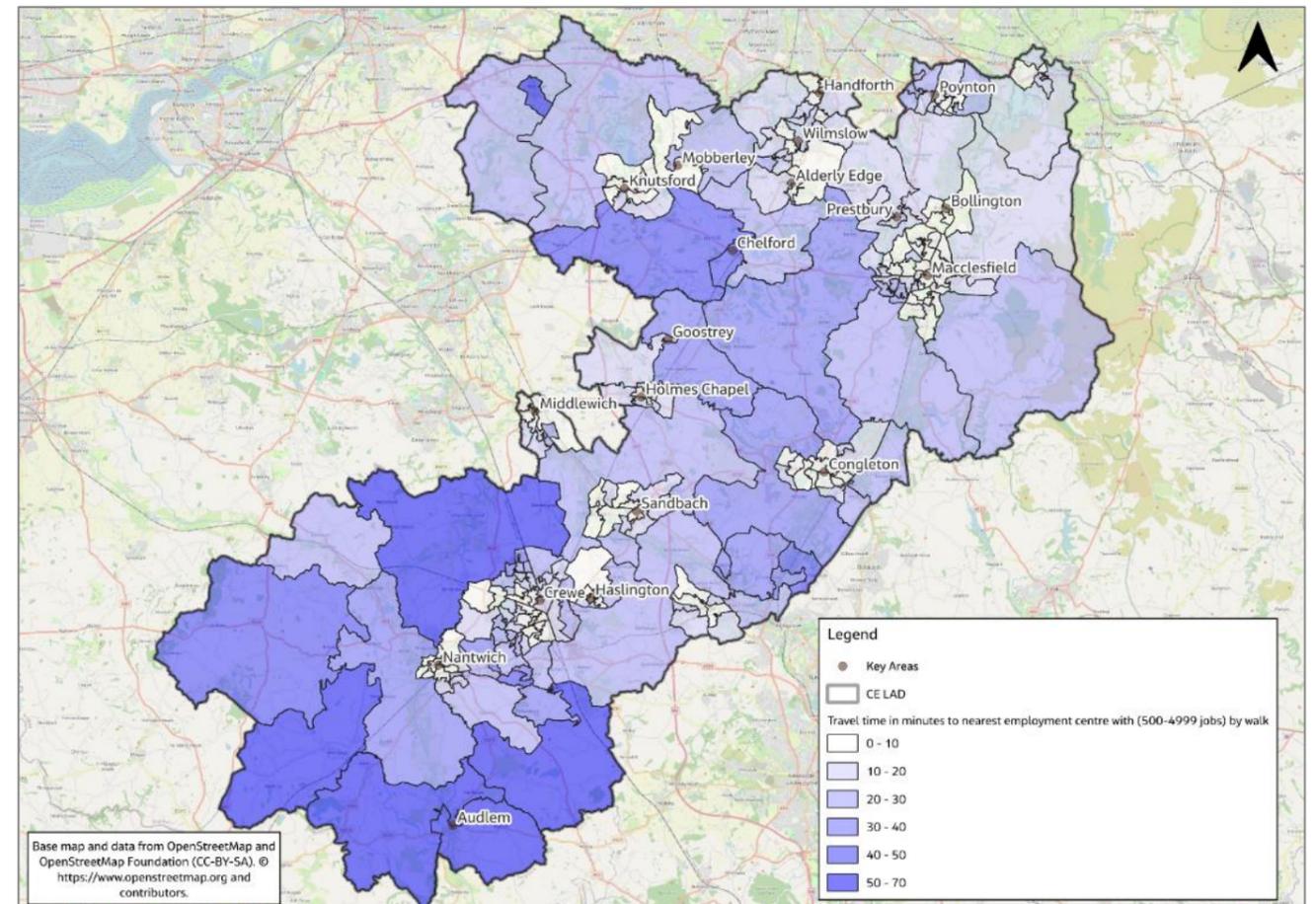


Figure 3-31 Travel Time in Minutes to Closest Employment Centre by Walking

3.3.6 Capacity for mode shift

Figure 3-32 shows the capacity for mode shift across Cheshire East, which comes from the Transport for the North (TfN) Clean Mobility Tool⁴⁰. The model is described by TfN as follows: “The capacity for mode shift model identifies areas where mode shift & demand management policies are more likely to be effective and suitable.” TfN derive capacity for mode shift from population density, income and health deprivation and public transport access. Typically, areas with a low capacity for mode shift have two or more of the following features:

- Lower population densities
- Higher levels of income deprivation and health deprivation
- Relatively poor access to key destinations with the public transport options available

A low capacity for mode shift “means that residents are less able to choose alternatives to car use, and that significant support and investment may be required to enable mode shift & demand management policies”.

⁴⁰ TfN Clean Mobility Tool

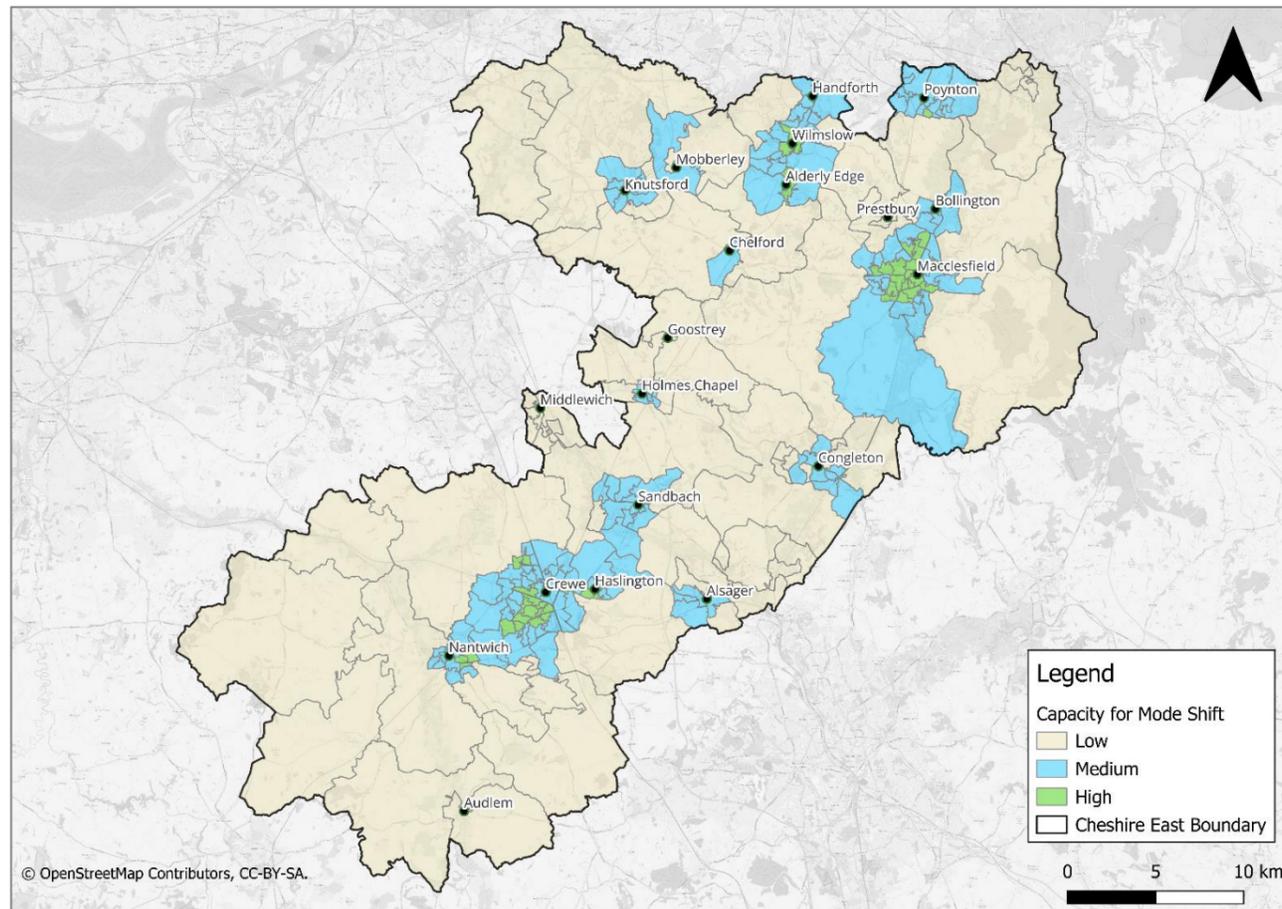


Figure 3-32: TfN - Capacity for Mode Shift

31% of residents in Cheshire East have a low capacity for mode shift, which equates to 119,087 residents. As shown in Figure 3-32, these residents are primarily located in rural and semi-rural areas, as well as Middlewich and Audlem. It is more likely this low capacity for mode shift is due to lower population densities and relatively poor access to key destinations with the public transport options available. Significant investment and support may be required to enable mode shift and demand management policies in these areas as residents are less able to choose alternatives to car use.

40% of residents (153,661 residents) have a medium capacity for mode shift, and as shown in Figure 3-32 these residents are located in locations such as Knutsford, Poynton, Holmes Chapel, Congleton, Sandbach and Alsager. According to the Clean Mobility Tool, urban cities, and towns with a medium capacity for modal shift typically have two of the following features:

- Lower population densities
- Lower levels of income deprivation and health deprivation
- Relatively good access to key destinations with the public transport options available

As shown in Figure 3-4 population density is relatively low in these areas compared to other towns in Cheshire East, it is also likely that these areas have lower levels of income and health deprivation, which is evidenced in Figure 3-11, and relatively good access to key destinations with the public transport options available. As set out by TfN, medium capacity areas “means that residents should be able to choose alternatives to car use for some journeys if appropriate policies are implemented.”

29% of Cheshire East’s population (111,405 residents) has a high capacity for mode shift, and as shown in Figure 3-32, these residents are in the centre of areas such as Macclesfield, Crewe, Nantwich, Wilmslow and Alderley Edge. According to the Clean Mobility Tool, urban cities, and towns with a high capacity for modal shift typically have all three of the following features:

- Higher population densities
- Lower levels of income deprivation and health deprivation
- Relatively good access to key destinations with the public transport options available

This means that these areas typically have higher population densities, lower levels of income deprivation and health deprivation and relatively good access to key destinations with the public transport options available. TfN suggest that in high-capacity areas “this means that residents are more able to choose alternatives to car use for everyday journeys if appropriate policies are implemented. Relatively faster and larger change may be possible in these areas, depending on local factors.”

3.4 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below.

Table 3-11 Summary

Section	Key Findings	Implications for the LTP
3.1.1	The Cheshire East population is growing at a faster rate compared to North West and England.	This places additional stress on the transport system to accommodate anticipated growth and future developments. For sustainable growth, the LTP should implement strategies to ensure a more reliable and accessible transport system, alongside ensuring the LTP and forthcoming Local Plans are complementary.
3.1.4	Cheshire East's rural population has increased by 12.7% between 2011 and 2021.	Cheshire East's transport system needs to connect these more rural areas to services to ensure individuals have access to key amenities and life opportunities.
3.1.5	Cheshire East has an aging population with 18.4% of the population are aged 65 and older.	This highlights a key demographic trend with a need to ensure older people have access to reliable and affordable public transport and are not excluded from the transport system.
3.1.6	The IMD demonstrates large differences in Cheshire East with most areas falling into the affluent categories, however there are also some of the most deprived areas nationally within the borough (e.g., areas of Crewe).	Better transport connections and infrastructure are required to ensure equal opportunities for access to jobs, healthcare, and education for deprived areas. In particular, more deprived areas are more reliant on non-car-based travel, and this should be considered further in the LTP.
3.1.8	Cheshire East is very varied across the borough in terms of people types.	The difference in people types and places across the borough shows the need for Cheshire East to cater for all individuals in relation to travel and transport across the borough and ensure it is accessible, efficient, and reliable for everyone. There are also cultural aspects to consider in terms of varying viewpoints of travel choices and propensity to use more sustainable modes of transport.
3.2.2	Adult obesity in Cheshire East, North West and England has similar prevalence rates. Child obesity levels are slightly lower compared to the North West and England. Although these figures are in line with other areas this is still relatively high and leads to multiple health issues.	By providing a cohesive transport network and improving active travel infrastructure, individuals' physical activity and wellbeing can be increased, in turn reducing the obesity and morbidity rates in the borough.
3.2.6	According to The Tartan Rug, in terms of health and wellbeing, Crewe has 58% of wards in the worst 40% of wards nationally. However, there are other key service centres in Cheshire East, such as Wilmslow and Poynton which have a large percentage of wards in the best 40% of wards nationally.	This uneven split in Cheshire East in terms of health and wellbeing shows that there is a lot of inequalities between the different towns. This shows that there needs to be targeted interventions unique to each area to address the disparities, whilst ensuring there is equitable access to healthcare services, education, employment, and income equality.
3.3.1	7.1% of areas within the borough are at a high risk of TRSE.	This impacts job opportunities with increased risk of poverty, financial hardship, or anxiety. A well-connected accessible transport system and good digital connectivity with particular focus on areas with high risk of TRSE would improve economic activity and overall standards of living.
3.3.2	Areas with the largest number of individuals classed as disabled under the Equality Act who have no access to a vehicle are concentrated around Crewe, south of Macclesfield, Handforth and Congleton. 17% of the population is classed as disabled under the Equality Act, which is lower compared to the North West and England. Of the 17% of individuals disabled under the Equality Act, over 20% of individuals have no access a vehicle in their household.	Ensuring transport is inclusive and accessible – especially in areas of strategic need – and with a focus on public transport, walking and cycling.
3.3.3	Driving a car or a van is the most popular mode of transport for those with mobility issues, with bus use being a similar level to those without mobility difficulties.	The transport network needs to be accessible and provide options for those individuals with disabilities to use active travel and public transport to ensure they can access their daily needs. This can be in the form of providing demand response travel services, ramped access to rail and bus stations and step free access to all modes of travel to ensure all individuals, no matter their disability can use the transport system within Cheshire East.
3.3.5	As would be expected areas closest to urban centres have a shorter journey time to town centres, GP practices and employment centres. More rural areas have longer journey times to these amenities which may limit the ability of individuals to access these services.	Ensure those areas with longer journey times to key services such as GPs and Town Centres have accessible and reliable transport connections alongside digital connectivity to these key services.
3.3.7	The majority of residents in Cheshire East have a medium capacity for modal shift, these residents are located in lower population density areas such as Knutsford, Poynton, Congleton, Sandbach and Alsager. The rest of the population is approximately evenly split between areas of low and high capacity for mode shift. The areas	If appropriate policy is implemented in areas with a high capacity for mode shift, relatively faster and larger change in journey modes may be possible.

Section	Key Findings	Implications for the LTP
	of high capacity for mode shift are situated in the centres of relatively higher density towns such as Macclesfield, Crewe, Nantwich, Wilmslow, Poynton and Alderley Edge.	

4. Improve Transport for All

The transport system for Cheshire East should serve the needs of its communities and the borough's economy through a range of networks, from walking, wheeling and cycling, rail, highways, electric vehicles (EVs) and bus network. This section sets out a baseline position for all modes of travel and sets out an understanding of the potential for mode shift and user experience.

4.1 Walking and Wheeling

4.1.1 Benefits of active travel

Walking and wheeling for transport purposes involves moving as a pedestrian, whether that is walking or wheeling alone, aided by another person, or using some form of mobility aid such as a walking stick or wheelchair. Walking is increasingly promoted as a key form of transport as it derives multiple benefits for the user, their surrounding environment and decarbonisation efforts.

Regular physical activity benefits both physical health, mental health, and wellbeing. The NHS recommends adults aged between 19 – 64 participate in at least 150 minutes of moderate intensity or 75 minutes of vigorous intensity activity a week⁴¹. This can be spread evenly over 4 to 5 days a week or every day. Commuting for 30 minutes as a pedestrian five days a week is one simple way people can achieve this goal.

Beyond health benefits, increased walking is a very cost-efficient way of reducing transport emissions. It improves road network efficiency, reduces congestion, and increases footfall⁴².

Walking or wheeling is often a smaller part of a longer multi-modal journey. For example, as part of the first or last mile of journeys utilising public transport. Therefore, by providing an accessible and extensive walking network, the public transport system as a whole will also benefit from enhanced use associated with improved accessibility.

4.1.2 Walking infrastructure

Cheshire East benefits from an extensive public rights of way network, as set out in 4.1.3, in addition to facilities alongside highway infrastructure. However, there is room for improvement to achieve a higher quality of facilities, and there are issues that need to be addressed for those with mobility issues such as wheelchair and pram accessible footpaths. This can include ensuring there are dropped kerbs, high quality surfaces, tighter junction mouths that minimise speed and distances to be crossed, and tactile paving throughout the borough. Cheshire East is actively working on improving the walking network through various initiatives;

- Active Travel Fund (ATF): DfT allocated funding to enhance walking and cycling routes in line with government design guidance, with Cheshire East receiving almost £2.8m from this fund;
- Annual capital programme with investment to improve walking and wheeling routes through the Active Travel, Sustainable Modes of Travel to School and highways maintenance workstreams; and
- Plans for an improved walking network through Local Cycling and Walking Infrastructure Plans (LCWIPs), the Rights of Way Improvement Plan (ROWIP) and Local Transport Development Plans (LTDPs).

A number of towns have adopted LCWIPs including Crewe, Wilmslow, Congleton, and Macclesfield. These areas were selected for the development of LCWIPs based upon an evidence-based review which identified these areas as having the highest potential to increase walking and cycling. The proposed walking network improvements offer a significant opportunity to increase levels of walking across the borough.

As well as ensuring the walking network is of high quality, it is important to ensure the walking network is well connected to all other modes of travel such as rail and bus. This is due to most modes of travel having some aspect of walking; therefore, it is important to ensure all modes of travel are integrated within each other.

The footway network length in Cheshire East is approximately 2,204km and it split into four categories:

- Type 1 – primary walking routes – 25km
- Type 2 – secondary walking routes – 587km
- Type 3 – link footways – 520km
- Type 4 – local access footways - 1072km

CEC carries out an annual carriageway survey of the network in order to monitor the current condition of the network and assist with the development of annual programmes and lifecycle planning. Currently 33% of the footway network is considered to need maintenance over the next 12 months.

⁴¹ NHS Physical activity guidelines for adults aged 19 to 64

⁴² Cycling and walking can help reduce physical inactivity and air pollution, save lives and mitigate climate change

4.1.3 Public Rights of Way

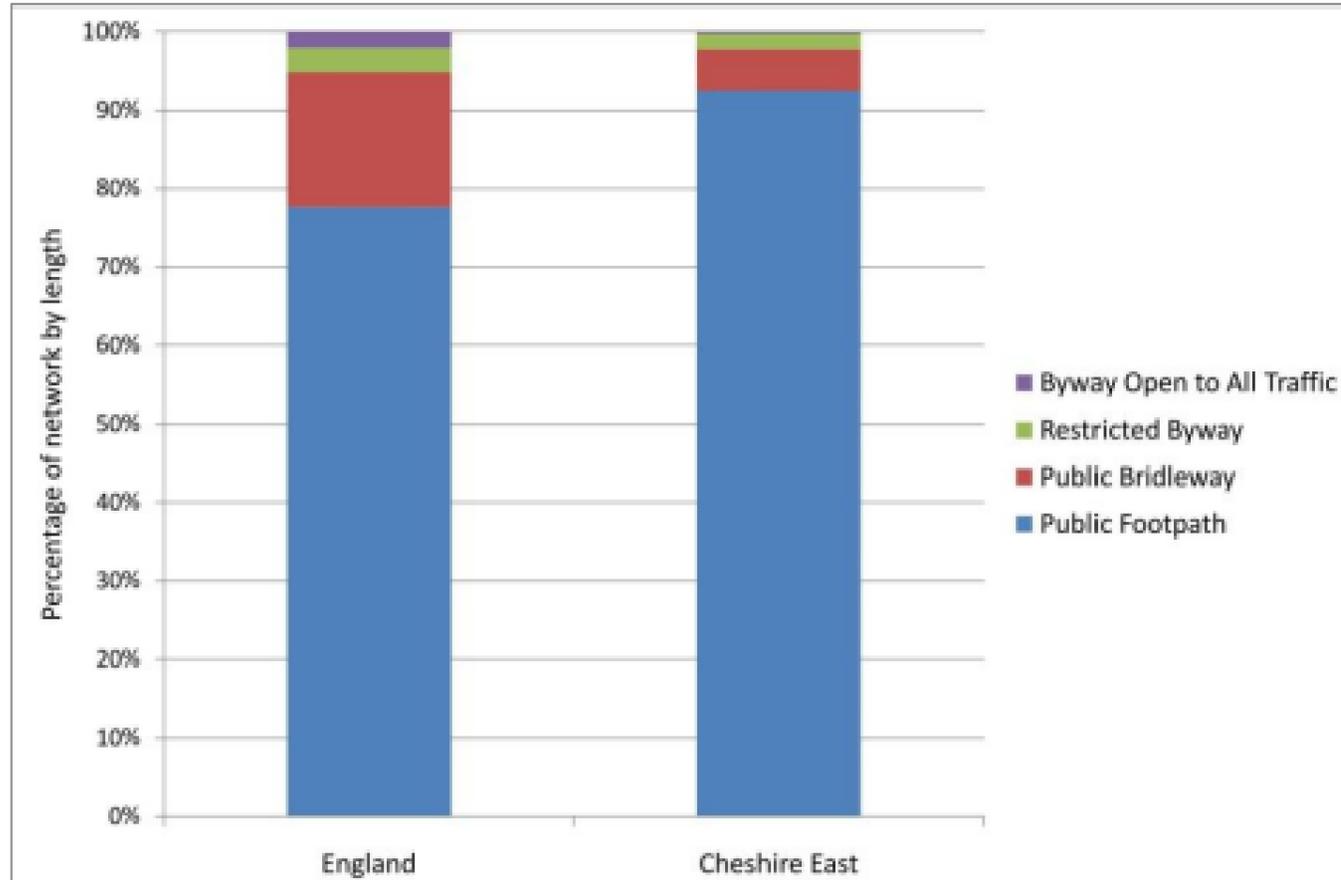


Figure 4-1 Cheshire East composition of the PRoW network compared with England (CEC Rights of Way Improvement Plan)

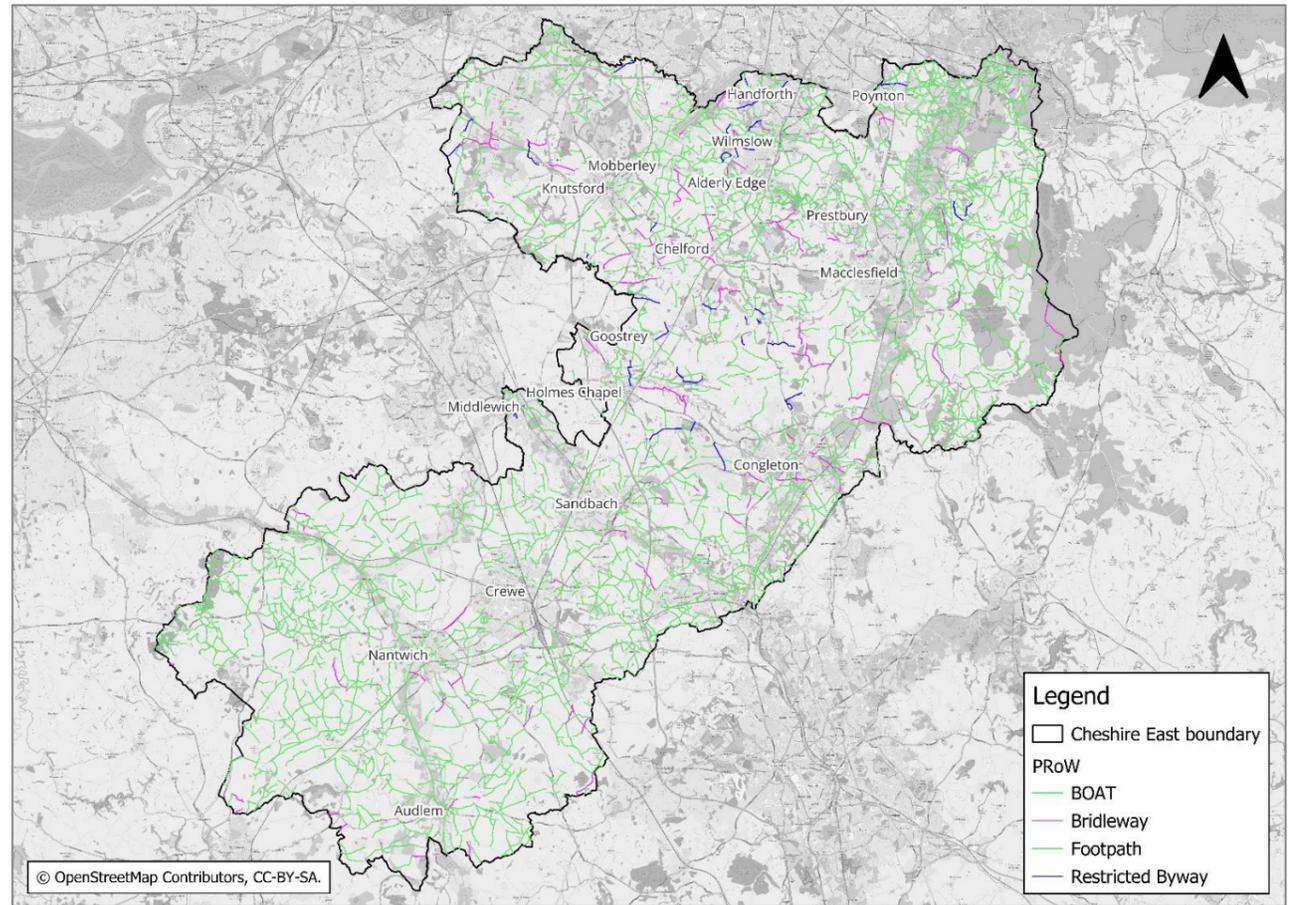


Figure 4-2 Public rights of way in Cheshire East

Figure 4-2 shows the Public Rights of Way (PRoW) network throughout Cheshire East.

The PRoW includes⁴³:

- Footpaths – for walking, running, mobility scooters or powered wheelchairs;
- Bridleways – for walking, horse riding, bicycles, mobility scooters or powered wheelchairs;
- Restricted byways - for any transport without a motor and mobility scooters or powered wheelchairs; and
- Byways open to all traffic (BOATs) - for any kind of transport, including cars.

PRoW provide many benefits to individuals who use them, including providing leisure routes as well as providing access to work, education, and local facilities in some areas. This in turn can benefit the local economy due to an increase in footfall to local businesses. Due to individuals having access to the borough via the PRoW network, walking can be an option instead of using private vehicles, therefore reducing congestion, improving air quality and the lifestyle of individuals within Cheshire

⁴³ Rights of way and accessing land: Use public rights of way - GOV.UK

East. As well as this, PRow allow individuals to improve health and wellbeing due to being able to access the outdoors and take part in physical activity.

Figure 4-1 shows the composition of the PRow network within Cheshire East, compared with England. As shown Cheshire East has a large proportion of public footpaths, making up 93.7% of the PRow network. Figure 4-1 shows that Cheshire East has a higher proportion of public footpaths compared to England as whole and a smaller proportion of routes available to other types of users. Cheshire East's PRow are made up of 1787.8km of public footpaths, 104.4km of public bridleway and 42.3kms of restricted byways and byways open to all traffic⁴¹. The borough is well connected in terms of footpaths which helps facilitate walking more effectively due existing walking infrastructure.

Cheshire East published a Rights of Way Improvement Plan for 2011 – 2026 which assesses the accessibility of local PRow and their ability to meet the present and future needs of the public⁴⁴. It can be difficult to assess the quality of the PRow Network, however a Best Value Performance Indicator was developed to make an overall assessment of Cheshire East's PRow network; this can be found in Figure 4-3. This assessment was conducted by PRow Officers assessing 5% of the network which was selected at random. As shown in Figure 4-3, 70-88% of Cheshire East's PRow is 'easy to use', and this is above the average result for England across all years apart from 2005-06 and 2007-08. It must however be noted this assessment was conducted some time ago. An enhanced quality of the PRow network that is accessible for all and easy to use will increase the attractiveness of the PRow network, and therefore encourage uptake of walking.

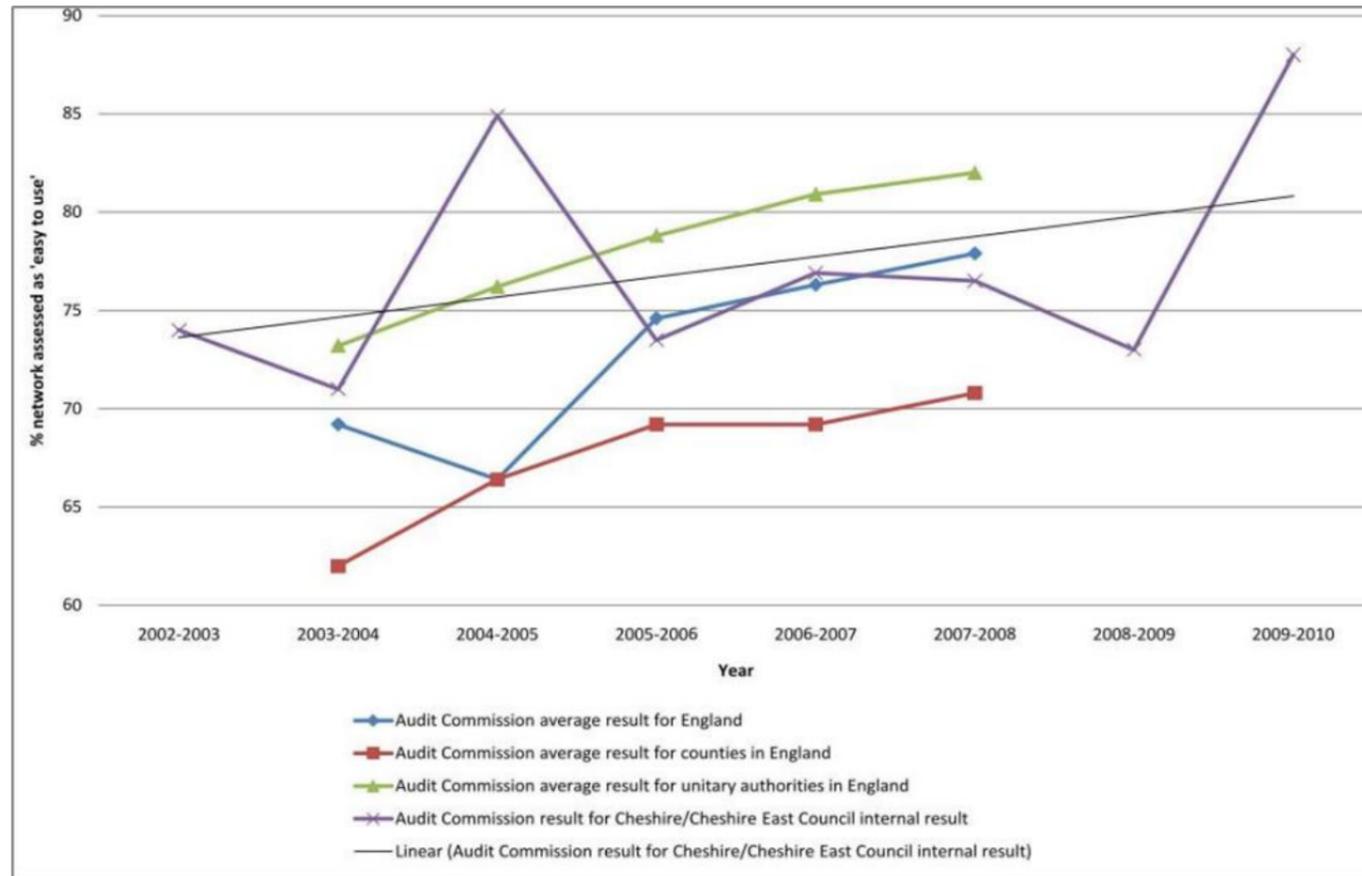


Figure 4-3 Best Value Performance Indicator Results for Cheshire East 2002 - 2010 (Cheshire East) ROWIP)

⁴⁴ Cheshire East Rights of Way Improvement Plan 2011 - 2026

4.1.4 Walking statistics

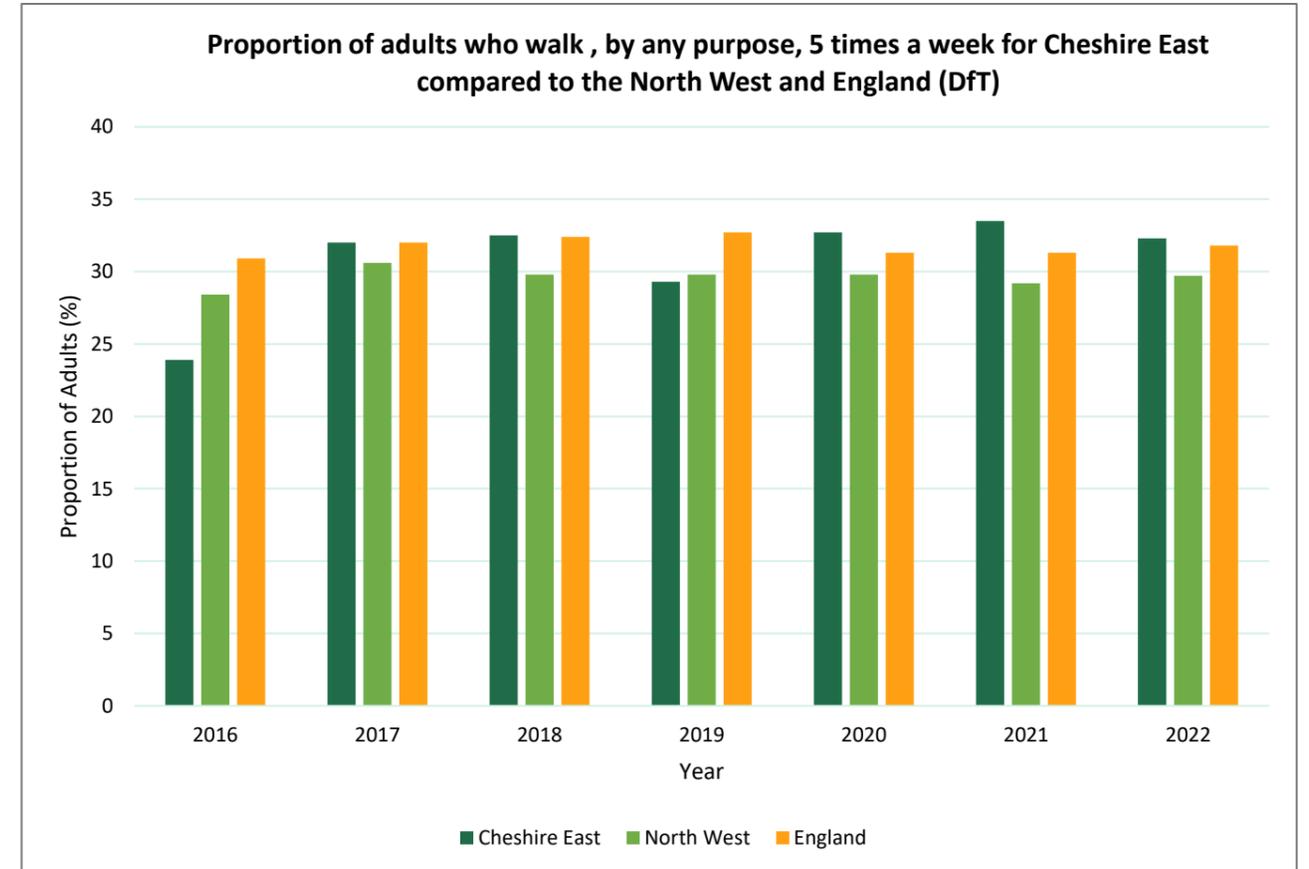


Figure 4-4 Proportion of adults who walk by any purpose five times a week in Cheshire East compared to the North West and England

Taken from DfT household survey on walking statistics that is carried out by Sport England, Figure 4-4 shows the percentage of individuals within Cheshire East, the North West and England that walk over 10 minutes by any purpose (leisure and travel) five times a week⁴⁵ between years 2016 and 2022.

The data in Figure 4-4 shows that the proportion of adults walking in Cheshire East was higher than the North West and England for all years apart from 2016 and 2019. For Cheshire East, the proportion of adults walking by any purpose five times a week peaked in 2021 at 33%. This may have been due to the COVID-19 lockdown restrictions at the time, resulting in more time spent at home and therefore an increased likelihood of walking for leisure purposes. Cheshire East having a higher proportion of adults walking links to Section 3.2.2 which shows that Cheshire East has a lower percentage of overweight and obese adults compared to the North West and England.

Figure 4-4 shows that there is still room for improvement in the walking levels within Cheshire East, given that in 2022, only 30-35% of adults are walking five times per week. It is important that walking infrastructure and facilities are attractive

⁴⁵ Walking and Cycling (TSGB11) - GOV.UK

to try and increase this percentage. Improved infrastructure could come in the form of benches for rest stops, lighting, and an accessible network such as dropped kerbs and wide crossing for example.

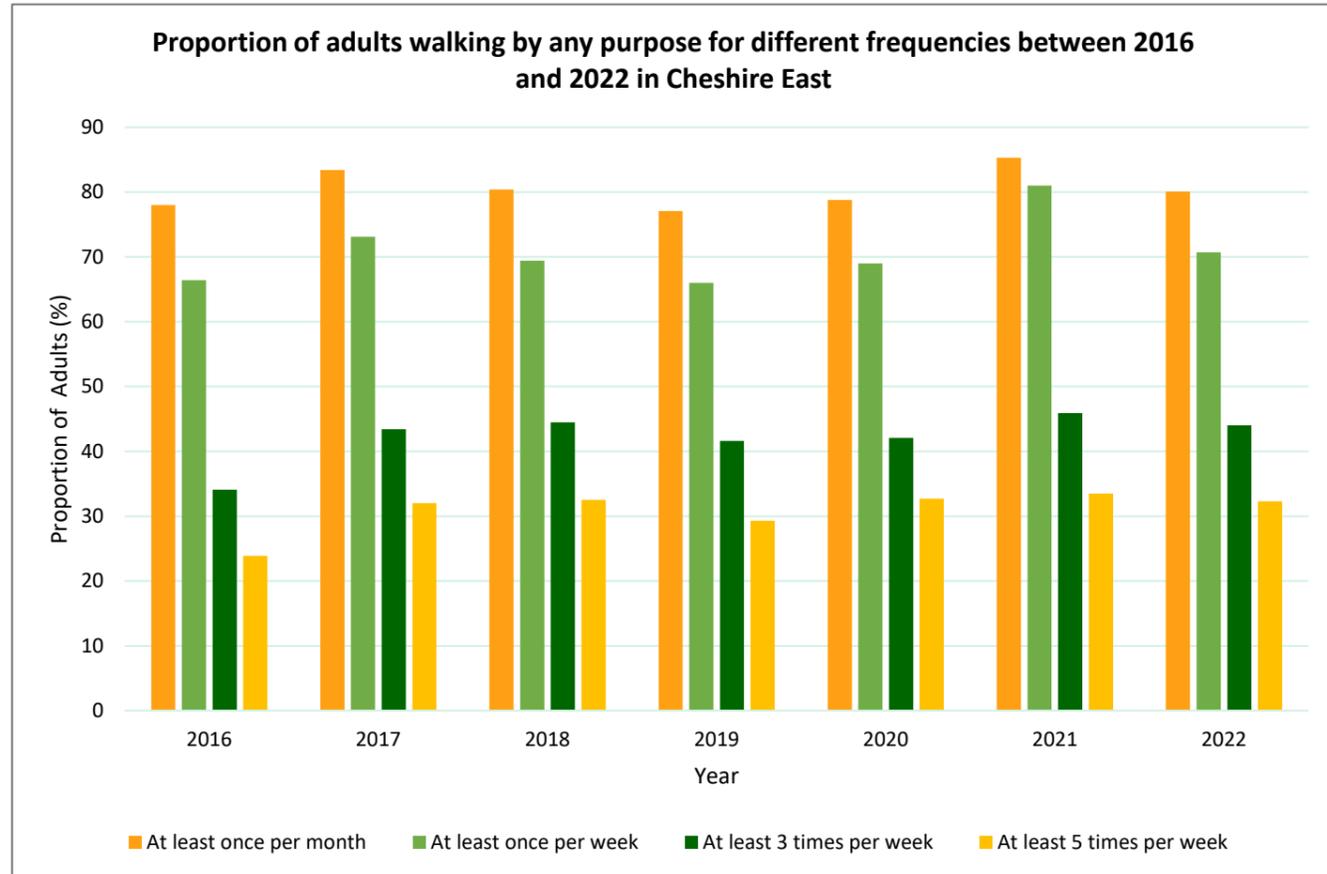


Figure 4-5 The proportion of adults walking by any purpose for different frequencies between 2016 and 2022 in Cheshire East

Figure 4-5 shows similar data but for walking once per month, once a week, at least 3 times a week and at least 5 times per week. The data shows that the highest proportion of adults walking for any purpose is 'at least once a month' and the lowest is 'at least 5 times a week'. Over time, there has not been substantial change in the proportion of adults walking these different frequencies. If walking is to become the natural choice for shorter trips and increase the modal share, this suggests that more needs to be done to encourage uptake of walking and wheeling and promote the benefits of this mode of travel.

Census data also helps us to understand walking proportions. Table 4-1 shows the methods of travel to work taken from the 2011 Census for Cheshire East, the North West and England⁴⁶. The 2021 Census was carried out during the COVID-19 Pandemic; therefore, data may be skewed and not reliable as many people worked from home. Therefore, the 2011

provides a more accurate representation on the percentage of the employed population that cycle to work. However, 2021 Census has been included for comparison.

Table 4-1 Percentage of population walking to work taken from the 2011 and 2021 Census - Cheshire East, North West and England

Method of Travel to Work	Cheshire East	North West	England
On foot – 2011 Census	10%	11%	11%
On foot – 2021 Census	7.2%	7.6%	8%

Table 4-1 shows that in the 2011 Census, 10% of individuals walk to work in Cheshire East. This percentage is similar to the North West and England where 11% of individuals walk to work. Data from the 2021 Census⁴⁷ shows that 7% in Cheshire East walk to work. This shows there has been a decrease in the number of individuals walking to work compared with 2011. This is supported by Figure 4-6 and Figure 4-7 overleaf which show the number of individuals walking to work in 2021 has decreased compared to 2011. This is likely to be as a result of the COVID-19 pandemic as a significant proportion of people were working from home at the time.

As shown in Figure 4-6 and Figure 4-7 overleaf, higher numbers of individuals walking to work are located around urban areas such as Macclesfield, Crewe, Congleton and Nantwich. This highlights how walking levels are inevitably highest in urban areas. This may be due to there being higher densities of employment and residential areas. It is essential that these areas have good walking facilities throughout the area to ensure individuals can access work easily by walking. Conversely, across most of the borough, which is predominantly rural, walking levels are low. This may be a result of workplaces being located further away from more rural areas, therefore making it difficult to walk to work, hence the lower numbers of individuals walking to work.

⁴⁶ Method of Travel to Work (2011 Census)

⁴⁶ Method of Travel to Work (2021 Census) Proportion of adults walking by any purpose for different frequencies between 2016 and 2022 in Cheshire East

⁴⁷ Local Cycling and Walking Infrastructure Plans - Technical Guide

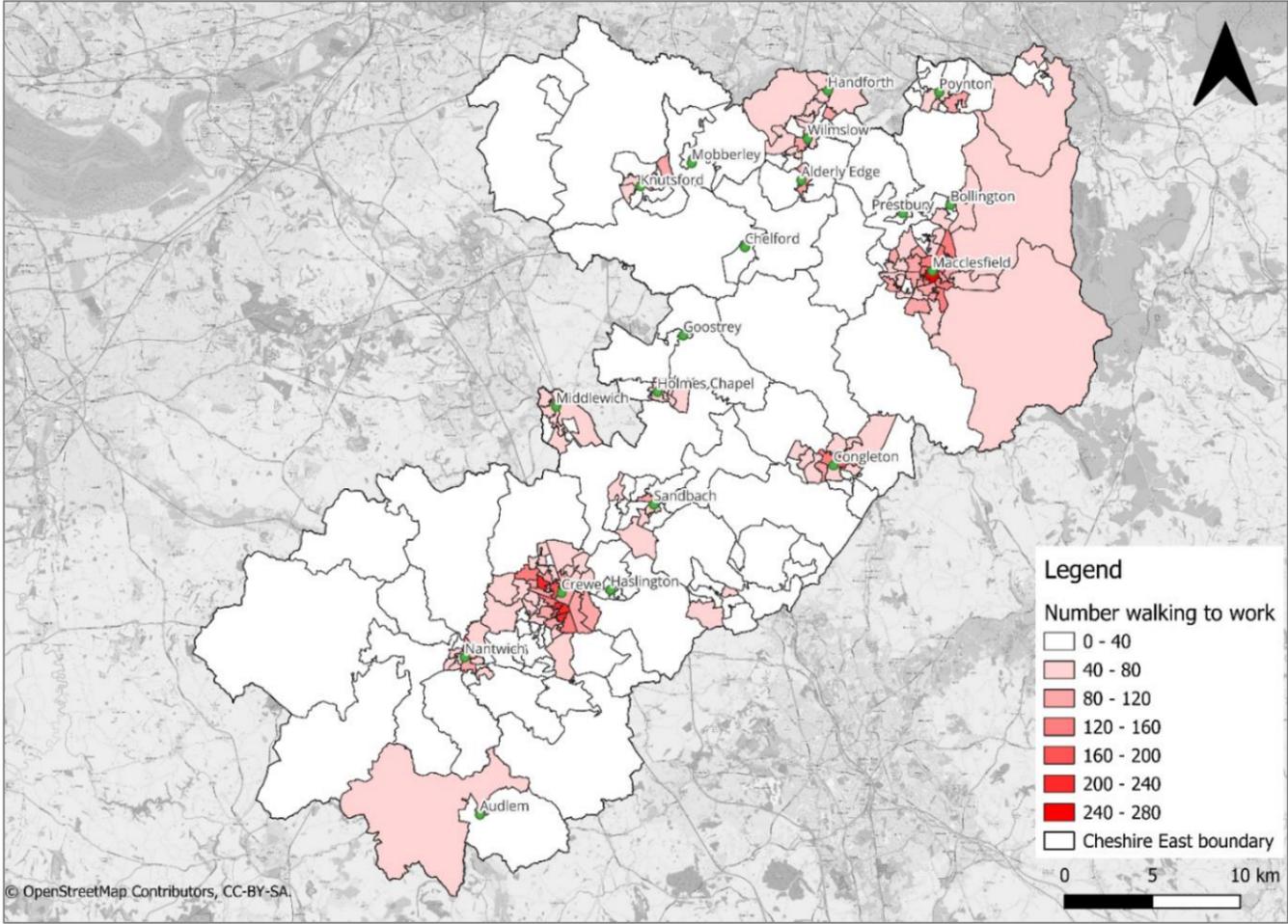


Figure 4-6 Number of Individuals Walking to Work - 2021 Census (ONS)

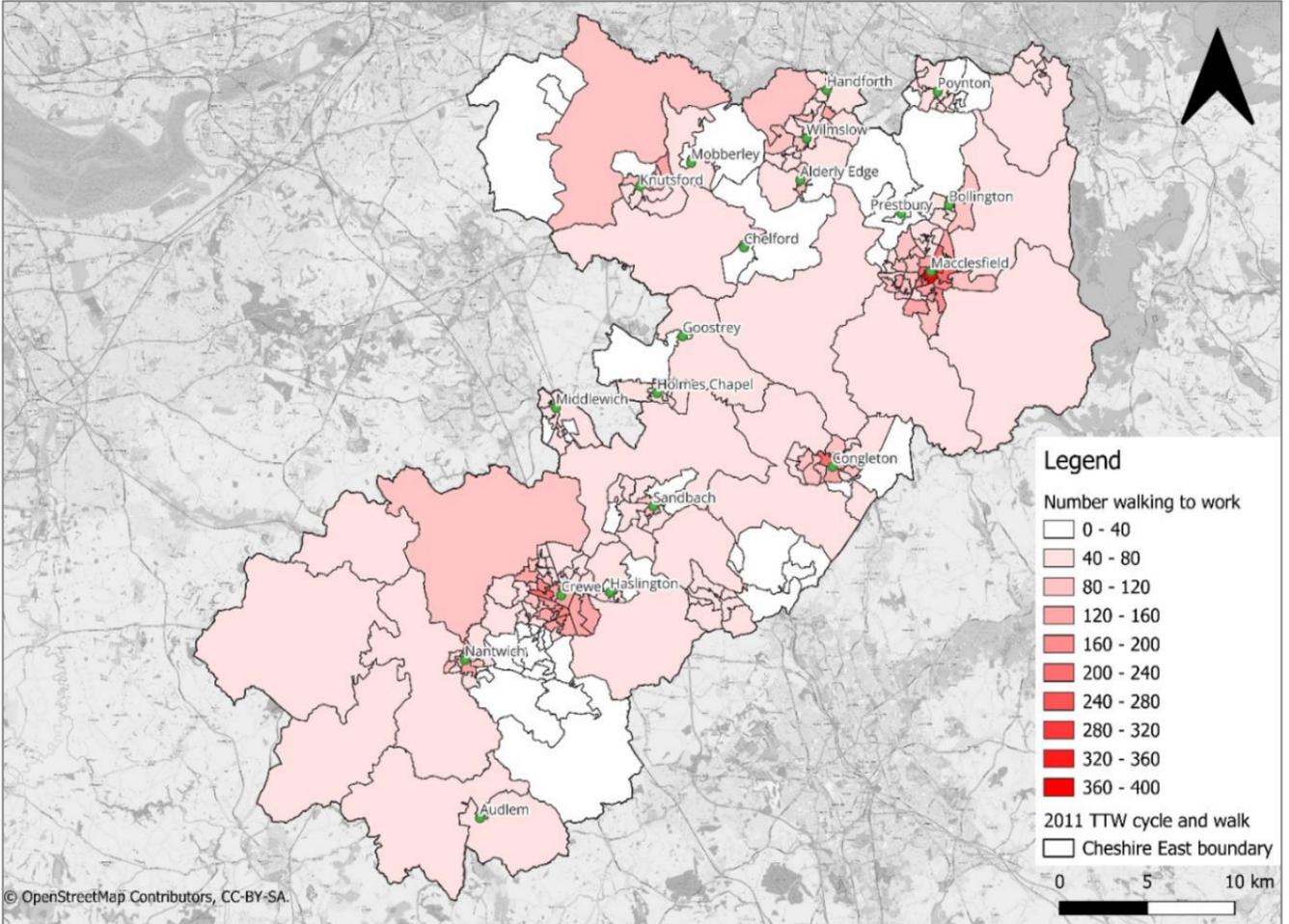


Figure 4-7 Number of Individuals Walking to Work - 2011 Census (ONS)

4.1.5 Collisions and casualties involving walking

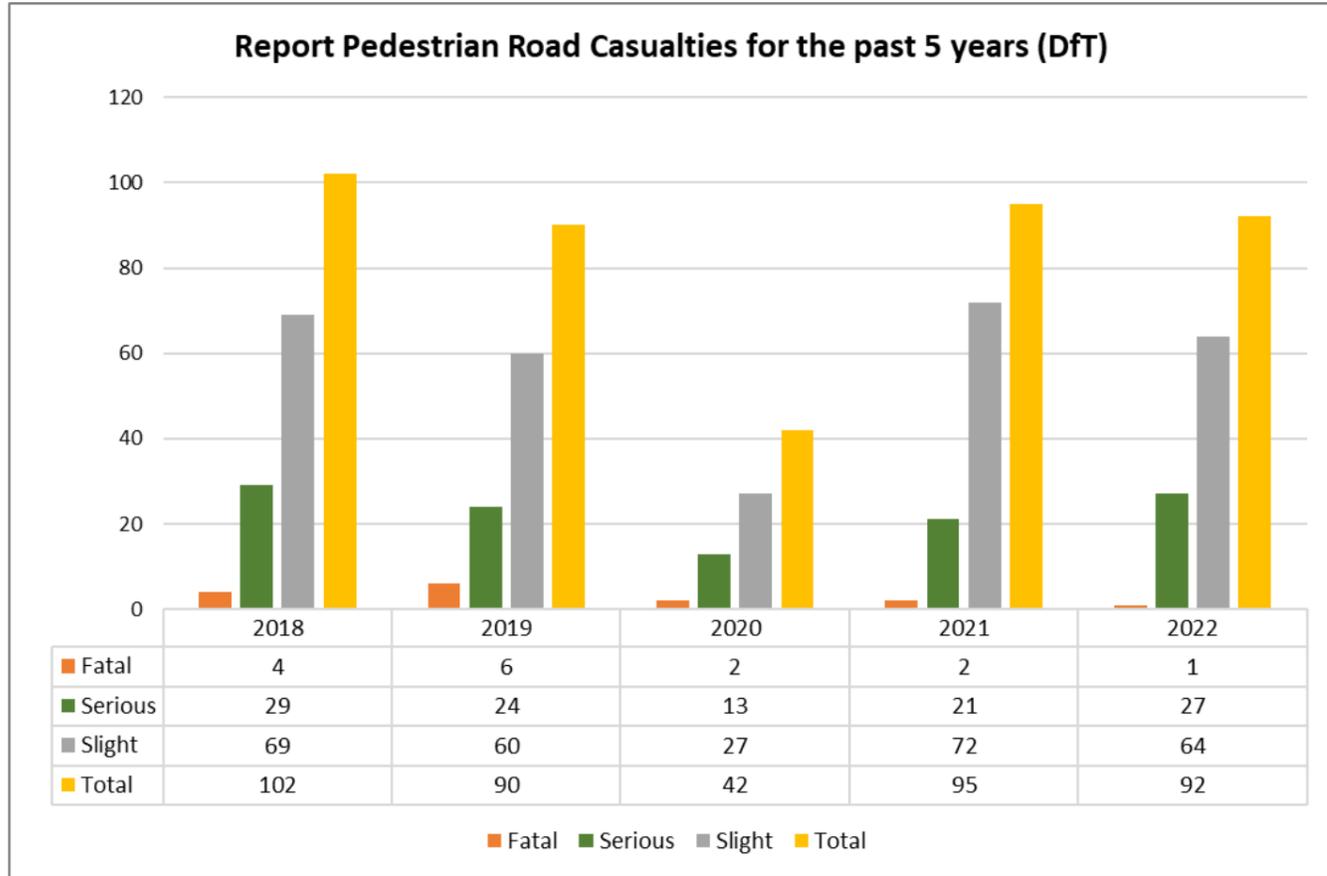


Figure 4-8 Reported Pedestrian Road Casualties for the past 5 years (DfT)

Figure 4-8 shows the latest five-year reported pedestrian collision injury statistics between January 2018 and December 2022 utilising DfT data⁴⁸. Total collisions in Figure 4-8 shows that the total pedestrian collisions stayed at a similar level between 2018 and 2022, apart from 2020, where there was a significant decrease in the number of pedestrian collisions. This is likely to be a result of the COVID-19 pandemic, as lockdown restrictions meant there were fewer vehicles on the road, therefore creating a safer environment for pedestrians. As shown, although low to begin with, fatal collisions from 2020 onwards are even lower, suggesting improved safety for those walking within Cheshire East. However, due to the low numbers involved, this trend may not be statistically significant. The number of serious and slight collisions dipped during 2020 but have remained relatively static otherwise. Clearly, any injury sustained has a human cost, particularly serious and fatal casualties, and there is an imperative to minimise this to the lowest level possible.

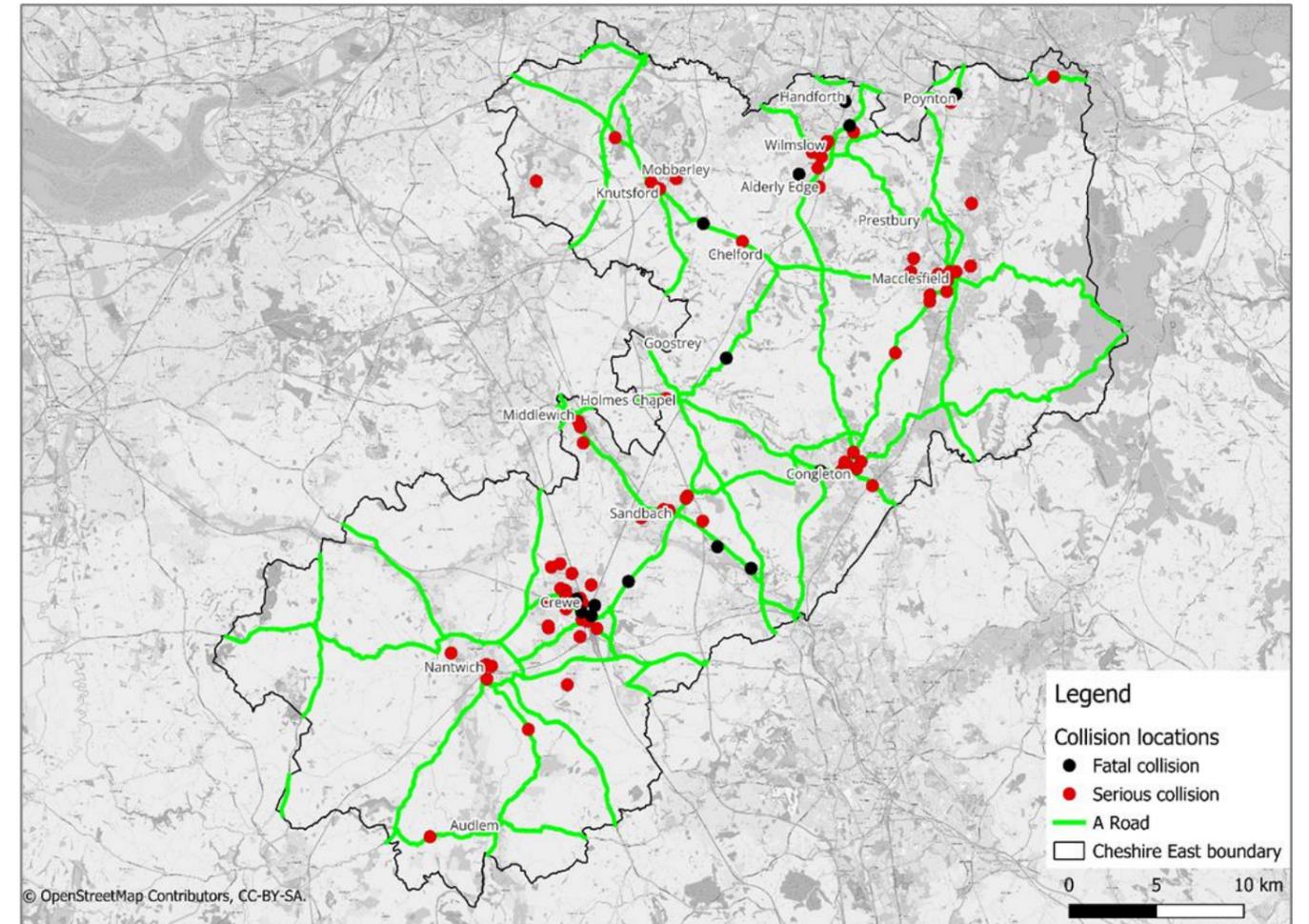


Figure 4-9 Fatal and serious collisions throughout Cheshire East between 2018 and 2022

Figure 4-9 shows the location of the fatal and serious collisions in Cheshire East, taken from DfT data and downloaded from Bike Data⁴⁹. As shown, there is a higher proportion of serious collisions and some fatal collisions in and around the town of Crewe. In addition, a majority of collisions occur along A Roads throughout Cheshire East, which is expected given the higher flows of traffic along these routes. Figure 4-8 shows there were 15 fatal casualties between the years of 2018-2022, with these locations including Crewe at Macon Way and Sandbach Road and Station Road in Handforth.

4.1.6 Strava Metro

Strava Metro is an online tool which analyses data taken from Strava users who track their rides, walks, and runs with GPS on their phones to evaluate and improve bicycle infrastructure⁵⁰. Due to Strava Metro relying on individuals to track their activities on the app, it does not cover the entire population and is typically more associated with leisure activities due to individuals using the app to track their runs, walks or cycle trips. Despite this being 'opt-in' data, some independent

⁴⁸ DfT Reported road casualty statistics in GB: interactive dashboard, from 2018

⁴⁹ Bikedata

⁵⁰ Strava Metro | Walk

academic studies have analysed this relationship, and it has been found to be representative of the overall population. Figure 4-10 shows the number of leisure walking trips taken across Cheshire between 2020 and 2023.

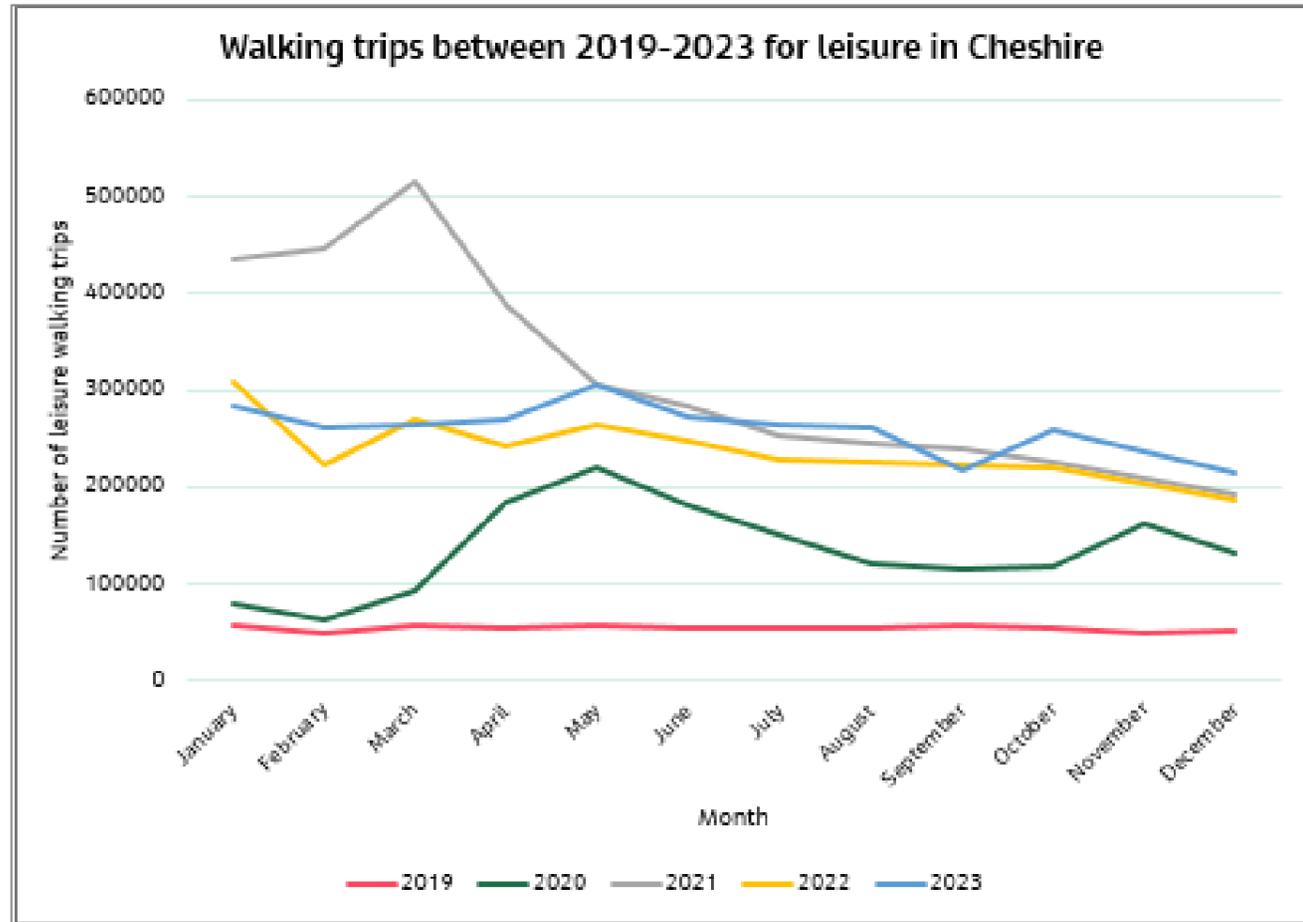


Figure 4-10 Number of leisure walking trips for Cheshire between 2019-2023 - Strava Metro

As shown in Figure 4-10, before the COVID-19 Pandemic walking levels for leisure in 2019 were low at below 60,000 trips. However, when the COVID-19 Pandemic occurred and the whole of the UK was placed in a lockdown in March 2020, walking trips rose at a significant rate from 93,000 in March 2020 to 185,000 in April 2020. The number of trips per month stayed at a high rate until May 2020 where levels started to drop off but walking levels still remained high, above 115,000 trips in a month. Therefore, there was a much higher number of trips between the months of January to March of 2021 compared with 2020, this may be a result of better weather, encouraging more individuals to get out and walk. However, it can be seen from the graph that walking trips for leisure have not increased at a significant rate, therefore more needs to be done regarding the accessibility of the walking network within Cheshire East to encourage the population to walk more and walk instead of using their private vehicle.

4.1.7 National Travel Survey (NTS) walking statistics

Figure 4-11 shows the results for the mode share of trips in England by main mode of transport⁵¹. The figure shows walking is the most popular mode of travel for trips under one mile. However, between one mile and under five miles, car and van is the preferred main mode of transport. It takes an average paced individual around 20 minutes to walk one mile⁵², therefore individuals may not choose to walk longer than this due to time it would take. Therefore, in order to increase the number of individuals walking between one to five miles, Cheshire East need to ensure there is sufficient provision of walking network that is of high quality and accessible for walkers and wheelers to encourage people to walk longer distances.

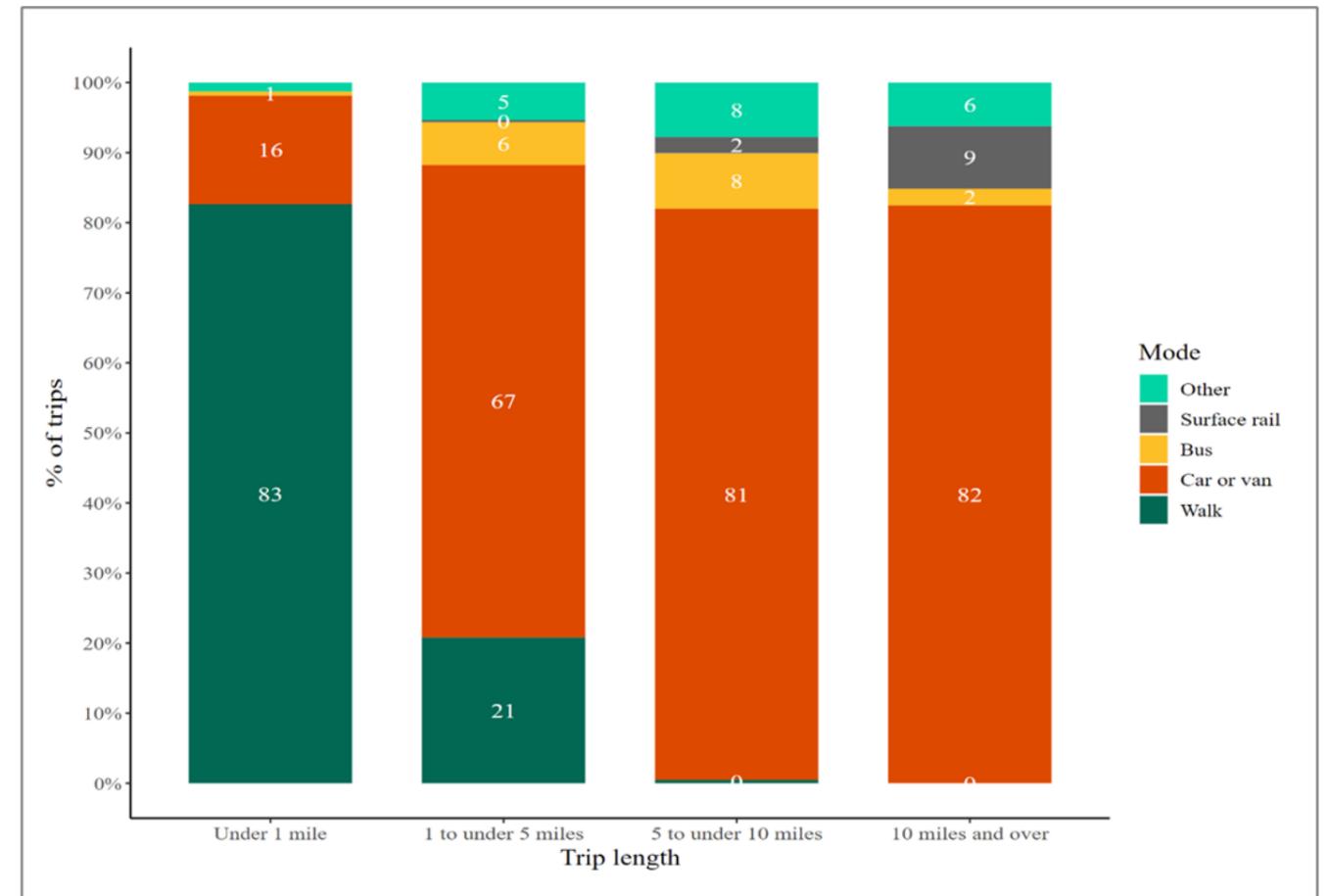


Figure 4-11 Mode share of trips by main mode of transport, England 2022 (NTS)

Figure 4-12 shows the percentage of trips per person per year by main mode of transport for the North West of England⁵³. This shows that the main mode of transport for the North West is the car at 61%, and then walking at 35%. This shows that while walking is the second largest mode of transport, there is still a large gap between car and walking. Therefore, more needs to be done to encourage the population to walk instead of using their personal vehicle. By improving the quality of

⁵¹ NTS0308a: Average Number of Trips by Length and Main Mode (Trips Per Person Per Year)

⁵² How long does it take to walk a mile? (runnersworld.com)

⁵³ NTS9903: Average number of trips by main mode, region and rural-urban classification of residence

the walking network, more individuals will be encouraged to walk and therefore in future walking levels for the North West could be improved.

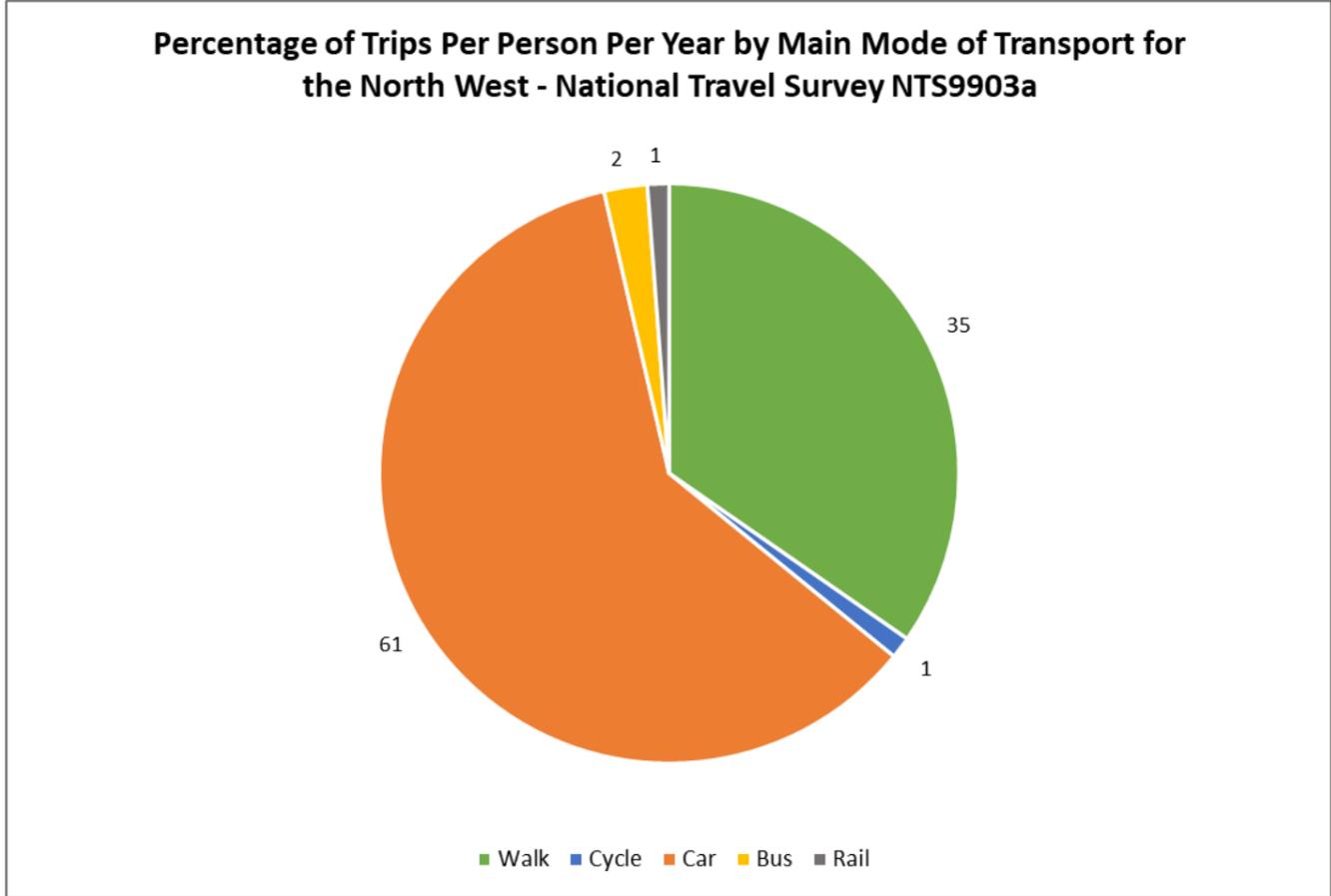


Figure 4-12 Percentage of Trips Per Person Per Year by Main Mode of Transport for the North West - National Travel Survey NTS9903a

4.1.8 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below.

Section	Key Findings	Implications for the LTP
4.1.3	There are 1787 kms of public footpaths in Cheshire East, making up 93.7% of the borough's Public Rights of Way (PRoW) network. 70-88% of Cheshire East's PRoW are 'easy to use'.	CEC needs to improve the accessibility of the PRoW for all individuals in the borough including wheelchairs, prams, and mobility scooters. This will encourage individuals to use the ProW due to the accessibility and attractiveness of the network.
4.1.4	The proportion of adults who walk by any purpose five times a week in Cheshire East was higher than the North West and England in 2017-2018, 2020-2022. However, there is still room for improvement given that this is in the region of 30-35%.	There are some excellent walking routes in the borough with the Middlewood Way a key example. However, improvements are needed more generally in order to improve walking levels throughout the borough.
4.1.4	10% of individuals in Cheshire East walk to work, compared to 74% using a car. This percentage of the population is similar to the North West and England where 11% of the population walk to work.	Walking infrastructure needs to be improved so that there are attractive alternatives to driving for those travelling to work. As well as this, it is essential to understand the potential for modal shift to walking.
4.1.4	Higher numbers of individuals walking to work are located around more urban areas such as Macclesfield, Crewe, Congleton, and Nantwich.	These urban areas are home to densely populated residential areas with higher densities of jobs. This means individuals can access destinations more easily, hence these areas having higher number of individuals walking to work. Furthermore, in urban areas there are some instances of better walking infrastructure, therefore encouraging individuals to walk to work.
4.1.5	The number of fatal collisions in Cheshire East is low, making up a small proportion of the total number of collisions. However, due to the low numbers involved, this trend may not be statistically significant. The number of serious and slight collisions dipped during 2020 but have remained relatively static otherwise. Clearly, any injury sustained has a human cost, particularly serious and fatal casualties, and there is an imperative to minimise this to the lowest level possible.	It needs to be ensured that all facilities are safe for all walkers and wheelers throughout the borough to encourage communities to walk instead of using their private vehicle. Well-designed walking facilities are likely to help further reduce pedestrian related casualties.
4.1.7	In the North West, 35% of individuals trips per year are carried out by walking, compared to 61% of annual trips carried out by car or van.	Improvement in the quality of the walking network around Cheshire East to ensure the infrastructure is accessible to encourage individuals to walk instead of using their private vehicle.

4.2 Cycle

4.2.1 Benefits of active travel

Cycling is increasingly promoted as a form of transport as it derives multiple benefits for the user, their surrounding environment, the economy and wider society.

Regular physical activity benefits both physical and mental health and wellbeing. The NHS recommends adults aged between 19 – 64 participate in at least 150 minutes of moderate intensity or 75 minutes of vigorous intensity activity a week⁵⁴. This can be spread evenly over 4 to 5 days a week or every day. Commuting for 30 minutes as a cyclist five-days a week is one way people can achieve this goal.

Beyond health benefits, increased cycling is a cost-efficient way of reducing transport emissions, as it improves road network efficiency and reduces congestion. Cycling is often a smaller part of a longer multi-modal journey. For example, as part of the first / last mile of journeys utilising public transport, this can be undertaken by cycling. Therefore, by providing an accessible and extensive cycle network, the public transport system as a whole will be able to be accessed by a wide range of the population. Maintaining a good general highway condition particularly benefits cyclists, as they are road users most affected by poor surfacing.

It is important to recognise that cyclists are not a homogenous group and there are many different types of users, including people with disabilities using non-standard cycles. This has important implications for the supporting infrastructure required, however providing high quality facilities as detailed in Local Transport Note 1/20 will encourage a wide range of users to deliver the benefits sought.

4.2.2 Cycling infrastructure

As noted in the walking section, CEC has developed a range of Local Cycling and Walking Infrastructure Plans. Crewe, Congleton, Macclesfield, and Wilmslow were selected for the development of LCWIPs to date based upon an evidence-based review which identified these areas as having the highest potential to increase walking and cycling. The proposed cycling network improvements offer a significant opportunity to increase levels of cycling across the borough.

As well as LCWIPs, Local Transport Development Plans (LTDPs) have been developed by the council. These LTDPs set out a range of potential schemes to improve the transport network to support towns and surrounding areas by identifying ways to deliver an integrated transport network. LTDPs have been developed for the two principal towns of Crewe and Macclesfield and nine Key Service Centres in Cheshire East⁵⁵.

Cycle parking audit

An audit of publicly available cycle parking facilities in the borough's town centres was undertaken in 2023 to help improve access to active travel infrastructure across Cheshire East. The facilities were mapped and will be used to develop a programme for future installation of cycle parking and complementary facilities at key destinations.

Table 4-2 shows that Wilmslow has the largest number of cycle parking locations, with 152 parking facilities at 25 parking locations. The number of individuals travelling to work via bike in Wilmslow are low, however the Manchester Road scheme and other improvements should create a more conducive environment to enable cycle journeys into Wilmslow town centre. In Crewe there are 109 parking facilities in ten different locations; this larger number of parking facilities correlates with historically higher levels of cycling within the town. There are a few areas which have low numbers of parking locations, such as Disley and Prestbury where there are less than ten parking facilities in these locations. In order to attract more

individuals to cycle in these areas, the parking infrastructure throughout Cheshire East needs to be increased and improved to make it easier for individuals to get around the borough by bike.

Table 4-2: Cycle audit results

Town Centre	Number of parking locations	Total number of parking facilities	Proportion of sheltered facilities
Alderley Edge	6	24	42%
Alsager	10	44	Unknown
Bollington	10	30	13%
Congleton	12	94	11%
Crewe	10	109	Unknown
Disley	2	5	0%
Handforth	6	19	0%
Holmes Chapel	6	40	40%
Knutsford	6	21	24%
Macclesfield	8	54	Unknown
Middlewich	6	29	55%
Nantwich	10	78	Unknown
Poynton	6	23	0%
Prestbury	1	5	0%
Sandbach	10	56	0%
Wilmslow	25	152	37%

Existing cycle network

Many routes within Cheshire East are on road or shared with traffic. These types of facilities are less attractive for cyclists as they are exposed to significant levels of motorised vehicles which can result in poor perception of safety and discourage new cyclists. Cheshire East also has some off carriageway routes with a number of Greenways and Trails that provide an excellent level for service such as the Middlewood Way and the Crewe – Nantwich Connect 2 route. There are a variety of shared paths which in some circumstances can be appropriate for cycling, however in more urban areas where pedestrian footfall is higher and there are frequent interactions with side roads, they may not provide the level of service set out in Local Transport Note 1/20. CEC is prioritising the delivery of high-quality cycle routes and there are a variety of schemes due for construction in the coming years. This includes the Manchester Road scheme between Wilmslow and Handforth that will deliver a cycle route segregated from pedestrians and motorised traffic, funded through the Active Travel Fund and contributions from CEC.

⁵⁴ NHS Physical activity guidelines for adults aged 19 to 64

⁵⁵ Local Transport Development Plans

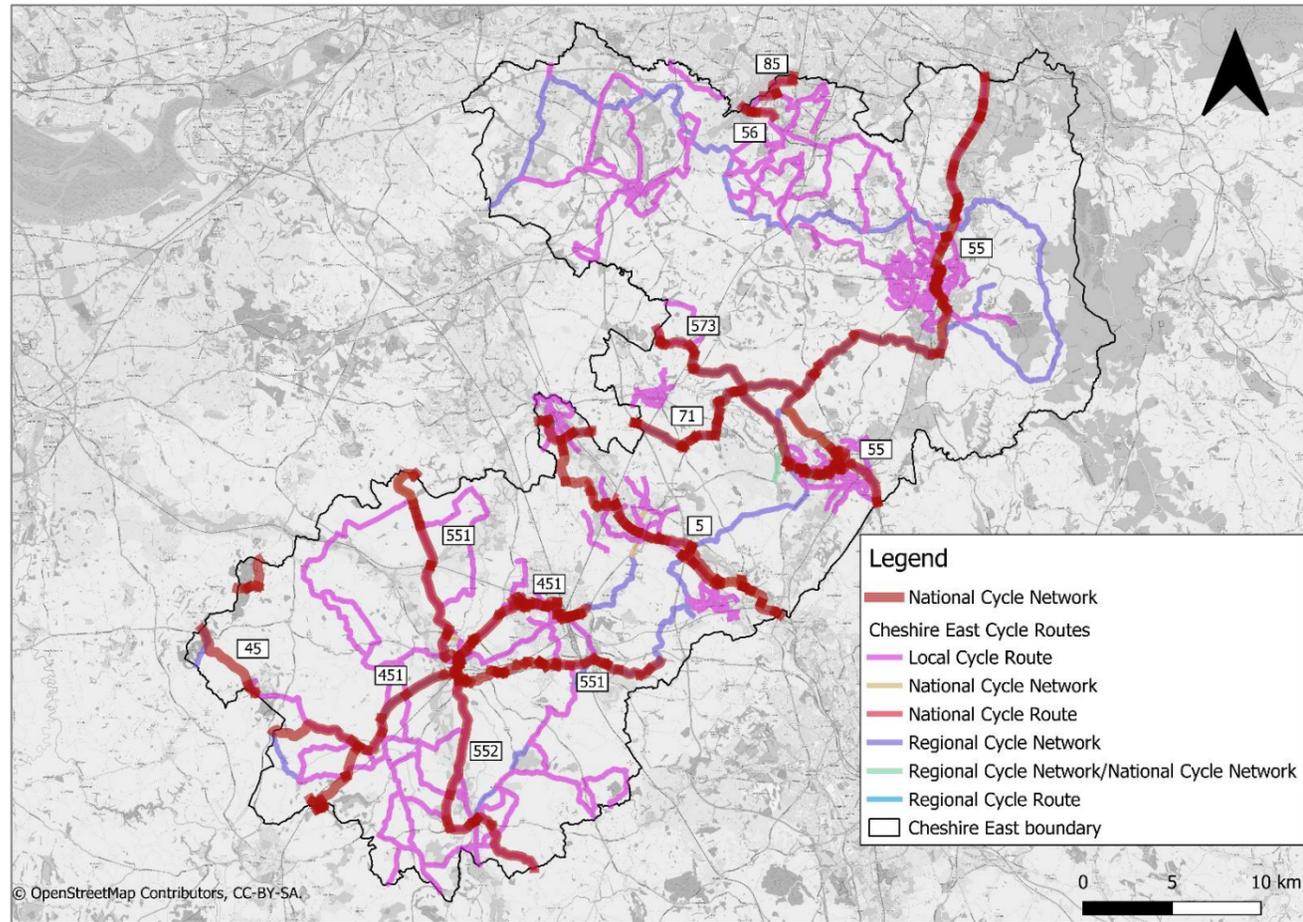


Figure 4-13 Cheshire East National Cycle Network and local cycling networks

Figure 4-13 shows the National Cycle Network (NCN) for Cheshire East. The NCN maintained by Sustrans “is a UK-wide network of signed paths and routes for walking, wheeling, cycling and exploring outdoors”⁵⁶. The figure shows that most of the NCN is located towards the centre and south of the borough with one route through the north which connects Bollington and Macclesfield to the central and southern area of the borough. For the NCN, this means that the southern and central regions of Cheshire East are better connected than the northern area, however there is opportunity to develop new NCN routes in collaboration with Sustrans that provide the level of service needed. A key example of a recent improvement to the NCN is the Hurdsfield Road / Black Lane scheme that improves links between Macclesfield and the Middlewood Way, which was funded by Sustrans and a local contribution by CEC. Apart from NCN, there is a large number of local and regional cycle routes located around the whole borough, however the level of service offered is variable. In total there is 724km of cycle network throughout Cheshire East.

⁵⁶ The National Cycle Network Sustrans

⁵⁷ Participation in walking and cycling (local authority rates)

4.2.3 Cycling statistics

Figure 4-14 visualises the proportion of adults who cycle at least once a week for travel between 2016 and 2022. Travel refers to cycling to get from place-to-place, for example travelling to work or going to the supermarket. This data is taken from the DfT walking and cycling participation in local authority statistics⁵⁷ based on the Active Lives Survey.

Figure 4-14 compares the proportion of adults cycling for any purpose at least once a week in Cheshire East, the North West and England⁵⁸. The graph shows that for the years 2016 and 2019 cycling percentages were lower in Cheshire East and the North West compared to England. However, in 2017 the percentage of adults cycling was significantly higher than the percentage in the North West and England. Apart from 2017, the percentage of those cycling has remained relatively similar from 2016 to 2020 in the range of 8-10%. However, in 2021, the percentages in the North West and England dropped whilst Cheshire East remained the same; this also happened in 2022. As a result, the proportion of those cycling for any purpose was higher in Cheshire East than the North West and England in 2021 and 2022.

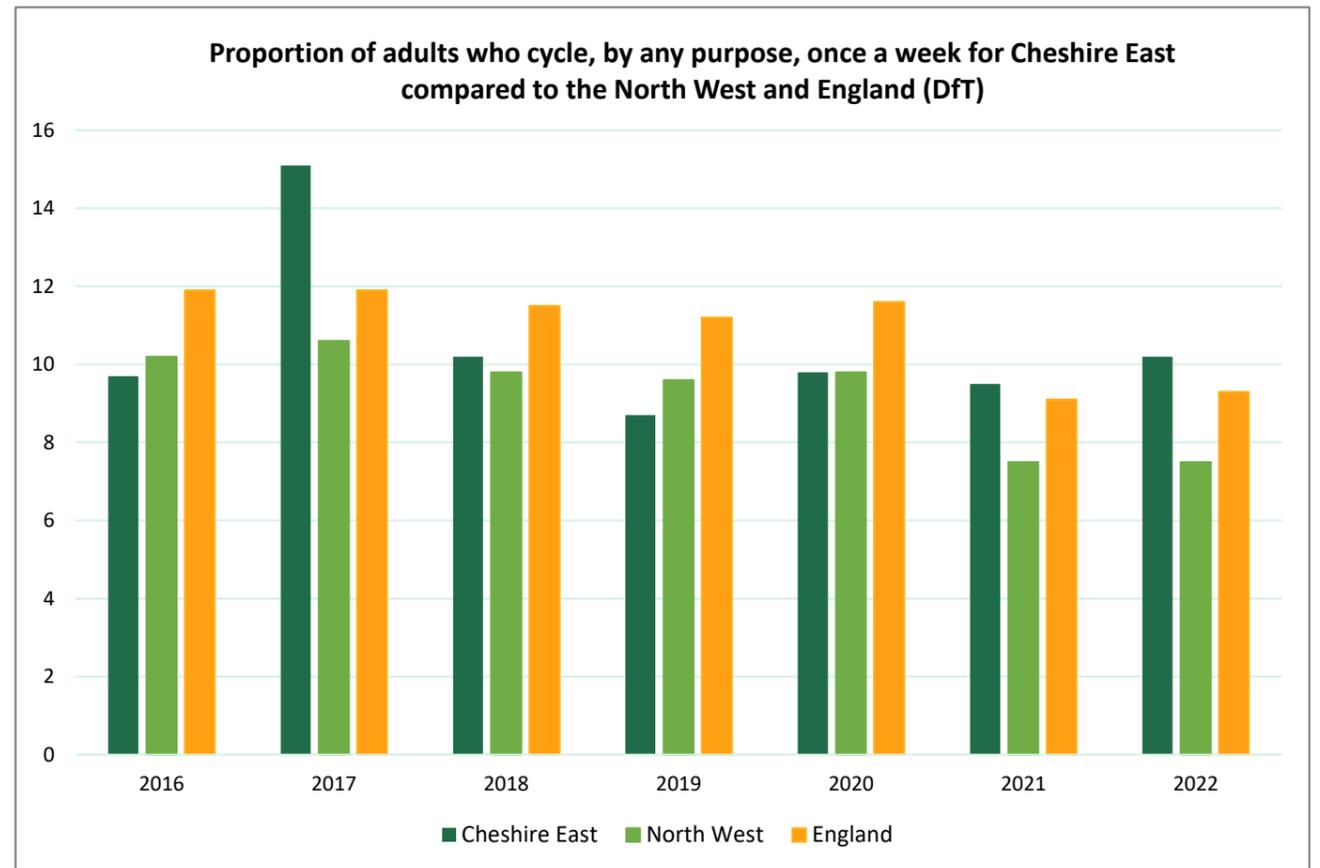


Figure 4-14 Proportion of adults who cycle at least once a week for any purpose – CW0302

This shows that there is still room for improvement regarding cycling levels in Cheshire East, given that 8-10% of adults are cycling once per week, and this has remained relatively unchanged since 2017. Therefore, it is important that cycle infrastructure is of high quality, in line with LTN 01/20 and suitable for all individuals to use.

⁵⁸ CW0302: Proportion of adults that cycle, by frequency, purpose and local authority: England

Figure 4-15 shows the proportion of adults who cycle at least once a week for travel purposes in the North West and England. Travel purposes refers to cycling to get from place to place, for example commuting, going to the supermarket or to the doctor etc. Data is not available for Cheshire East specifically due to the low frequencies of trips⁵⁹. The graph shows that the proportion of adults cycling at least once a week for travel purposes is lower in the North West than for the whole of England for 2016 - 2022. In 2020, the percentage of adults cycling at least once a week for travel purposes fell, with a more significant decrease in England compared to the North West. This is likely to be as a result of the COVID-19 pandemic. For both regions, the percentage fell further in 2021 however began to recover in 2022, although both areas still have lower percentages of cycling for travel purposes than pre-pandemic in 2019.

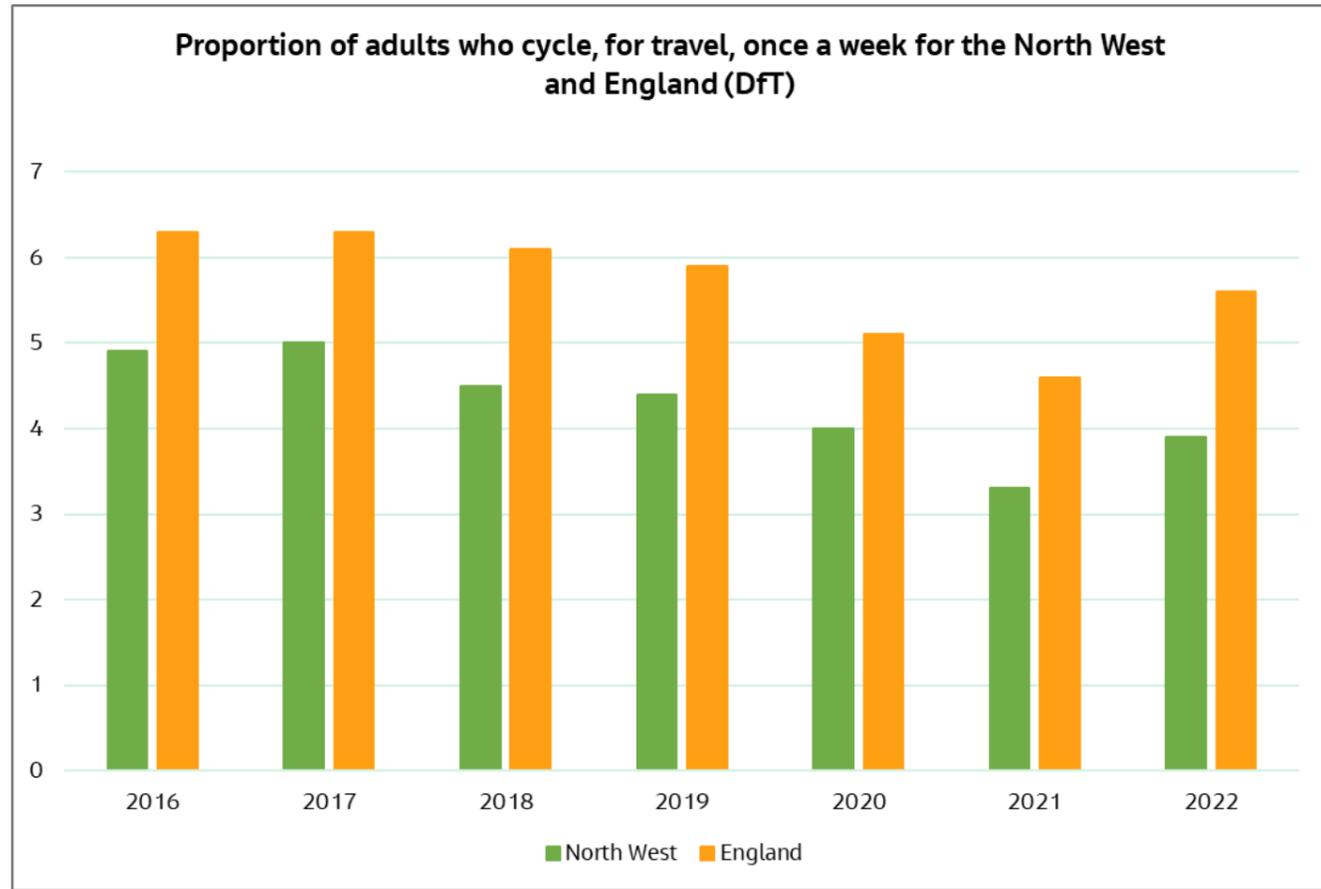


Figure 4-15 Proportion of adults who cycle at least once a week for travel

Table 4-3 shows the Census data relating to the method of travel to work for Cheshire East, the North West and England from the years 2011⁶⁰ and 2021⁶¹. In 2011, cycling as a method of travelling to work in Cheshire East was 0.4% higher than in the North West and 0.1% lower than the whole of England. In 2021 the North West and England experienced a reduction in cycling as a method of travelling to work due to the COVID-19 pandemic, however in Cheshire East it was 0.1% higher than in the North West and 0.3% lower than England. Whilst these levels are similar overall to the North West and England, there is still work to be done to improve cycling infrastructure and encourage more people to cycle.

Table 4-3 Comparison of cycling as a method of travelling to work (ONS)

Method of Travel to work	Cheshire East	North West	England
Bicycle – 2011 Census	1.8%	1.4%	1.9%
Bicycle – 2021 Census	1.8%	1.7%	2.1%

Figure 4-16 shows the 2011 Census data highlighting the number of people who cycle to work for each area in Cheshire East. The figure shows that cycling as a method of travel to work is highest within the principal town of Crewe and its surrounding areas. Higher levels of cycling to work can be seen in and around Nantwich, within Macclesfield and to the southeast of Macclesfield. Apart from these areas, levels of cycling to work is lower, particularly in areas further away from key town and economic centres in the more rural areas of the borough. This may be a result of workplaces being located further away from more rural areas and limited routes, therefore making it difficult to cycle to work. Figure 4-17 shows the 2021 Census data highlighting the number of people who cycle to work for each LSOA in Cheshire East. Despite this being impacted by the COVID-19 pandemic, this still can show us where cycling was more popular within the borough. Similar to 2011, the number of people using cycling as a method of travelling to work is highest in and around the principal town of Crewe and to the southeast of Macclesfield. Away from these areas, similar to 2011, cycling numbers are lower.

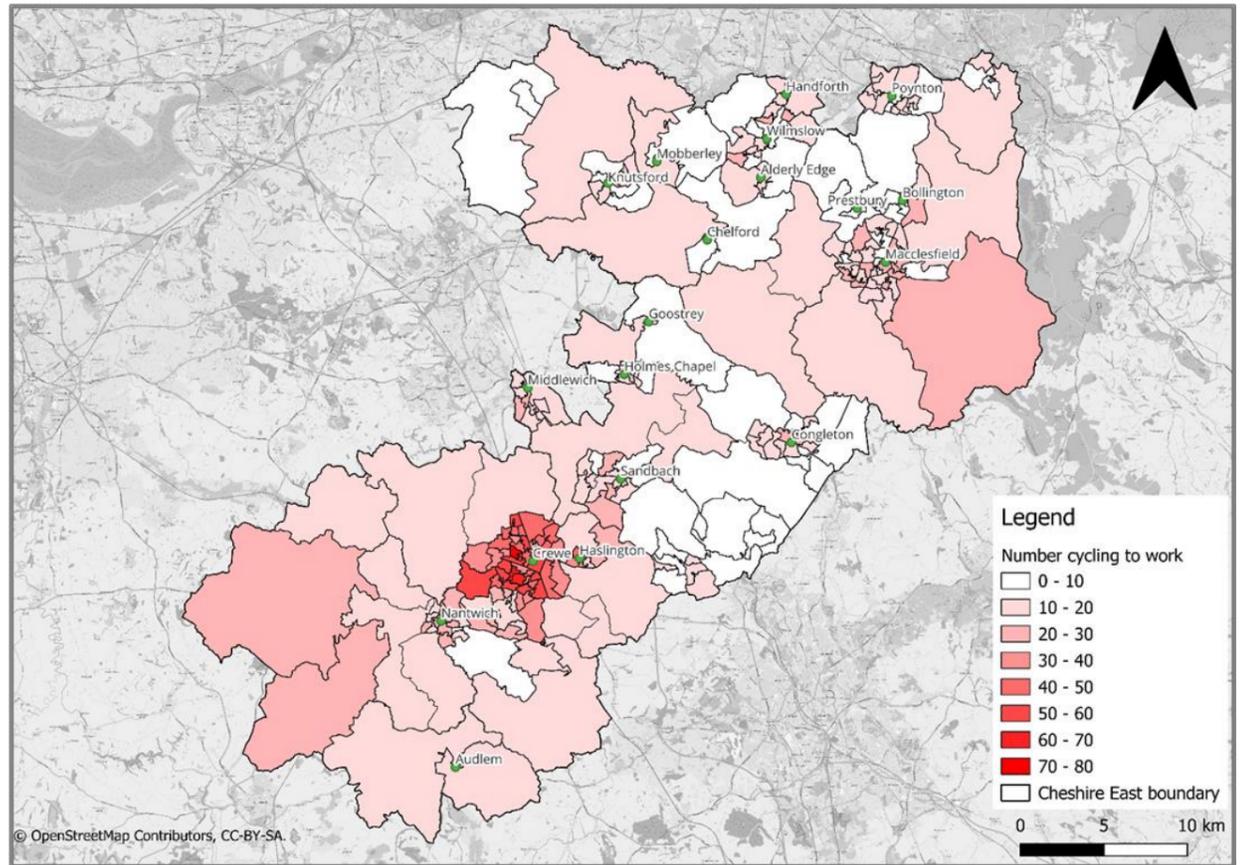


Figure 4-16 Number of individuals cycling to work - 2011 Census

⁵⁹ CW0302: Proportion of adults that cycle, by frequency, purpose and local authority: England

⁶⁰ census 2011 Method of travel to work

⁶¹ census 2021 Method of travel to work

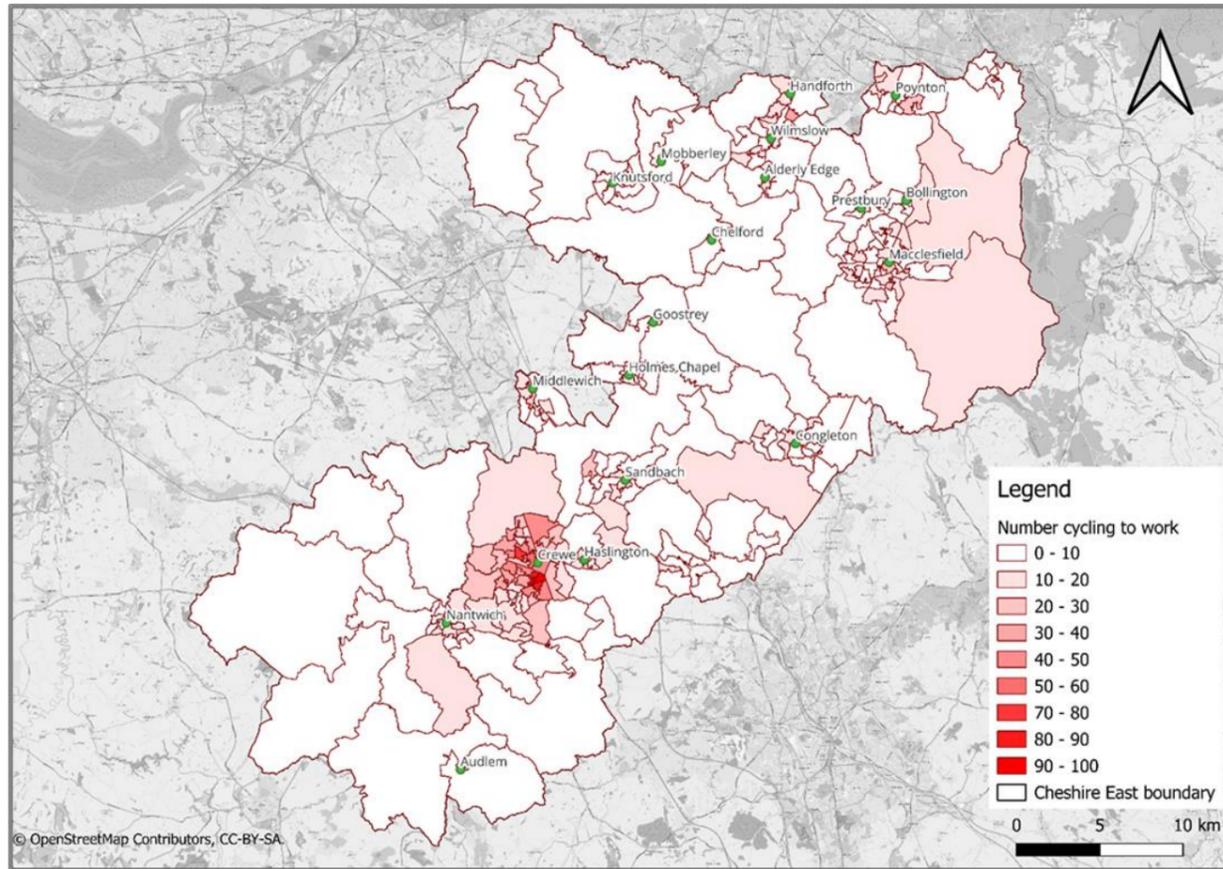


Figure 4-17 Number of individuals cycling to work - 2021 Census

National Travel Survey (NTS) cycle statistics

The trends described below have been taken from the National Travel Survey⁶² (NTS), the NTS is a household survey of personal travel by residents of England travelling within Great Britain.

Figure 4-18 shows the average number of cycling trips made per person per year in England between 2002 and 2022⁶³. The average number of cycle trips across England has remained relatively similar between 2002 and 2022 with this being between 15 and 18 trips per person, per year since 2002. There was a slight increase in average trips in 2020 to 20 trips per year per person when the COVID-19 pandemic began, however this decreased again in 2021 and 2022. This suggests that Cheshire East need to ensure there is sufficient provision of cycling network that is of high quality and accessible for cyclists to enable individuals to cycle instead of travel by their private vehicle. As well as ensuring a high-quality network, more need to be done to ensure women feel safe whilst using the cycle network.

⁶² National Travel Survey 2022: Active Travel

⁶³ NTS0303 - Average Number of Cycling Trips

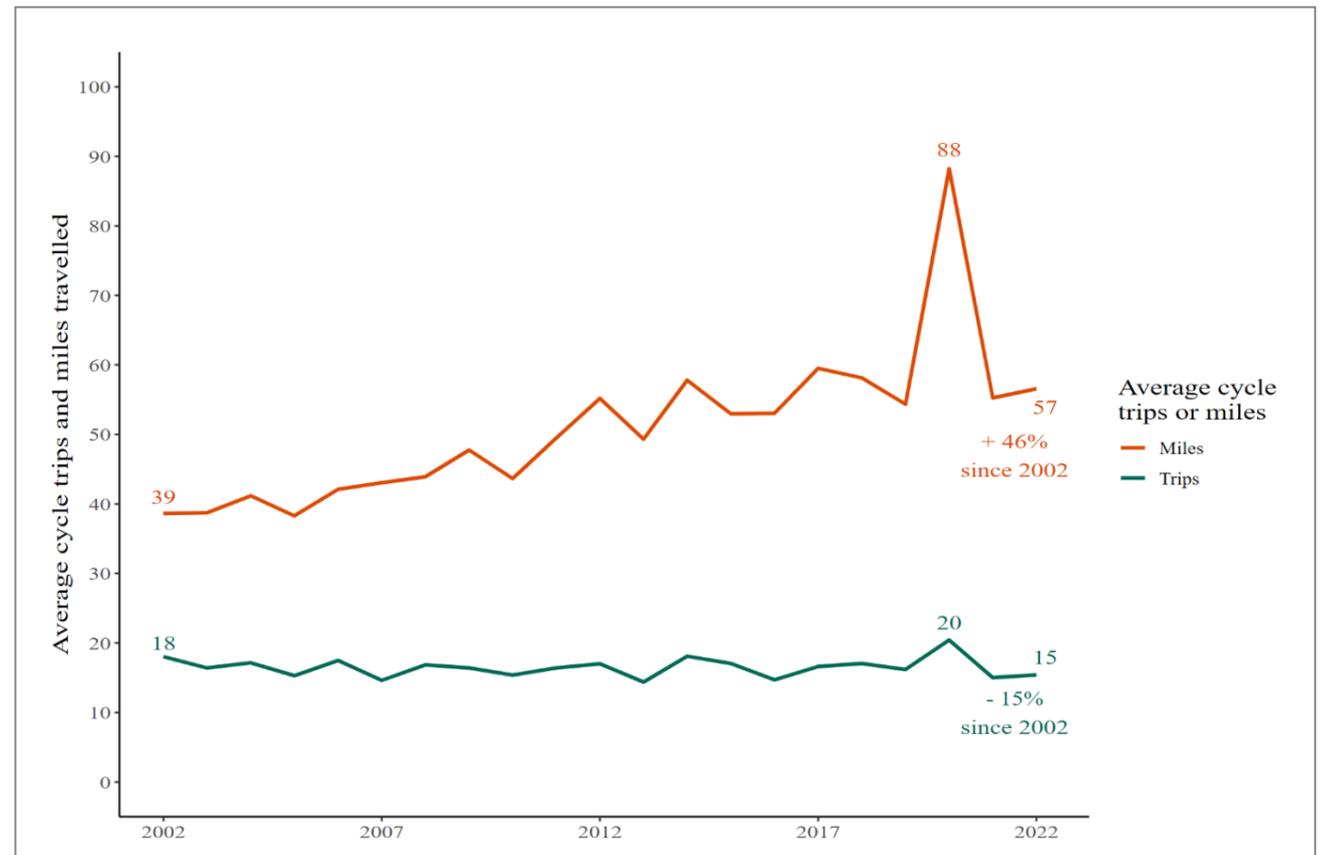


Figure 4-18 NTS Average cycling trips made, and miles travelled per person per year: England 2002-2022

Figure 4-18 shows that average cycling miles have experienced a general upward trend from 2002 to 2022. There was a significant increase in miles travelled in 2020 to 88 miles, likely as a result of there being more people cycling for leisure during the COVID-19 pandemic. There was then a fall from this spike in 2021 which has remained similar in 2022. Since 2002, average cycling miles have increased by 46% which is the equivalent of 39 miles per person. Even though cycling miles have increased it does not mean that more people are cycling. This rise in miles cycled could be due to existing cyclists riding longer distances or many other reasons. It is essential to consider other factors, like the total number of cyclists or participation rates, to get a more accurate picture of cycling trends. Even though an increase in cycle miles does not directly correlate to more cycling trips, it is still a positive sign.

Figure 4-19 shows the proportion of cycling trips per person per year, by trip purpose in England between the years of 2019 and 2022⁶⁴. This shows that in 2022, the most common purpose for cycling trips was leisure with 36% of all cycling trips. Commuting was the second most common purpose with 30% and education third with 13%. Since 2020, the proportion of leisure cycling trips have reduced, and the proportion of commuting and education trips has increased. This highlights that cycling trip purposes are returning to pre-pandemic reasons in 2019.

⁶⁴ NTS0409 - Proportion of cycling trips by trip purpose

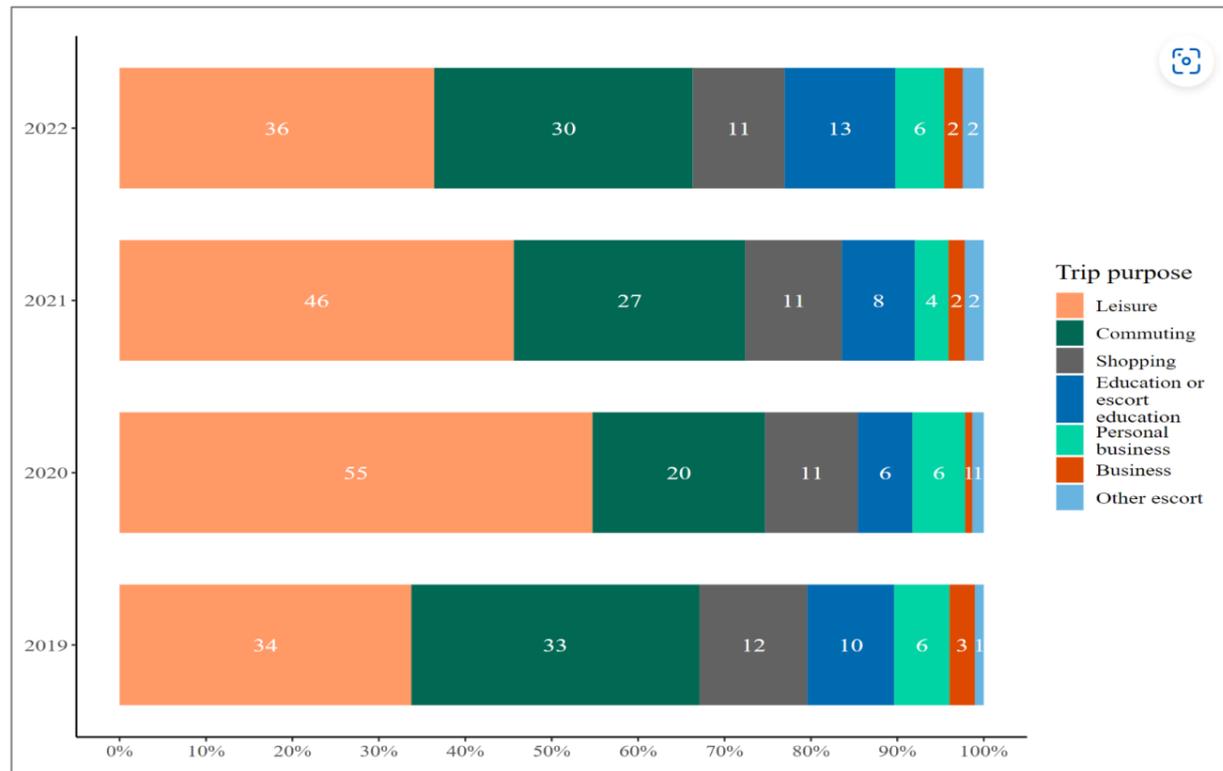


Figure 4-19 NTS Proportion of cycling trips per person per year, by trip purpose: England, 2019 to 2022

4.2.4 Collisions and casualties involving cycling

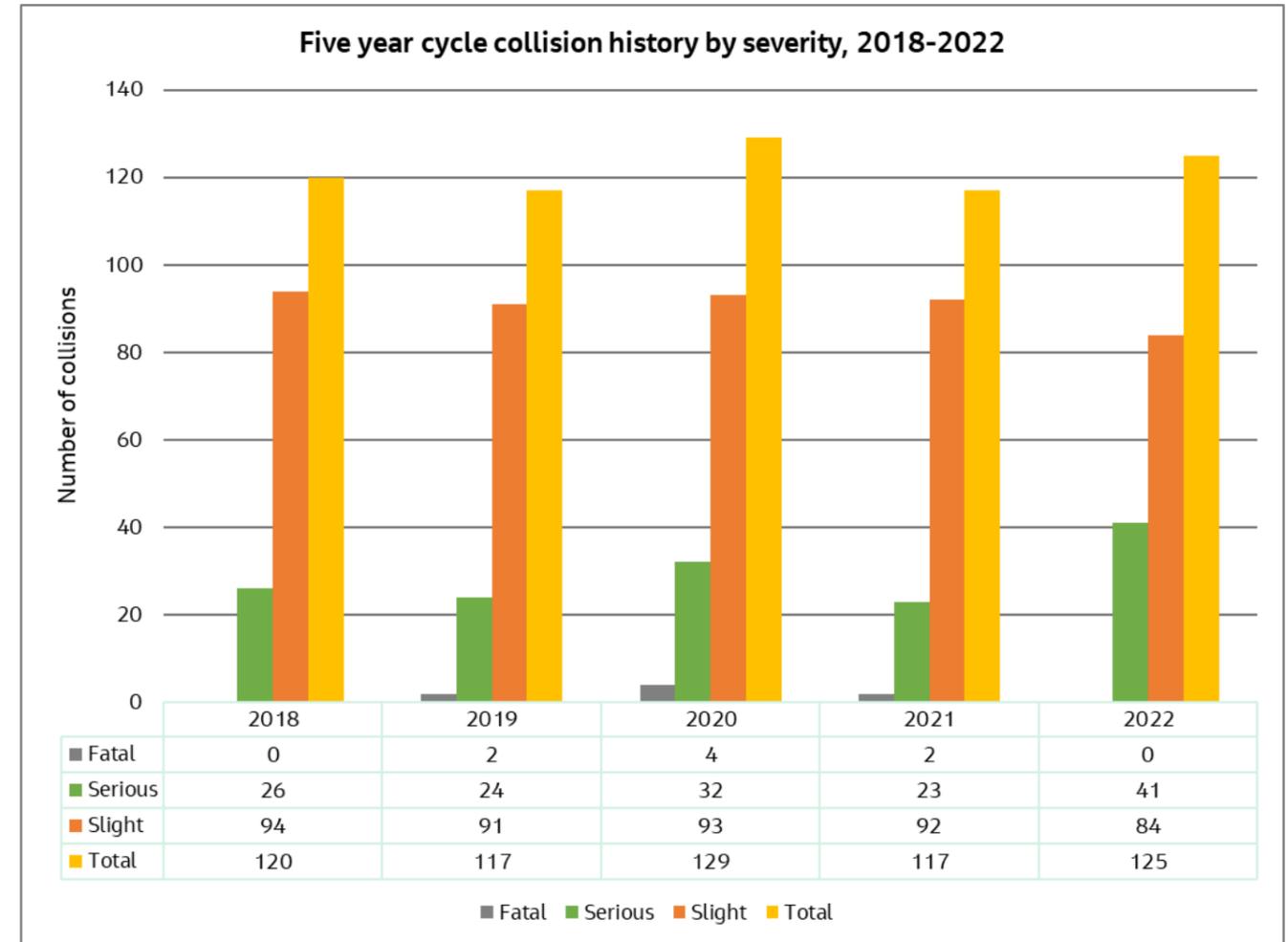


Figure 4-20 5-year cycle collision history by severity, 2018-2022

Figure 4-20 shows the latest five-year reported cyclist collision injury statistics between January 2018 and December 2022 utilising DfT data⁶⁵. Total collisions have remained relatively similar across the past five years, however in 2020 there was a slight increase in collisions. This increase occurred due to a higher number of fatal and serious collisions compared to prior years. Causality is difficult to establish however this may be due to a higher number of people taking up cycling during the COVID-19 the pandemic, which may have resulted in an increased likelihood of collisions occurring. In 2022, the number of serious collisions was significantly higher than previous years, increasing by 78%. However, fatal, and slight collisions were lower, so the total number of collisions shows little change.

⁶⁵ [DfT Reported road casualty statistics in GB: interactive dashboard, from 2018](#)

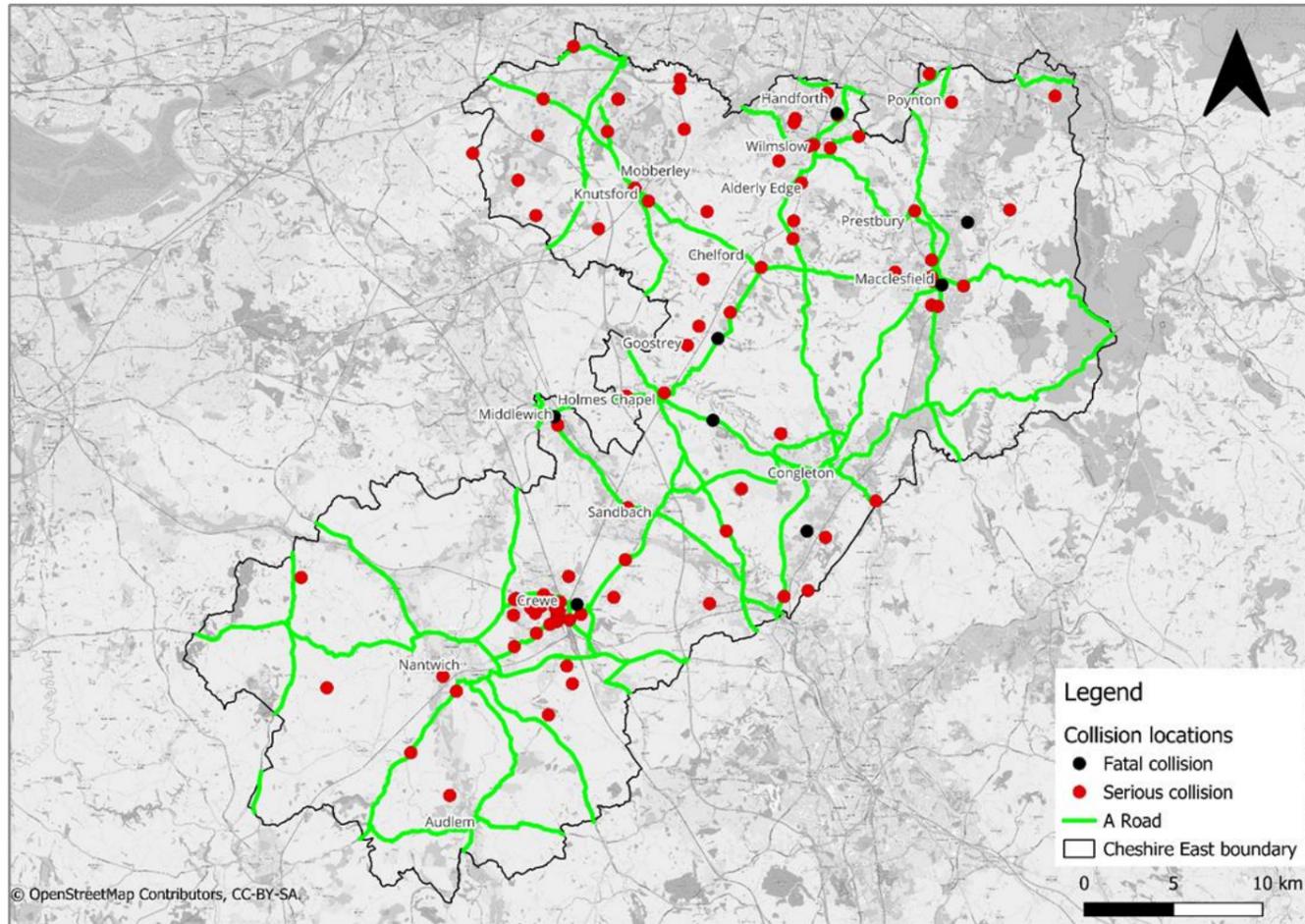


Figure 4-21 Fatal and serious cycle collision locations, 2018-2022

Figure 4-21 shows the location of fatal and serious collisions in Cheshire East, taken from Bike Data⁶⁶. As shown, there is a higher proportion of serious collisions in and around Crewe and one fatality occurring in this area. This may be due to there being higher levels of cycling in this area, as seen in Section 4.2.4.

⁶⁶ Bikedata

4.2.5 Strava Metro

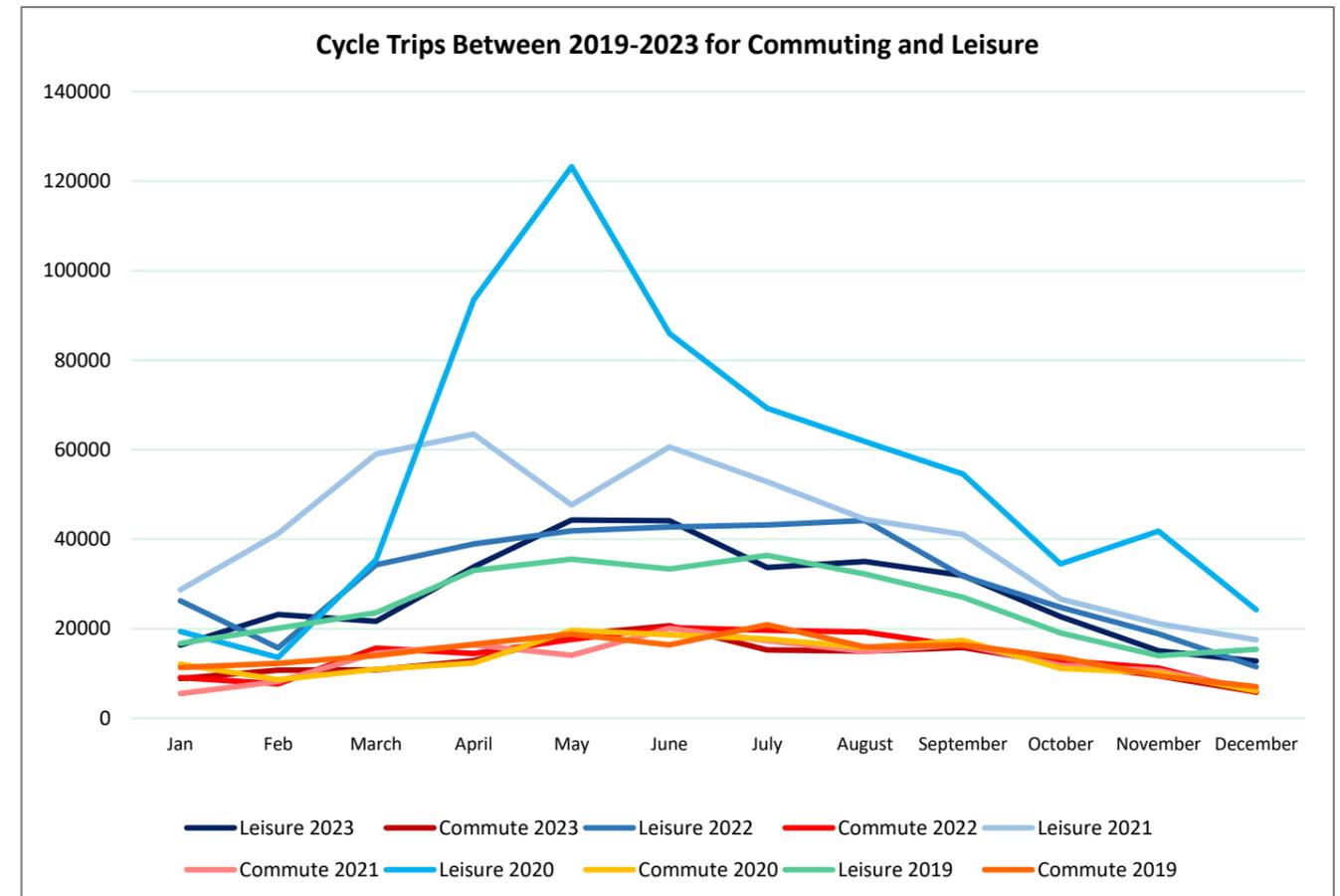


Figure 4-22 Strava Metro data for cycle trips for commuting and leisure, 2019-2023

Strava Metro is an online tool which analyses data taken from Strava users who track their rides with GPS on their phones to evaluate and improve bicycle infrastructure⁶⁷. Due to Strava Metro relying on individuals to track their activities on the application, it does not cover the entire population and is typically more associated with leisure activities due to individuals using the app to track their runs or cycle trips, however some journeys to work and for other everyday purposes are also captured.

Figure 4-22 shows the number of cycle trips taken across Cheshire between the years 2019 and 2022 for leisure and commuting purposes. The data is not broken down to a Cheshire East level. The graph shows a significant peak in leisure trips in Cheshire in May 2020. This coincides with the COVID-19 pandemic, when there was better weather, and more individuals were leaving their homes and exercising. This peak in the summer months, shows a relationship between cycling and the time of year. Leisure cycling levels recorded significantly decreased between September 2020 and May 2021 over winter. Commuting levels recorded in Strava have stayed very similar over the past four years with there being a slight increase during the summer months which is likely a result of the better weather encouraging more to cycle.

⁶⁷ Strava Metro | Walk

4.2.6 Propensity to Cycle Tool (PCT)

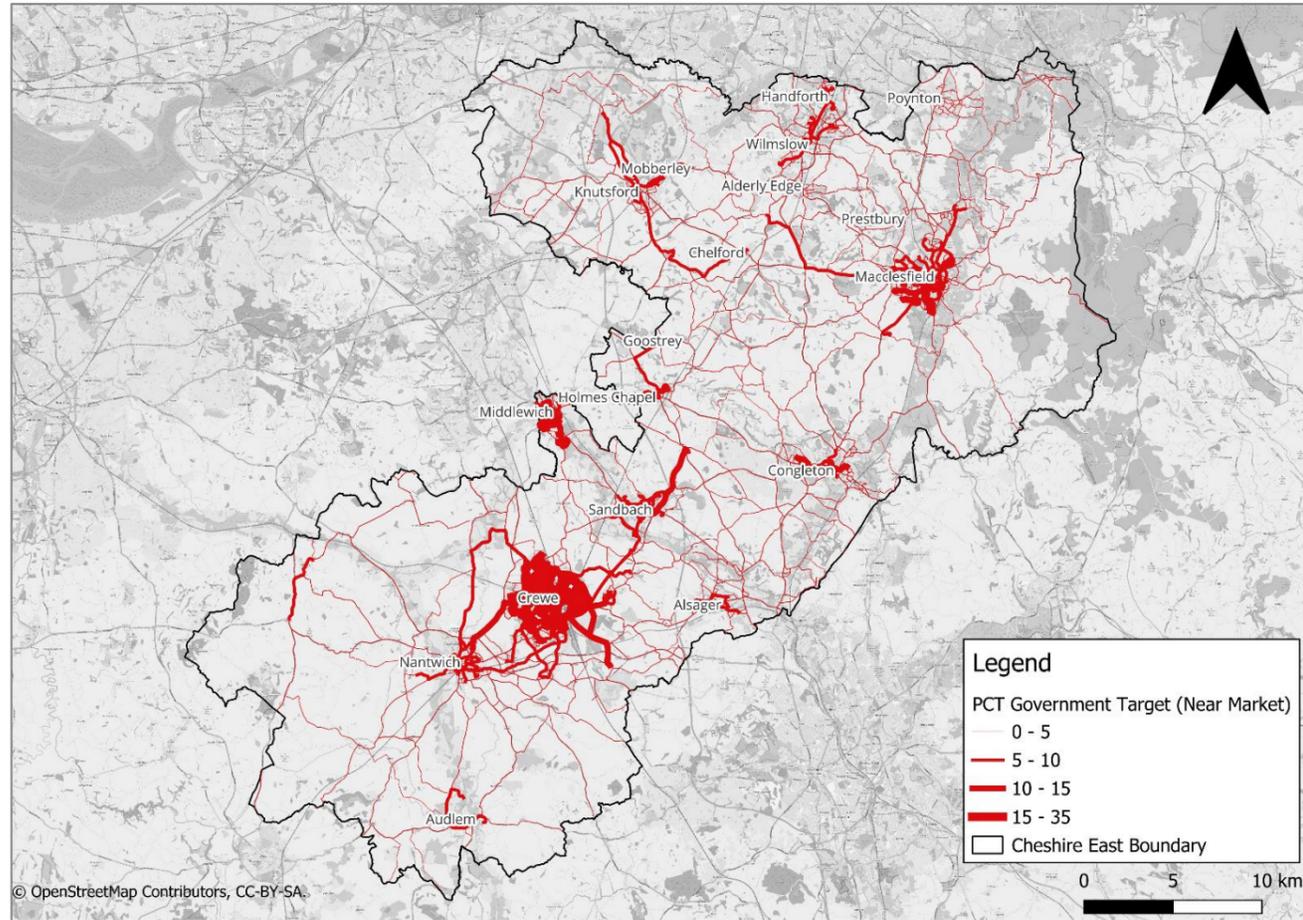


Figure 4-23: Propensity to cycle fast routes – Government Target (Near Market)

Figure 4-23 shows ‘fast routes’ data from the Propensity to Cycle tool⁶⁸; this shows the likelihood a route will be used for a cycle trip based on the 2011 Census. The fast routes are those that would get the cyclist to their destination in the shortest time. The PCT tool has been used for the scenario of Government Target (Near Market). This scenario models a doubling of cycling nationally by 2025. The Government Target (Near Market) models the increase as occurring as a function of trip distance and hilliness, plus socio-demographic and geographical characteristics.

The map shows that routes in Crewe and Macclesfield have the highest propensity to cycle. This may be due to these areas having a higher density of jobs and residential area due to the urban nature, therefore easier for individuals to cycle as they are closer to work opportunities. This can also be seen in Nantwich, Middlewich, Congleton, Wilmslow, Knutsford and Handforth. This means it is easier for individuals to cycle due to being located closer to essential amenities that are of higher densities in urban areas, such as work opportunities. However, more rural areas such as Audlem, Alsager, Poynton and Prestbury have lower propensity to cycle due to there being fewer people and job opportunities, and due to the larger distance to urban areas, from rural towns and villages, fewer individuals cycle in these areas. This tool has informed the production of LCWIPs and Local Transport Delivery Plans.

⁶⁸ Propensity to Cycle Tool - Bike

4.2.7 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below:

Section	Key findings	Implications for the LTP
4.2.2	All of the towns within Cheshire East have cycle parking facilities, however this varies in terms of quality and number.	To attract more individuals to cycle within Cheshire East, cycle parking and facilities need to be improved within the borough to make it easier and more comfortable for individuals to cycle in Cheshire East.
4.2.2	The central and southern areas of Cheshire East are well connected by the National Cycle Network, the north of Cheshire East less so, with only the NCN route 55 connecting north to south via Macclesfield. The level of service offered on these routes is variable.	To increase the number of people cycling in Cheshire East it is important to have the infrastructure in place to allow for this to happen. Improvements are needed in many areas of the borough.
4.2.2	Many routes within Cheshire East are on road or shared with traffic. Cheshire East also has some off carriageway routes with a number of Greenways and Trails that provide an excellent level for service such as the Middlewood Way and the Crewe – Nantwich Connect 2 route. There are a variety of shared paths which in some circumstances can be appropriate for cycling, however in more urban areas where pedestrian footfall is higher and there are frequent interactions with side roads, they may not provide the level of service set out in Local Transport Note 01/20.	Building on work conducted in recent years such as the Black Lane / Hurdsfield Road and Manchester Road schemes, there should be a continuing focus on delivering high quality cycle routes in line with LTN 1/20.
4.2.3	In 2011, Cheshire East had a similar proportion of adults cycling to work as the whole of England, and a higher proportion than the North West. Crewe and Macclesfield have the highest number of people cycling as a method of travelling to work, however in 2021, compared to 2011, cycling was significantly lower as a method of travelling to work, likely due to the COVID-19 pandemic.	It is important to maintain and improve cycling infrastructure in higher performing areas whilst also improving infrastructure in other areas of the borough to attract more people to use cycle as a method of travel to work.
4.2.3	The proportion of people cycling in Cheshire East at least once a week for any purpose has remained relatively unchanged from 2018 onwards, however in 2017, 2021 and 2022 the proportion of people cycling in Cheshire East was higher than in the North West and England.	Whilst the proportion of people cycling in Cheshire East has been higher than the North West and England in 2021 and 2022 this has been due to a fall in the regional and national proportion. Cheshire East's proportion has stayed relatively similar so more needs to be done to increase and attract people to cycle in the borough.
4.2.4	Collisions have remained relatively unchanged across the period from 2018-2022, apart from a slight increase in collisions during 2020 which may be due to the increase in the proportion of people cycling in 2020. Although the number of fatal collisions has steadily fallen over the 5 year period, serious collisions were highest in 2022 and slight collisions have returned to pre-pandemic levels.	This suggests there is a need to ensure that all cycling facilities are of high quality safe for all users throughout the borough to encourage individuals to cycle instead of using their private vehicle. Well-designed cycling facilities in line with guidance are likely to help further reduce cyclist related casualties.
4.2.6	The potential to encourage more people to cycle is highest in Crewe and Macclesfield, however there are also opportunities in many other Key Service Centres.	To achieve maximum benefits from encouraging more people to cycle, the high potential exists in Crewe and Macclesfield. This however needs to be balanced against the needs of the wider borough.

4.3 Bus

Local buses play an important role in the transport network connecting residents to jobs, education, employment, and key services. Buses can free up capacity on roads as a mechanism for mode shift away from private car and to improve local air quality. Buses can also be a lower cost option to car ownership and provide a more sustainable alternative to the private car. A cohesive bus network creates opportunities for increased accessibility to towns, villages, and services. This also enables residents and bus users to benefit from an established sense of community, reduce social isolation and promote economic growth. Data and analysis presented in this section is summarised from the CEC Bus Service Improvement Plan, June 2024.

In recent years, local buses nationally have faced significant reductions in funding and consequently services which have impacted commuters and communities across the UK. This has resulted in reduced accessibility. Cheshire East's local bus network is made up of 37 combined bus services, of which 21 are fully supported by the council (56.8%), a further eight are partially supported by the council (21.6%), such as evening journeys and eight services (21.6%) operate on a fully commercial basis. The council currently spends circa. £2.8m per year supporting bus services which are not commercially viable but are deemed important and socially necessary. This includes cross boundary expenditure and contributions, as well as section 106 contributions from new developments.

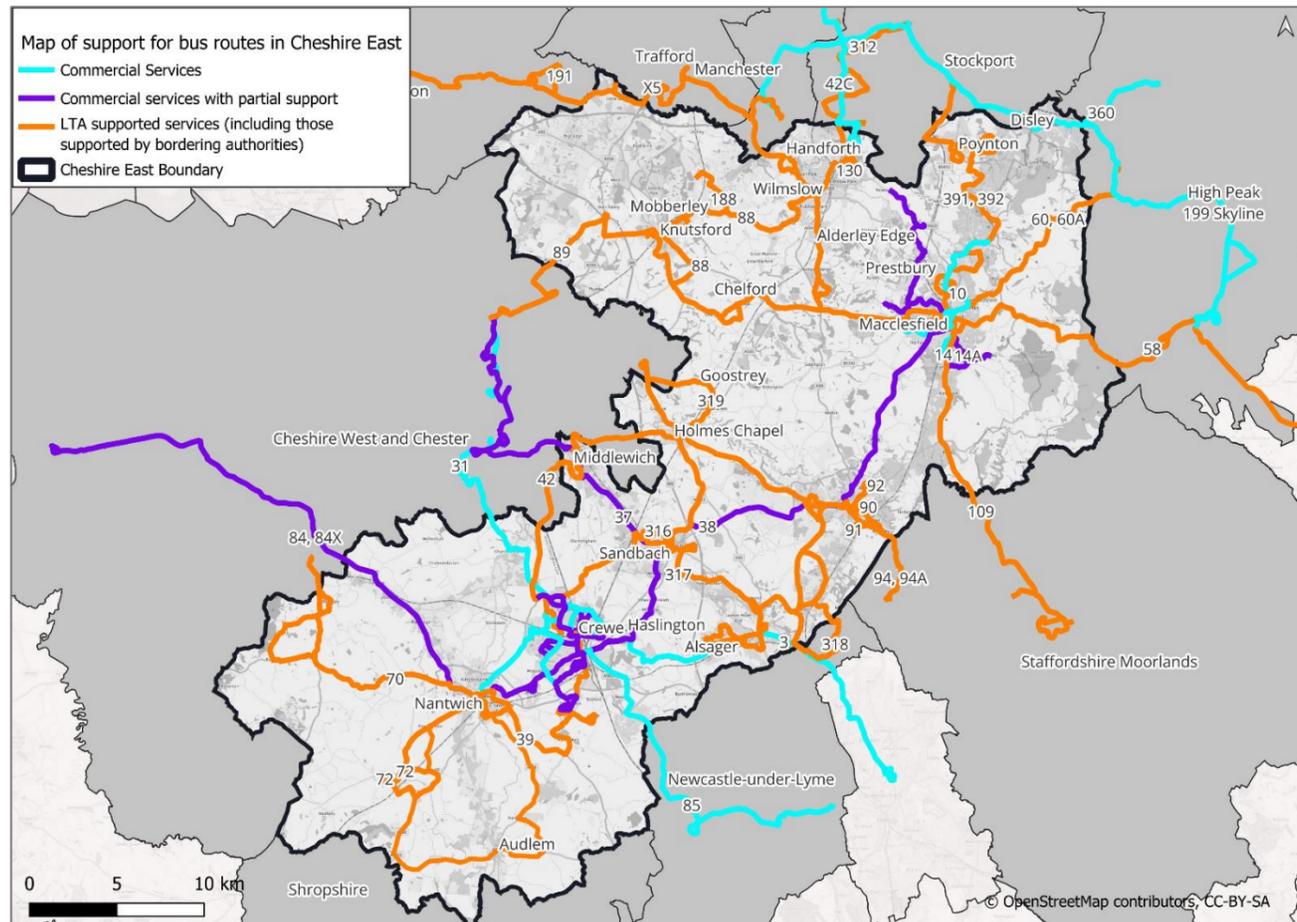


Figure 4-24 Commercial and supported bus services within Cheshire East (correct as of April 2024)

4.3.1 Bus operators

The data in Table 4-4 shows the principal bus operators which provide services across Cheshire East. The local bus network is operated by eleven commercial bus operators. D&G Coach & Bus (part of the Centrebus Group) is the predominant operator for the borough, which operates approximately half of all routes, with ten local bus operators collectively providing the remaining bus routes. Each operator, particularly for the commercial provision, is responsible for their own network planning, branding, and ticketing. Where services are financially supported, the planning for services is currently managed by Cheshire East Council (as the Local Transport Authority).

Currently, two out of the eleven operators deliver their services from an operating base or depot within the boundary of Cheshire East, and the remainder from neighbouring cross boundary locations in Cheshire West and Chester, Greater Manchester, Salford, Staffordshire, and Warrington. This reflects the close inter-relationship that Cheshire East and its neighbouring authorities has for the delivery of bus services to the borough.

Table 4-4 Bus operators within Cheshire East

Bus Company	Parent Operator or Owner	No. of Bus Routes	Principal Locations Served	Depot Location
D & G Coach & Bus	D & G Bus Ltd (Centrebus Ltd)	25	Boroughwide	Crewe, Adderley Green
Stagecoach Greater Manchester	Stagecoach Group Ltd	2	Between Stockport/Cheadle and Handforth/Poynton	Manchester
Stagecoach Merseyside, Cheshire & South Lancs	Stagecoach Group Ltd	1	Between Chester, Tarporley, Nantwich and Crewe	Chester
High Peak Buses	High Peak Buses Ltd (The Wellglade Group and Centrebus Ltd)	6	Between Macclesfield and High Peak	Dove Holes
First Potteries	First Group plc	1	Stoke-on-Trent to Crewe	Stoke-on-Trent
Hollinshead Coaches	Hollinshead Coaches Ltd	3	Congleton	Biddulph
Belle Vue Coaches	Belle Vue (Manchester) Ltd	2	Stockport to Macclesfield	Eccles
Warrington's Own Buses	Warrington Borough Transport Ltd	2	Between Knutsford and Warrington	Warrington
Aimee's Travel	Aimee's Travel Ltd	1	Macclesfield	Leek
Mikro Coaches	Mikro Coaches Ltd	1	Crewe to Nantwich	Crewe
Direct Taxis Lymm Shopper	Warrington Borough Council & Cheshire East Council	1	Little Bollington, Agden, Broomedge	Little Bollington

4.3.2 Routes and frequency

The Cheshire East local bus network operates:

- Principally between **Mondays** and **Saturdays**, with limited or no service on routes outside of urban centres on Sundays and Bank Holidays.
- During the AM peak (07:00 to 09:00), interpeak (09:00 to 16:00) and PM peak (16:00 to 18:00) periods, with a limited selection of bus routes operating during post evening peak, where typically on many routes this post evening peak does not extend beyond 18:00.
- The cross-boundary services provide key links to neighbouring service centres and employment, such as Greater Manchester, Stoke-on-Trent, Chester, and Warrington.

The following maps below illustrate coverage of the local bus network across the borough, by time period; the weekday AM peak period, weekday interpeak and weekday PM peak. **Please note the maps were produced and analysed in April 2024 and will be updated following the implementation of the bus service review in April 2025.**

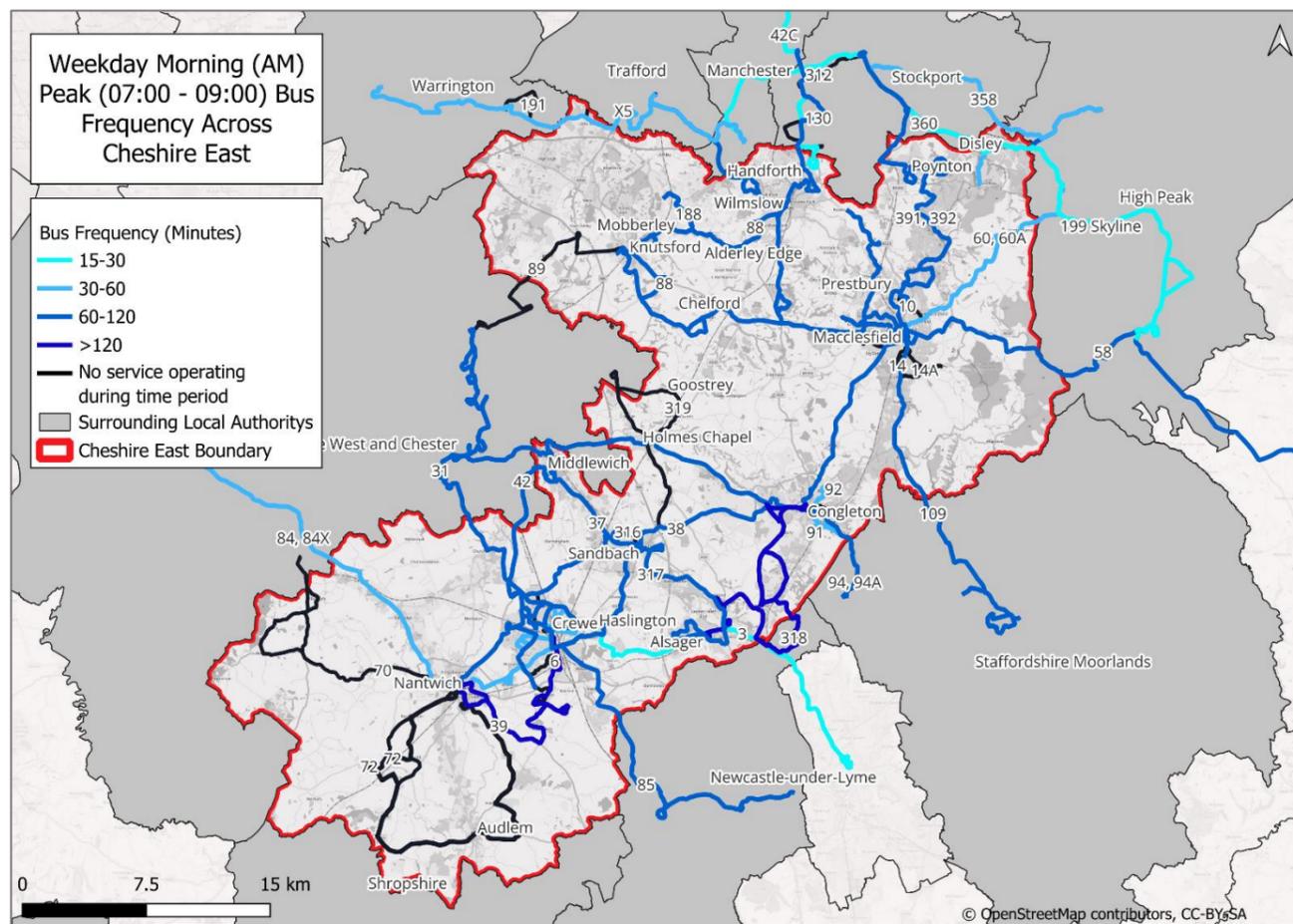


Figure 4-25 Weekday Morning (AM) Peak 07:00 – 09:00 - Bus Frequency Across Cheshire East (April 2024)

Figure 4-25 shows that between 7am and 9am on a weekday, the most common bus frequency in Cheshire East is every 60 to 120 minutes. This can be seen around Crewe, Sandbach, Macclesfield, Knutsford, and Poynton. The routes that have no operating service during this time are around Audlem, south and west of Nantwich and west of Knutsford. The most frequent route running every 15 to 30 minutes is between Crewe and Alsager, and routes on the border with Greater Manchester in Handforth and Disley.

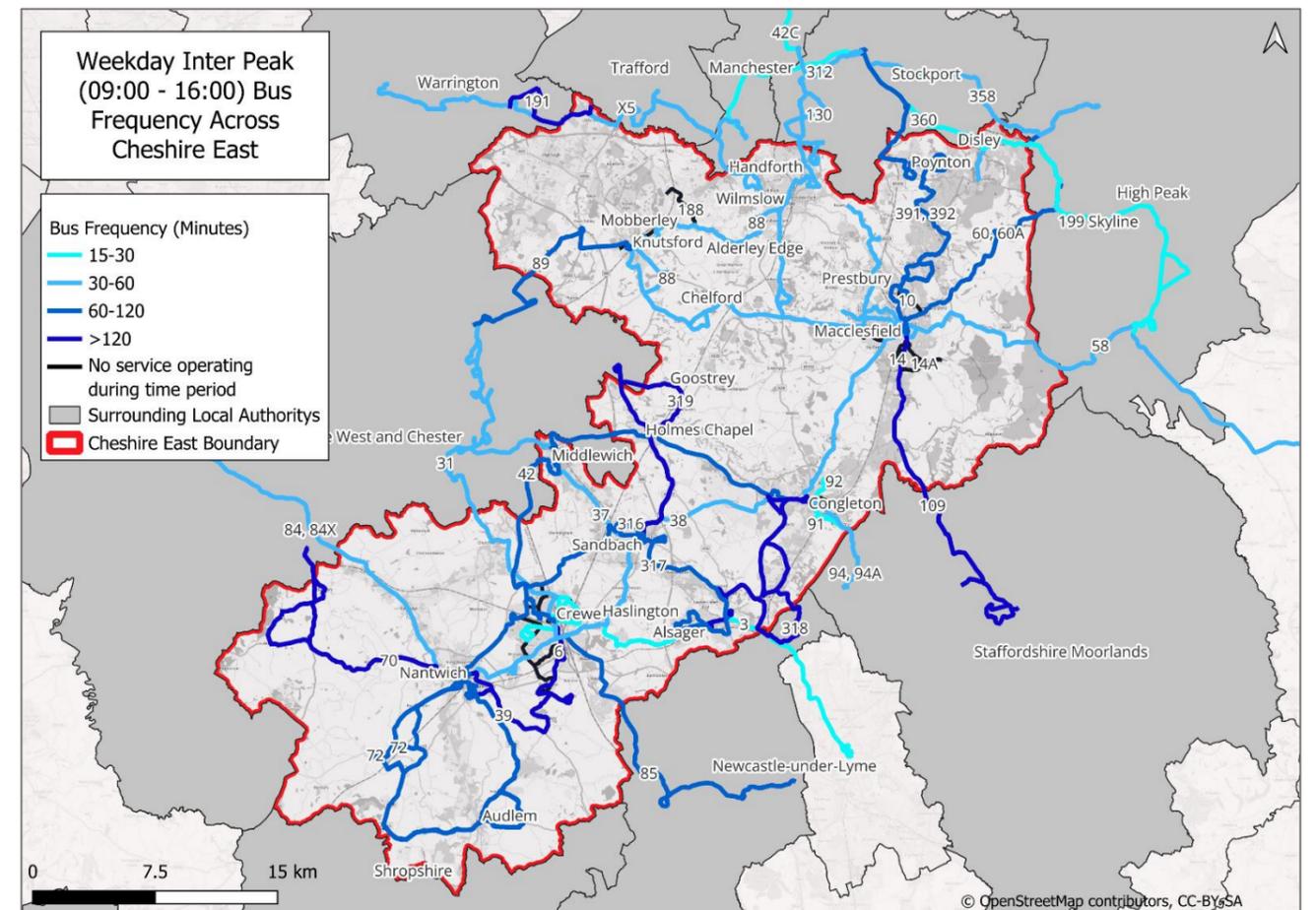


Figure 4-26 Weekday Inter Peak 09:00 - 16:00 - Bus Frequency Across Cheshire East (April 2024)

Figure 4-26 shows that between 9am and 4pm on a weekday the most common bus frequency in Cheshire East is every 30 and 60 minutes. This can be seen around Macclesfield, north of Congleton, Chelford, north west of Crewe, Wilmslow and Handforth. The routes that have no service during this time are within Crewe and Mobberley. The most frequent route running every 15 to 30 minutes, can be seen between Crewe and Alsager, between Mobberley and Knutsford and routes on the border with Greater Manchester in Disley.

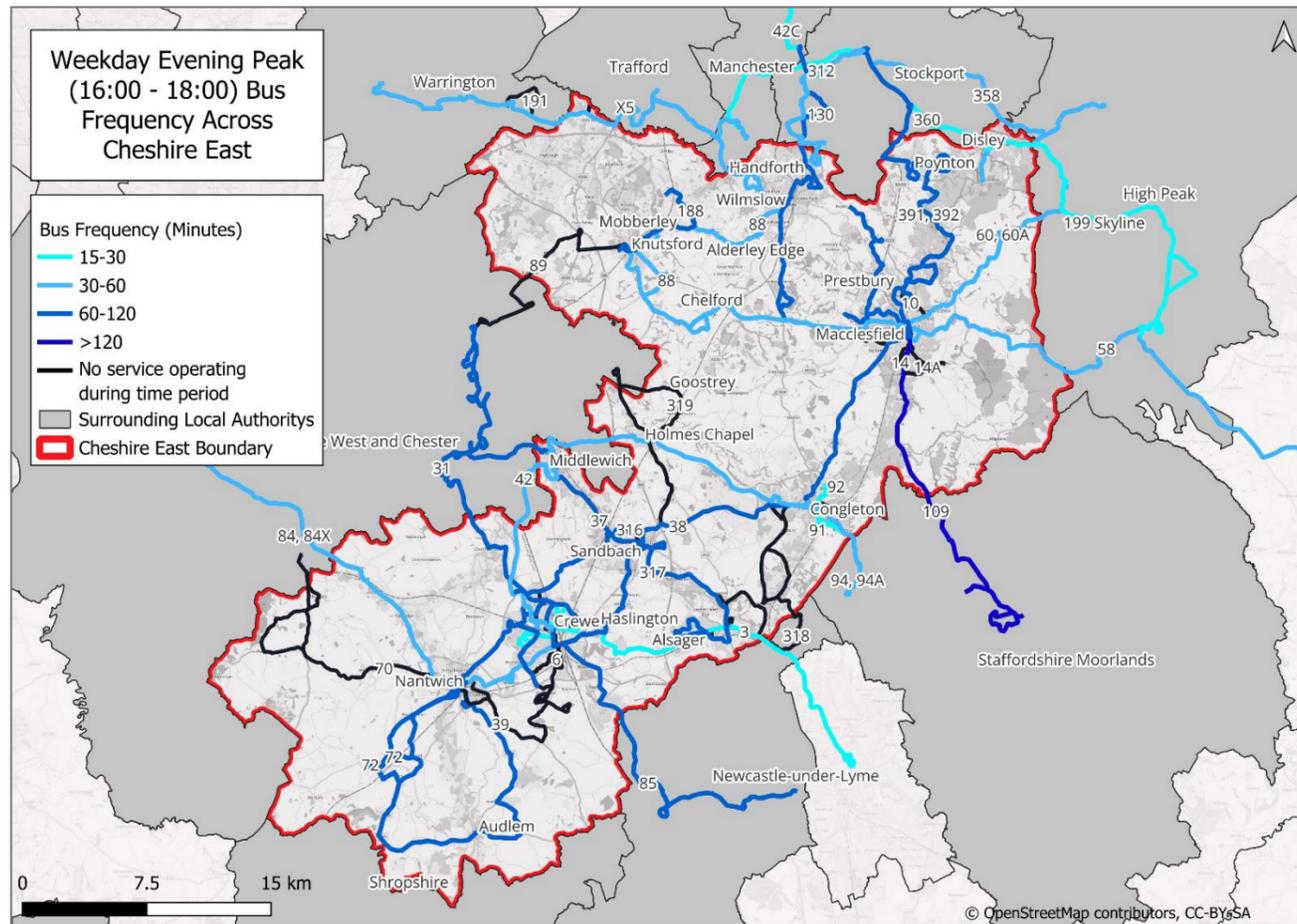


Figure 4-27 Weekday Evening Peak 16:00 - 18:00 - Bus Frequency Across Cheshire East (April 2024)

Figure 4-27 shows that between 4pm and 6pm on a weekday the most common bus frequency in Cheshire East is every 60 to 120 minutes. This can be seen around Audlem, Poynton, Sandbach, Mobberley, Prestbury and Handforth. The routes that have no service operating during this time period can be seen around Nantwich, north and south of Holmes Chapel and north east of Alsager. The most frequent route running every 15 to 30 minutes can be seen between Crewe and Alsager, north of Congleton, and routes on the border with Greater Manchester in Disley.

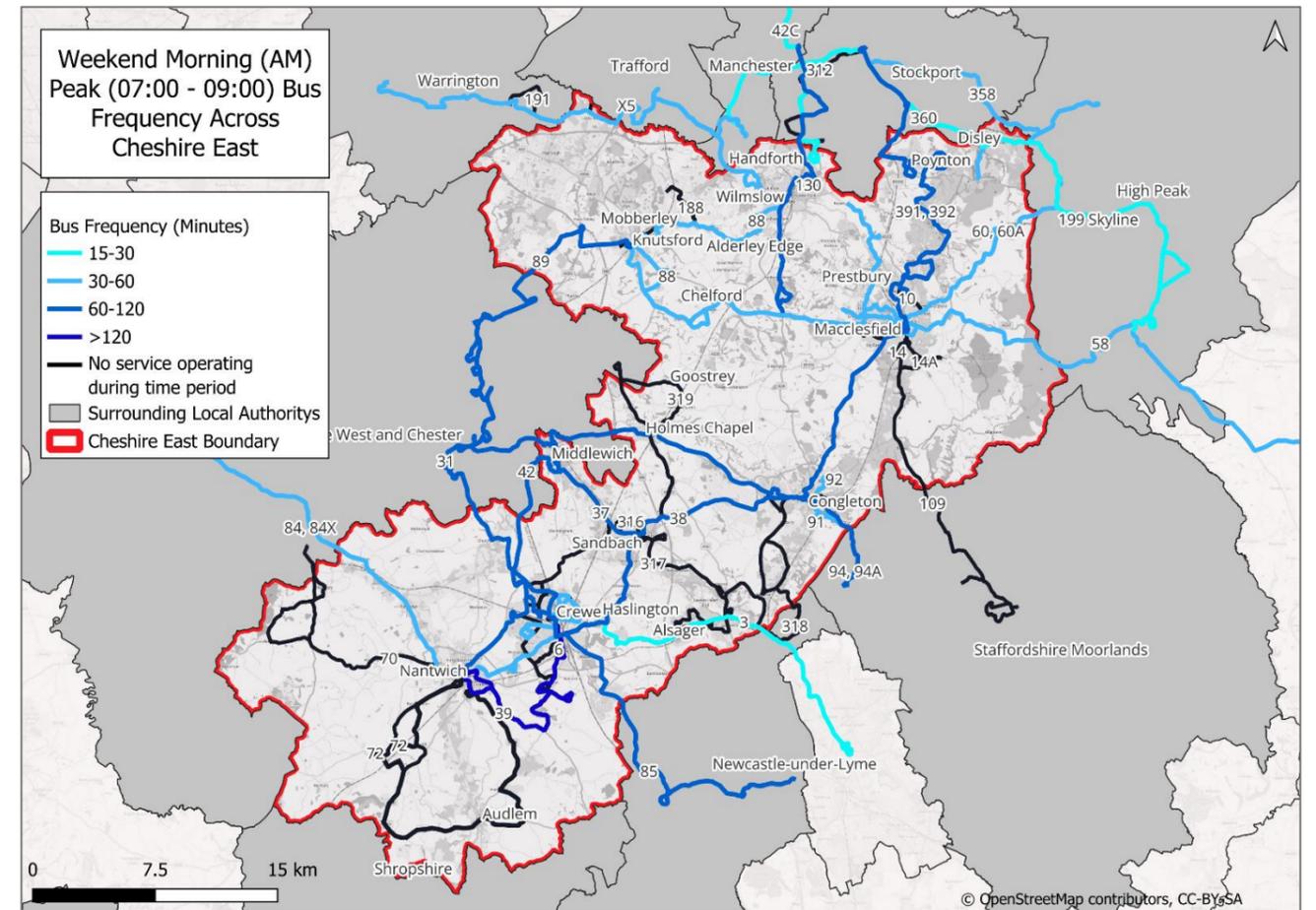


Figure 4-28 Weekend Morning (AM) Peak 07:00 - 09:00 - Bus Frequency Across Cheshire East (April 2024)

Figure 4-28 shows that between 7am and 9am on a weekend, the most common bus frequency in Cheshire East is every 60 to 120 minutes. This can be seen south of Macclesfield, west of Congleton, north of Crewe, Middlewich and south east of Holmes Chapel. The routes that have no service operating during this time period can be seen south and west of Nantwich, Audlem, north and south of Holmes Chapel, south of Macclesfield and north east of Alsager. The most frequent route running every 15 to 30 minutes can be seen between Crewe and Alsager, and routes on the border with Greater Manchester in Handforth and Disley.

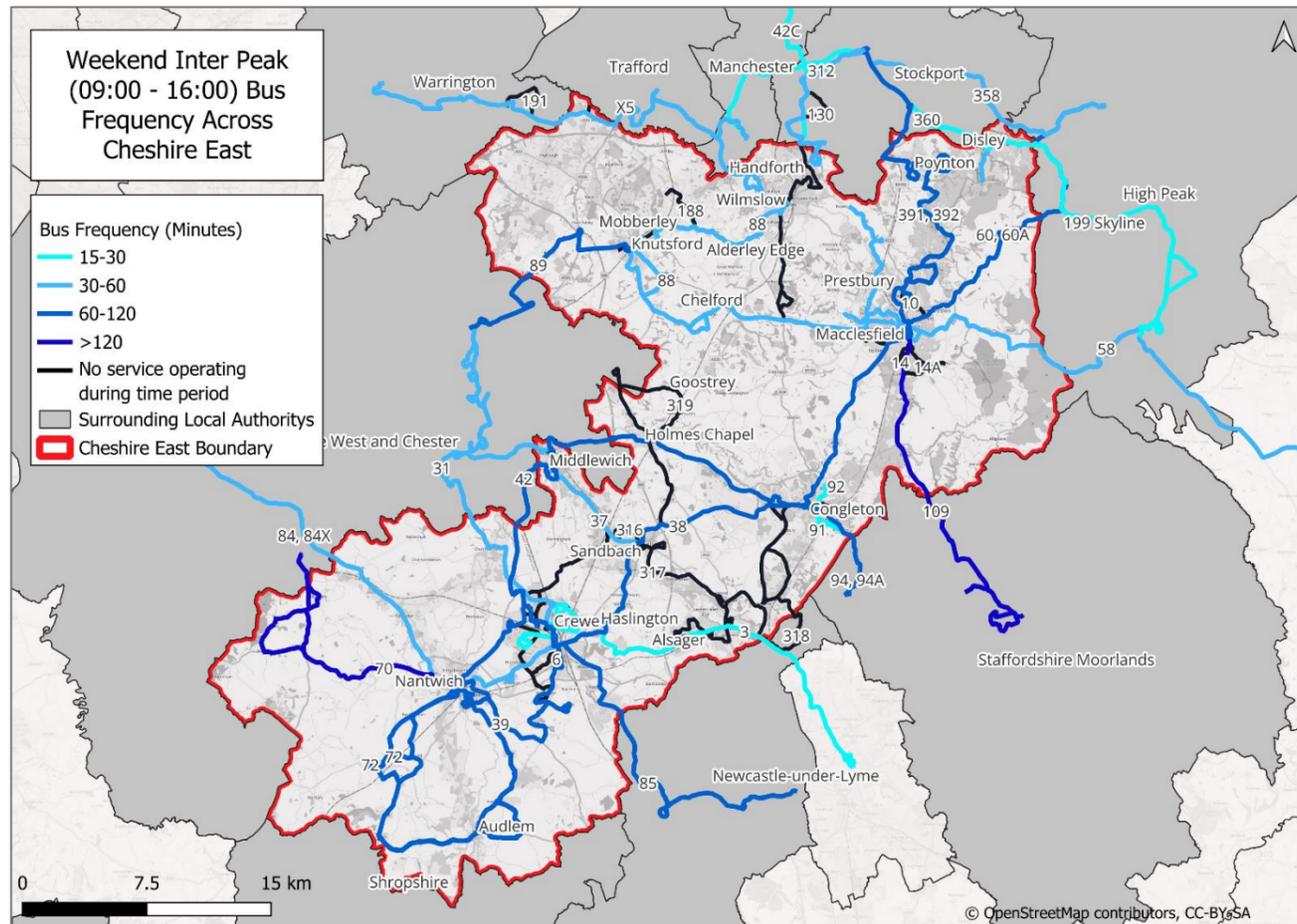


Figure 4-29 Weekend Inter Peak 09:00 - 16:00 - Bus Frequency Across Cheshire East (April 2024)

Figure 4-29 shows that between 9am and 4pm on a weekend, the most common bus frequency in Cheshire East is every 60 to 120 minutes. This can be seen around Audlem, south of Macclesfield, south of Poynton and between Sandbach and Congleton. The routes that have no service operating during this time period can be seen in Handforth and south of Wilmslow, south east of Sandbach, north west of Alsager and south of Holmes Chapel. The most frequent route running every 15 to 30 minutes can be seen between Crewe and Alsager, and routes on the border with Greater Manchester in Disley.

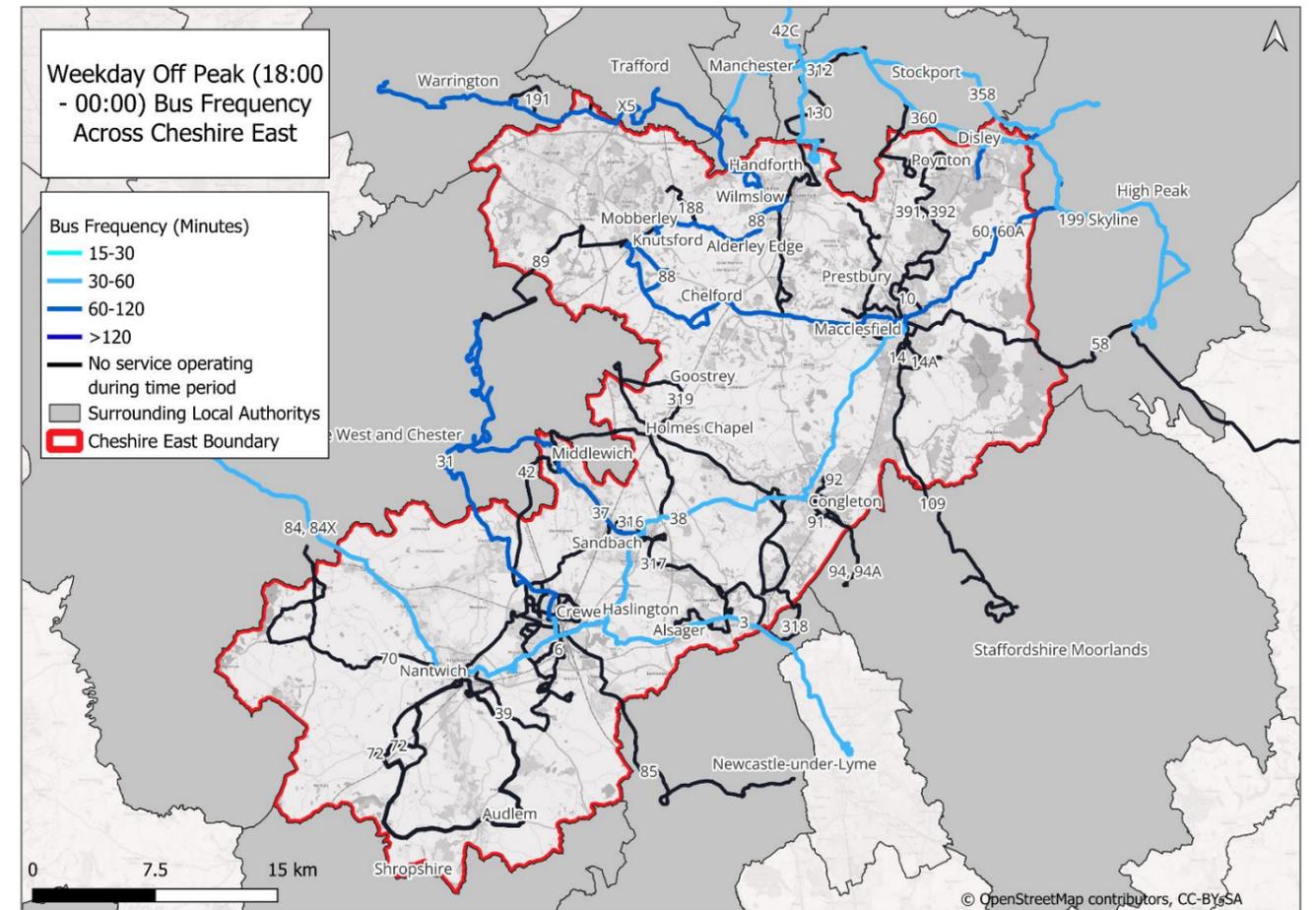


Figure 4-30 Weekend Off Peak 18:00 - 00:00 - Bus Frequency Across Cheshire East (April 2024)

Figure 4-30 shows that between 6pm and 12am on a weekend, a lot of Cheshire East has no service operating during this time period. This can be seen around Nantwich, Audlem, Holmes Chapel, south east Crewe, Prestbury, south Macclesfield and Poynton. However, there are some services operating as shown by the blue lines. These include but are not limited to around the north west of Nantwich, north east of Congleton, north east of Crewe towards Sandbach, between Crewe and Alsager and south west of Macclesfield towards Congleton.

The analysis of these maps shows that bus services are more frequent during weekday morning and evening peaks and weekend interpeak. Bus services are less frequent during weekday interpeak times and weekend off peak. This reduces the access to services for those requiring them during these periods. It can be seen that bus frequency is higher in more urban areas compared to more rural areas, for example bus frequency is higher in Crewe and Macclesfield compared to Audlem, Nantwich and south Macclesfield.

4.3.3 Ticketing/fares

Cheshire East does not currently have a multi-operator ticketing (MOT) arrangement in place across the borough, with the exception of Macclesfield which recently implemented a MOT scheme entitled 'Silk Town Ticket' in September 2024 for a one-year trial. In areas in the north of the borough, close to the Greater Manchester boundary (i.e., Poynton and Wilmslow), passengers are able to access the 'System One' range of tickets for adults, but this is limited to areas close to the Greater Manchester Combined Authority area boundary.

Bus service data from May 2023 to March 2024 provided by Cheshire East Council and operators show that between 36-44% of trips are made using concessionary passes.

The DfT launched the £2 bus fare cap on 1st January 2023, aiming to reduce travel costs for individuals in response to increased cost of living pressures. This scheme caps adult single fares to £2 and is in place across Cheshire East operators. Initially set to run until 31 March 2023, the government extended the fare cap until 31 October 2023 and subsequently extended this commitment to 31 December 2024. In a pre-budget speech on Monday 28 October 2024 the Prime Minister announced that the fare cap will be extended further from the 1 January 2025 through to the end of December 2025 at the increased price of £3.

The current bus fare cap applies to all but one of the local bus operators in Cheshire East (see below). Hollinshead Coaches has not previously participated in the fare cap scheme due to their maximum fare being below £2.

- D & G Coach & Bus;
- Stagecoach Greater Manchester;
- Stagecoach Merseyside, Cheshire and South Lancs;
- High Peak Buses;
- First Potteries;
- Warrington's Own Buses;
- Belle Vue;
- Mikro Coaches;
- Aimee's Travel; and
- Direct Taxis.

The DfT published an interim report in February 2023 on the £2 fare cap that found patronage was continuing to recover in the aftermath of the COVID-19 pandemic, and the fare cap may be playing a role in this recovery.

National patronage for January and February 2023 increased by 20% compared to the October 2022 - January 2023 period (which saw a decrease by 3%). A Transport Focus survey found that 80% of respondents agreed that the fare cap may mitigate the current cost-of-living crisis and the scheme was also perceived to have the largest impact on the cost of living for younger people.

Cheshire East Council is keen to see rapid expansion of opportunities for smart, integrated ticketing on bus services and across different modes of public transport. It was further noted by the council in the October 2021 BSIP that 'any scheme

that can be extended and implemented to serve Cheshire East and our wider sub-region would be of particular benefit to passengers in the borough'.

The council have been engaged with the DfT and their development work on Project Coral. This initiative, supported by DfT, involved operators collaborating to implement multi-operator day and weekly 'best fare' contactless capping after a successful pilot in Leicester⁶⁹.

4.3.4 Patronage (DfT Bus Statistics)

Since 2010/11 to 2022/23, the data analysed shows the total number of passenger journeys on local bus services per year has decreased from 5.6m (2010/11) to 3.8m in 2019/20, a decrease of 32.14% in ten years. This decline has been substantially greater when compared to the decline in total number of passengers journeys on local bus services in the wider North West (19.43%) and England (11.82%) in the same time period.

Table 4-5: Passenger Journeys (DfT Bus Statistics)

Passenger journeys	Cheshire East (Million)	North West (Million)	England (Million)
Total 2010/11	5.6	457.0	4618.4
Total 2019/20	3.8	368.2	4072.6
Total 2021/22	2.2	255.8	2835.3
Total 2022/23	2.8	301.7	3383.2
Change 10/11 - 19/20	-32.14%	-19.43%	-11.82%
Change 19/20 - 21/22	-42.11%	-30.53%	-30.38%
Change 21/22 - 22/23	+27.27%	+17.94%	+19.32%
Concessionary 2010/11	2.2	128.6	1044.0
Concessionary 2019/20	1.8	98.7	899.0
Concessionary 2021/22	1.1	63.4	554.2
Concessionary 2022/23	1.2	70.8	643.4
Change 10/11 - 19/20	-18.18%	-23.25%	-13.89%
Change 19/20 - 21/22	-38.89%	-35.76%	-38.35%
Change 21/22 - 22/23	+9.09%	+11.67%	+16.09%

Whilst the decline is part of a wider trend, reflected in both regional and national figures, it is more pronounced in Cheshire East than nationally across England. In comparison, by 2019/20 the total number of passenger journeys on local bus services per year declined by 19% in the North West and by 12% in England. For 2021/22, there has been a decrease of 31% across the North West and 30% in England, which is significantly higher than the decreases seen in 2019/20 data.

The decline is less pronounced in concessionary fare passenger journeys in Cheshire East when compared to the wider North West region, but greater than nationally across England. It is likely that the further decline between 2019/20 and 2021/22 has been exacerbated by the COVID-19 pandemic and associated lockdowns, with similar levels of decline across Cheshire East, the North West region and nationally across England.

⁶⁹ Leicester Buses Tap On Tap Off Multi-Operator Contactless Capping Update – 1 Year Later (firstbus.co.uk)

Table 4-6 Passenger journeys per head (DfT Bus Statistics)

Passenger journeys per head	Cheshire East	North West	England
Total 2010/11	15.2	65.1	87.7
Total 2019/20	10.0	50.2	72.4
Total 2020/21	2.7	19.3	27.9
Total 2021/22	5.6	34.5	50.2
Total 2022/23	6.9	40.6	59.8
Change 10/11 - 19/20	-34.21%	-22.89%	-17.45%
Change 19/20 - 21/22	-44.00%	-31.27%	-30.66%
Change 21/22 - 22/23	+23.21%	+17.68%	+19.12%

Table 4-6 summarises the number of passenger journeys ‘per head’ for Cheshire East, compared to the North West and wider England statistics. It shows the number of passenger journeys per head in Cheshire East decreased by 44% from 2019/20 to 2021/22. However, the 23.21% increase between 21/22 and 22/23 in Cheshire East is higher than both the North West and England, showing growth in passenger journeys per head to be above regional and national averages. It is evident that by 2022/23 passenger journeys per head in Cheshire East, the North West and England have begun to recover, however not to the 2019/2020 (pre-COVID) levels.



Figure 4-31 Fare-paying and concessionary fare passengers for supported bus services (May 2023 - March 2024)

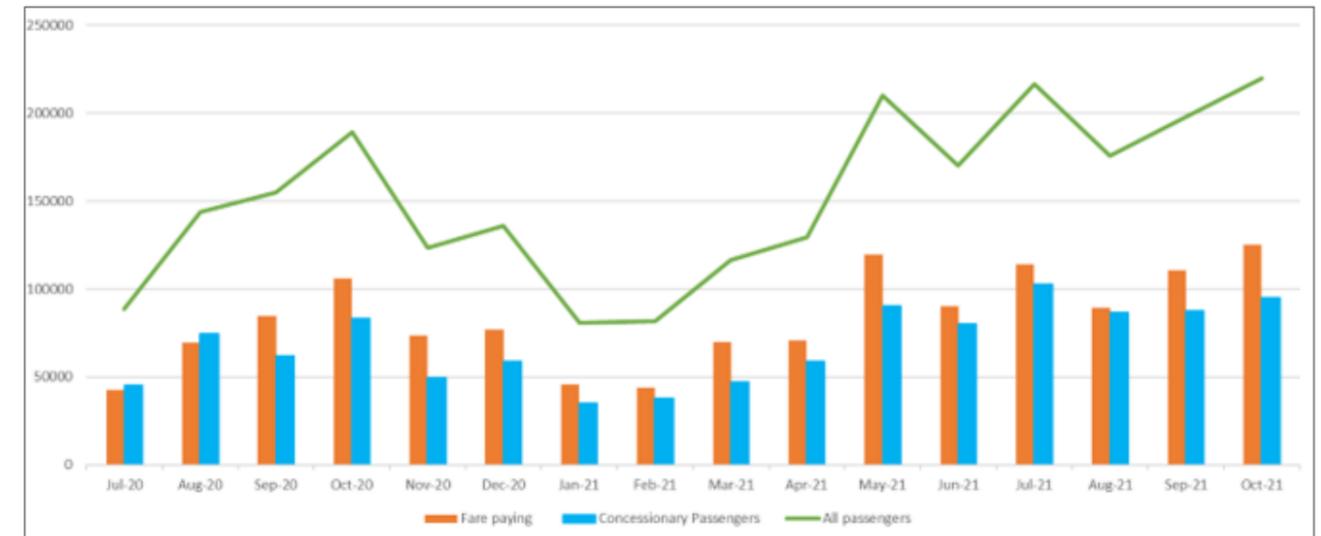


Figure 4-32 Fare-paying and concessionary fare passengers for supported bus services - 2021 BSIP (July 2020 - October 2021)

The passenger journeys ‘per head’ in 2022/23 are at much lower levels in Cheshire East (6.9) than in the North West (40.6) and England (59.8). The latter two can be explained by the higher numbers of journeys per head in metropolitan areas, as well as in London, which disproportionately affect the national average.

Cheshire East recorded the fourth lowest number of bus journeys per head in 2019 out of all local authorities in England (outside London) and dropping to third lowest in 2023. Data provided by operators in 2021 demonstrated the further decline in bus patronage as a result of the COVID-19 pandemic which can also be seen in the number of passenger journeys per head for 2020/21. However, growth can be seen by the increase of passenger journeys per head between 2020/21 and 2021/22 of 2.9 million, likely due to less severe restrictions from the COVID-19 pandemic.

Figure 4-31 and Figure 4-32 illustrates the changes in patronage, both fare-paying and concessionary fare passengers for bus services which are supported (financially) by the council.

Patronage data received to March 2024, provided by bus operators in Cheshire East, reflects a post-COVID recovery in passenger numbers with journeys returning to near pre-COVID levels. Concessionary fare passenger numbers have remained relatively consistent since May 2023, however, there has been a greater increase in fare paying passengers, likely following the introduction of the £2 bus fare cap.

4.3.5 Method of travel to work

The data in Table 4-7 (ONS, 2021) shows the method of travel to work by mode, organised by most used to least used.

Table 4-7 Method of travel to work by mode in Cheshire East (ONS 2021)

Total: All usual residents aged 16 years and over in employment the week before the census	192,487	100.0 (%)
Driving a car or van	93,442	48.5
Work mainly at or from home	67,827	35.2
On foot	13,950	7.2
Passenger in a car or van	7,454	3.9
Bicycle	3,537	1.8
Train	1,630	0.8
Other method of travel to work	1,627	0.8
Bus, minibus, or coach	1,328	0.7
Taxi	931	0.5
Motorcycle, scooter or moped	663	0.3
Underground, metro, light rail, tram	98	0.1

It is important to note that the 2021 Census was carried out during the COVID-19 pandemic, where travel behaviours and working patterns were considerably altered – whereby generally public transport was less attractive due to restrictions and transmission of the virus. This contributed towards adversely attitudes towards travel by bus reflected in less than 1% mode share. However, 2011 Census data shows bus share also being low, indicating bus mode share has been low for a considerable time, prior to the COVID-19 pandemic.

Table 4-8 Travel to work via bus Census 2011/21

Census Date	Cheshire East	North West	England
Census 2011	1.2	5.2	4.9
Census 2021	0.7	4.3	4.3

Table 4-8 shows the percentage of individuals travelling to work via bus for Cheshire East, the North West and England. The data shows that Cheshire East has significantly lower percentages of individuals travelling to work via bus compared to the North West and England, 0.7% in 2021, compared to 4.3% for the North West and 4.3% for England. This shows that the population of Cheshire East may rely on other modes of transport such as car, rail and walking due to the lower frequency of buses in more rural areas, meaning travelling to work via bus is not justifiable for many.

Figure 4-33 shows how commuter bus shares vary across the borough. As shown below, the use of bus for commuting is divided along rural-urban lines based on available services across the network. This can be seen in Crewe and Macclesfield, where the share of commuting trips by bus is higher than more rural areas. However, the higher modal shares in Crewe and Macclesfield remain well below the rates seen in the North West and in England. The data highlights that bus usage is highest in urban areas. This is partly driven by higher densities of employment and residential areas.

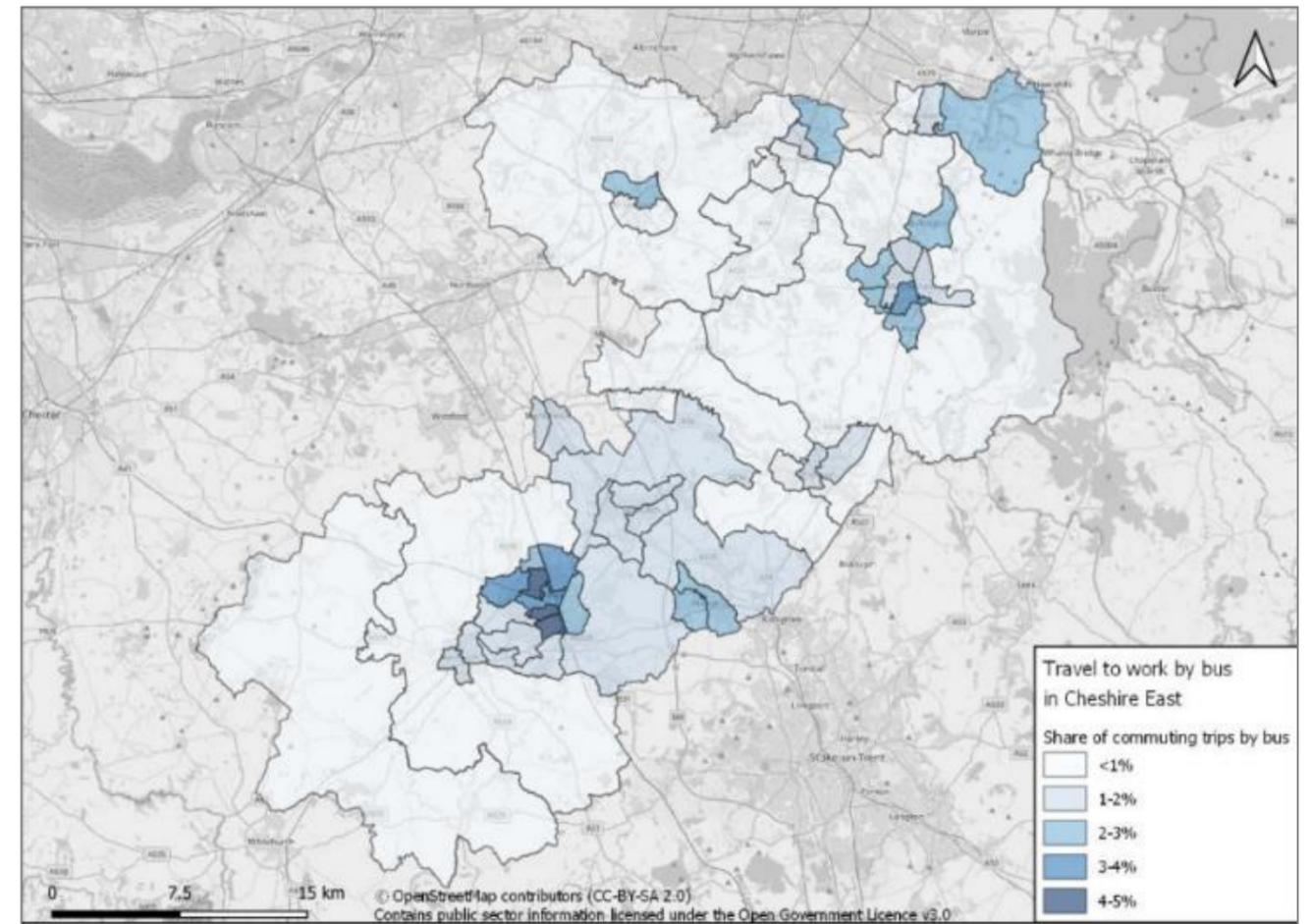


Figure 4-33: Proportion of commuting trips by bus in Cheshire East (Census 2011)

4.3.6 Punctuality and reliability

Bus journey time reliability and punctuality within Cheshire East has and continues to be impacted by congestion and delays, particularly for town/urban bus services during peak periods.

In recent years, Cheshire East Council has continued analysis on locations of general traffic congestion and pinch-points across the network.

Traffic delays through 'Inrix' data has been analysed from June 2022 (latest available at the time of assessment) to identify consistent congestion hotspots on the bus network. This has been undertaken specifically to understand how delays to traffic have been impacting on bus journey times and to identify where average vehicle speeds are notably lower than anticipated.

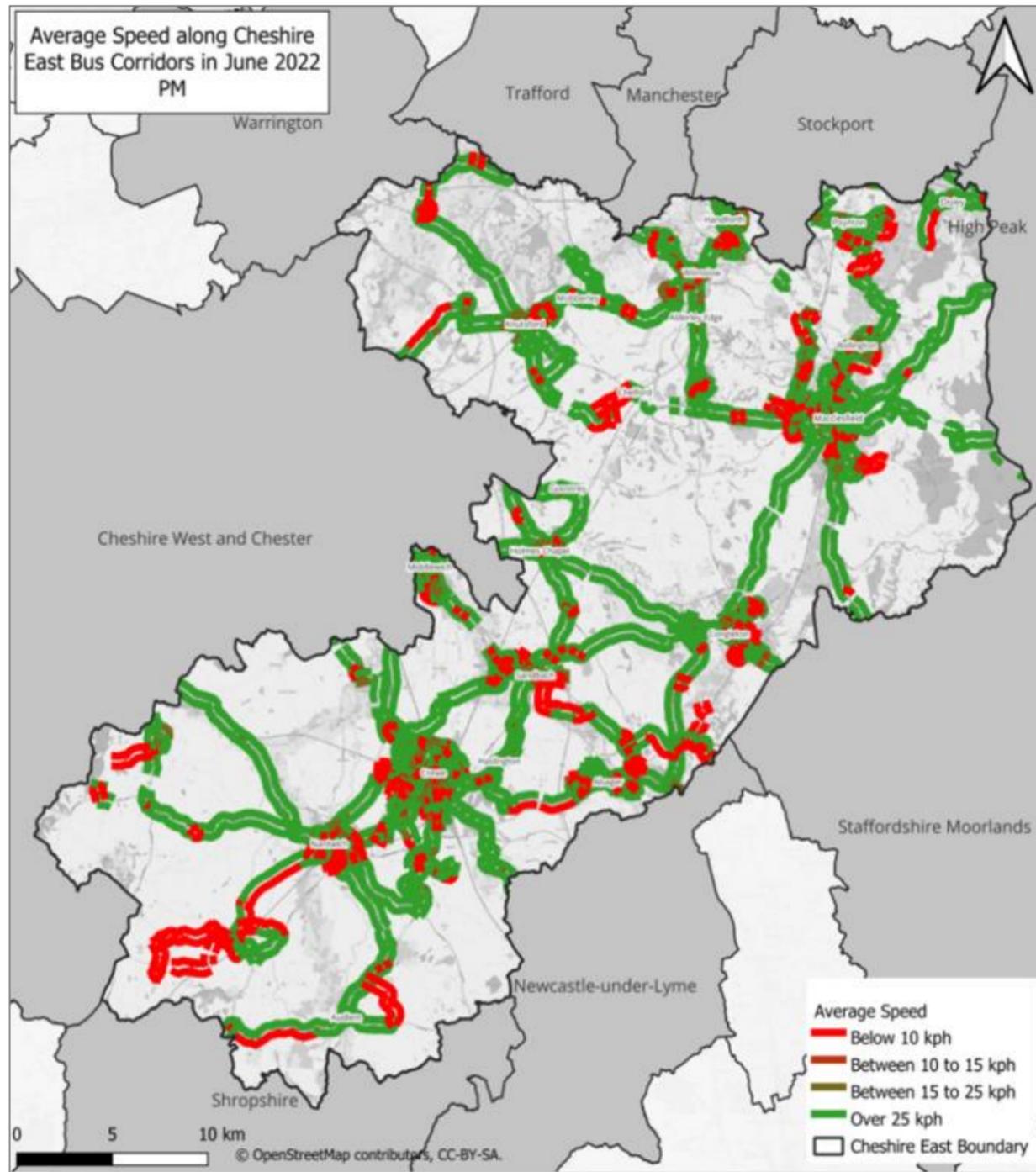


Figure 4-34 Average speed along Cheshire East corridors – PM (June 2022)

Figure 4-34 and Figure 4-35 overleaf show key locations of delay have predominately been identified in the principal towns of Crewe and Macclesfield as well as, to a lesser extent, other key service centres.

The data broadly aligns to early stakeholder feedback specifically relating to network congestion locations and pinch points.

From this analysis, the locations which have experienced the greatest level of delay include:

- A534 Nantwich Road, Crewe (from roundabout junction with Crewe Road/Weston Road, passing railway station and signal junction with A5019 Mill Street/South Street);
- Nantwich Road (from Dane Bank Avenue to Crewe Railway Station) at peak times;
- Crewe Green Roundabout;
- Nantwich Road at Williston Corner (Crewe);
- West Street with the corner of Underwood Lane (Crewe);
- West Street and Minshull New Road (Crewe);
- West Street and Frank Webb Avenue (Crewe);
- Earle Street, Crewe (in particular between junction with Manchester Bridge, in vicinity of the retail park, to roundabout junction with A5019 Vernon Way);
- Macon Way, Crewe (in particular northbound from junction with A534 Crewe Road/Nantwich Road to junction with Manchester Bridge/Hungerford Road);
- Access from Brookhouse and Shavington areas onto Gresty Road and from Gresty Road onto Nantwich Road;
- Crewe Green Roundabout (Crewe);
- A536 Park Lane/Congleton Road/Oxford Road/Ivy Lane (Flowerpot) signal junction, (Macclesfield);
- A523 The Silk Road/A537Hibel Road/Hurdsfield Road (Tesco) roundabout junction; and
- A533 Middlewich Road/Crewe Road/Old Mill Road (Glasshouse) roundabout (Sandbach).
- The council have undertaken a detailed feasibility study and assessment of the potential for bus priority interventions within key towns and locations across the borough. This also builds on the initial adaptive signals pilot (Imflow) in Crewe which has recently been implemented. The study identified an initial prioritised list of key locations for discrete bus priority measures across the highway network (see below). By addressing congestion and delay to the bus network, the intention to improve bus services and their reliability and punctuality.Crewe - A534 Nantwich Road Corridor: between A5019 Mill Street/ South Street traffic signal junction and Crewe Arms Roundabout.
- Crewe - A532 West Street/ Frank Webb Avenue priority T-junction.
- Macclesfield – A523 London Road/ Byrons Lane traffic signal junction.
- Middlewich - A54 Kinderton Road/ Leadsmithy Street traffic signal junction.
- Nantwich - B5341 Waterlode/ Welsh Row/ High Street traffic signal junction.

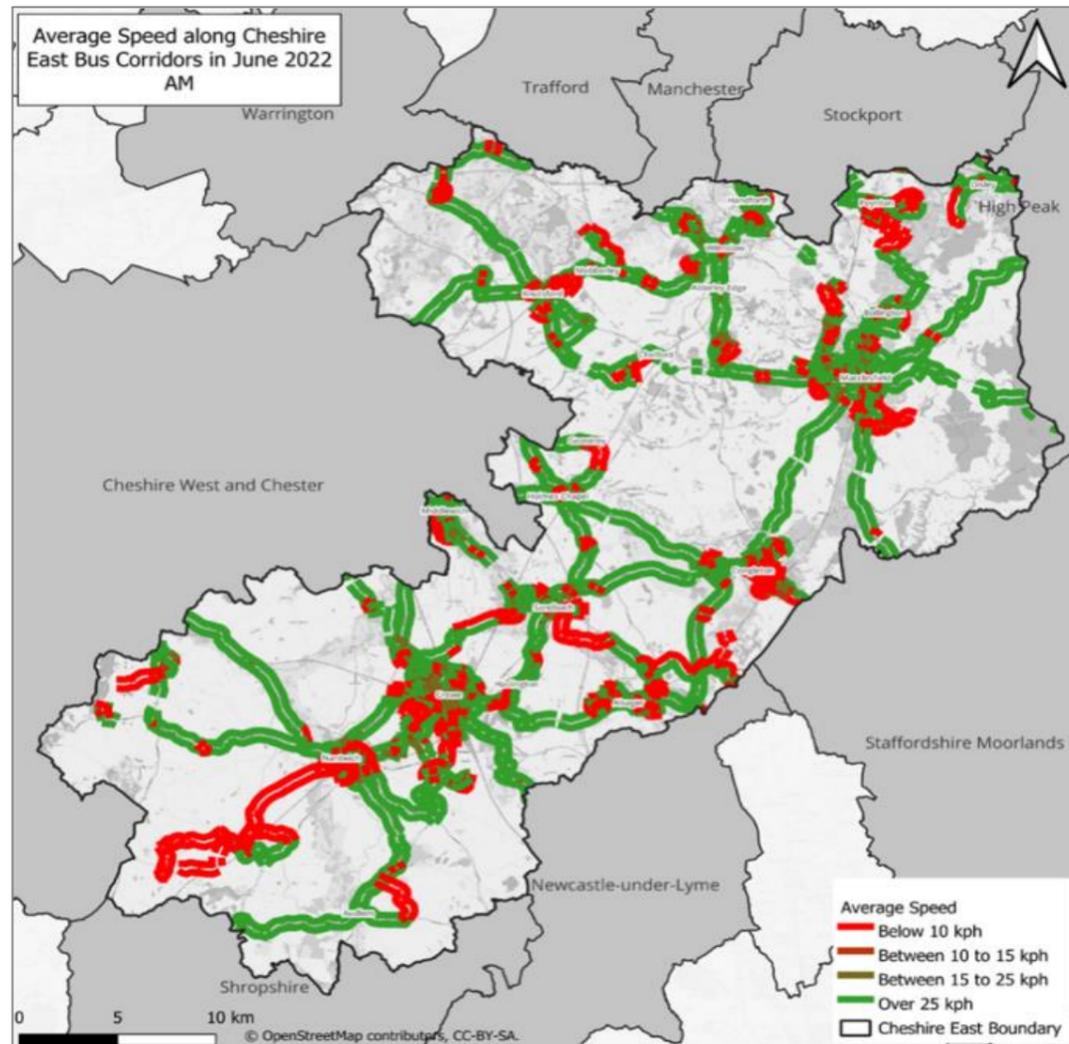


Figure 4-35 Average speed along Cheshire East Bus Corridors – AM (June 2022)

Currently, there is limited bus priority in place within Cheshire East to support the reliability and punctuality of bus services. A single bus lane (approx. 250m in length) is located in Crewe along the A534 Crewe Road, passing the retail park, between the Crewe Green Road junction and the junction with Nantwich Road and Weston Road. The congestion and delays as a result of the level of traffic flows in central Crewe, owing to accessing the retail park, had been causing punctuality and reliability issues to bus services using the road. This bus lane provides an opportunity for bus services to 'get to the head' of queuing traffic, whilst still maintaining access to retail and employment adjacent to the road network.

Cheshire East is also currently trialling intelligent adaptive signals pilot in Crewe, to address operational and performance issues at the specific signal junctions. This technology has been installed at the Nantwich Road, Gresty Road and Edleston Road junction; the junction of Mill Street and South Street; and the junctions of Nantwich Road/South Street and Nantwich Road/Gresty Road.

There are opportunities to further develop these schemes to facilitate bus priority, as well as the potential to roll out to other locations within Crewe and wider Cheshire East, if this trial proves successful. The council will continue to monitor the implementation of this pilot programme, as well as assessing the suitability for future applications within the borough, and the outputs will be developed as part of the 2024 BSIP programme.

4.3.7 Journey times

The following figures illustrate the accessibility of the towns and key service centres by bus, with travel time in minutes. Analysis has been conducted for within the weekday AM peak (06:00 - 09:00), the weekday PM peak (16:00 - 19:00) and Saturdays and Sundays (11:00 - 16:00). The isochrones show the areas that can be accessed within 20, 30 and 40 minutes, this considers the bus timetable and walking to the bus stops. The figures are based on data from January, February and March 2024 and the maps are correct as of April 2024.

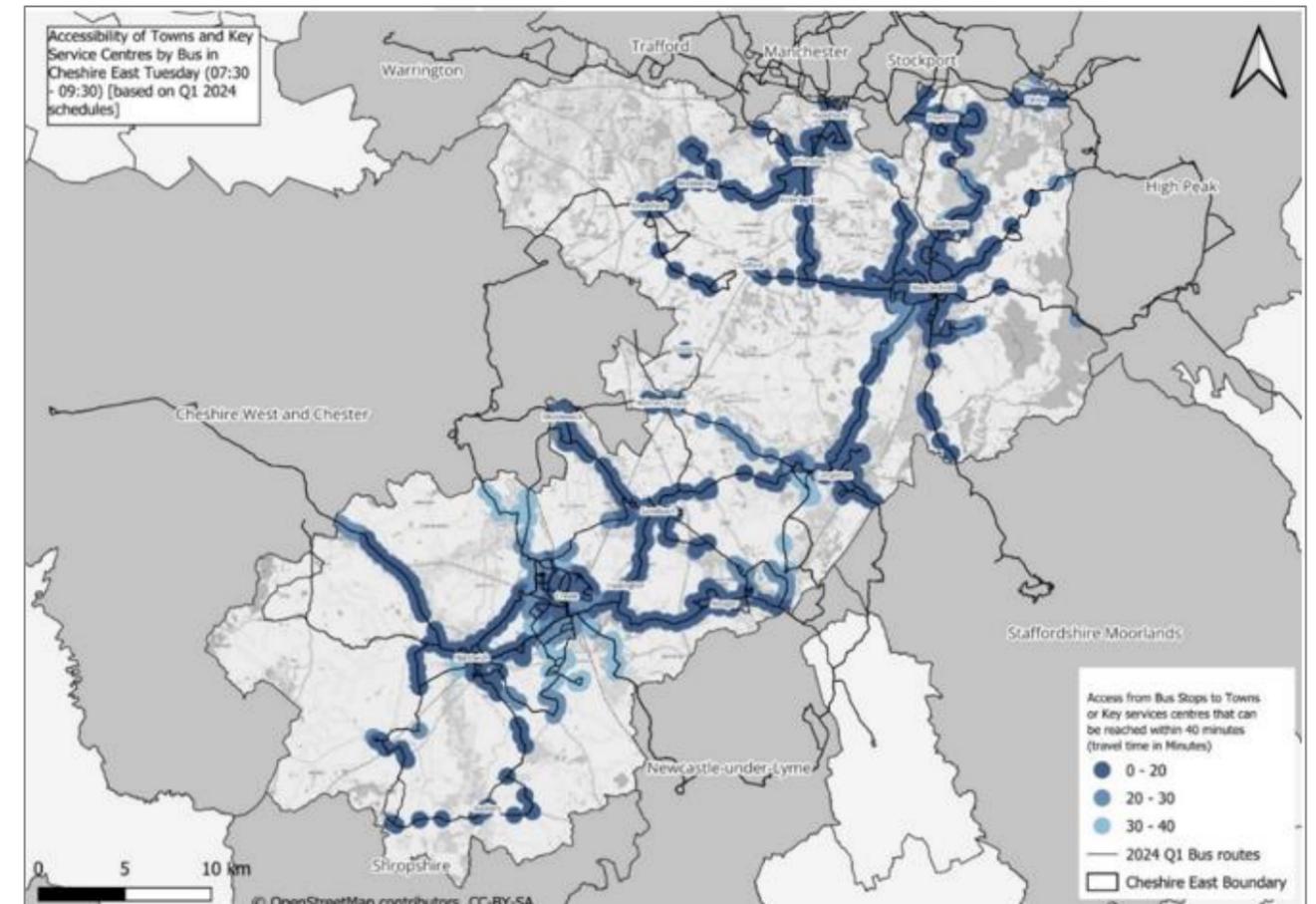


Figure 4-36: Accessibility of the towns and key service centres by bus (April 2024)

Figure 4-36 illustrates the accessibility of the towns and key service centres by bus, with travel time in minutes, within the AM peak (07:30 - 09:30). Table 4-9 shows that an average of 85% of the population in the AM peak period can reach a town or key service centre within 40 minutes. The figure shows that there is better accessibility around the towns and key service centres than in rural areas, therefore the denser and more urban the area, the greater the level of service.

Table 4-9 Cheshire East residents within a 40-minute journey of a principal town/key service centre

Day and time period	Percentage of population with access to towns and key service centres within 40 minutes
Weekday AM Peak period (07:30-09:30)	85%
Weekday Inter Peak period (09:30-16:00)	88%
Weekday PM Peak period (16:00-18:00)	84%
Weekday Evening period (18:00-23:59)	72%

Day and time period	Percentage of population with access to towns and key service centres within 40 minutes
Saturday (09:30-16:00)	84%
Sunday (09:30-16:00)	25%

Table 4-9 shows that on an average weekday there is over 80% of the population that have access to a town/key service centre within a 40-minute journey time by bus. A typical Saturday gives a similar level of service; however, the Sunday level of service provides the lowest access with just 25% of the population having access within 40 minutes.

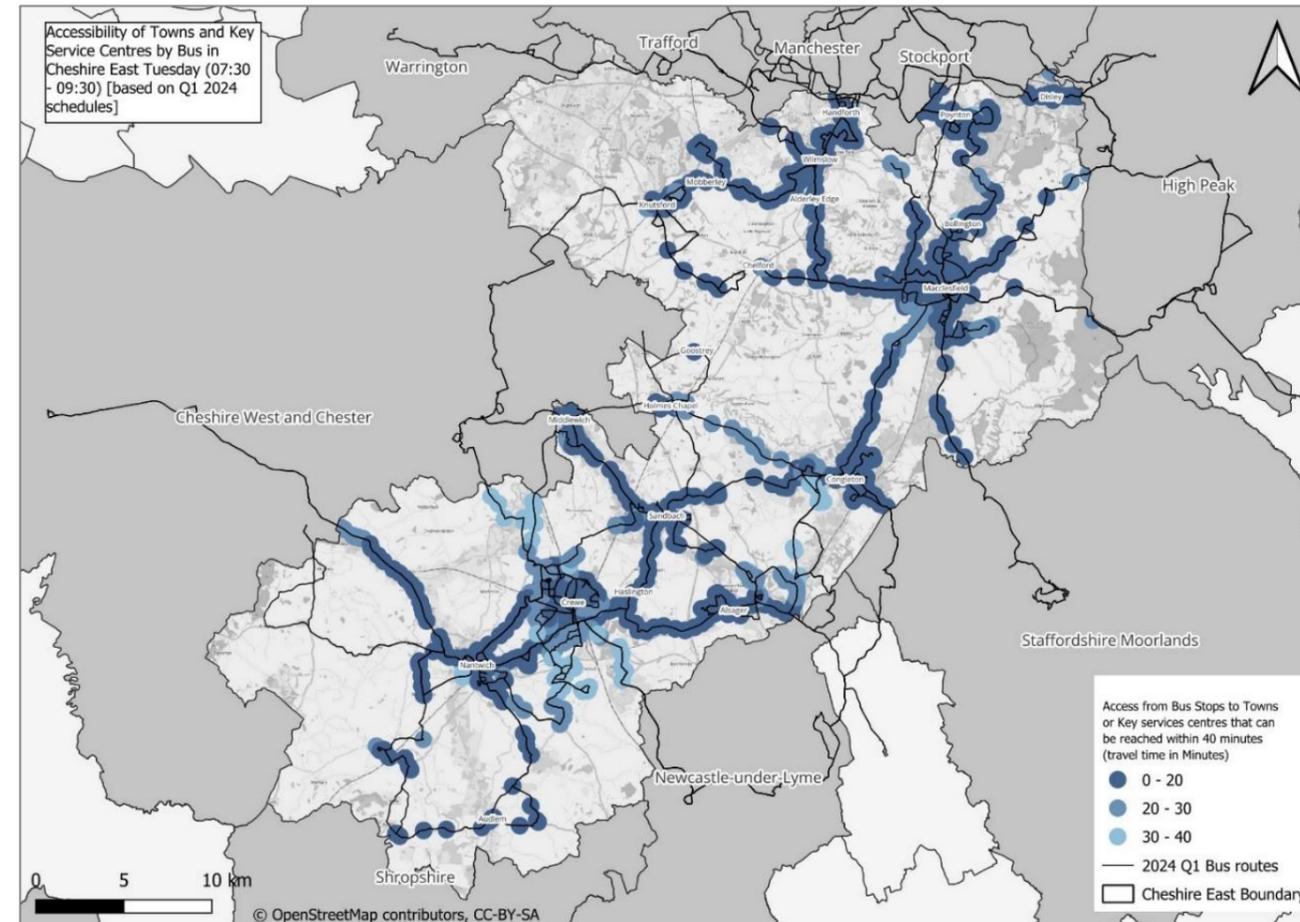


Figure 4-37: Accessibility of the towns and key service centres by bus - Weekday AM peak (April 2024)

Figure 4-37 shows the accessibility to the towns and key service centres within the weekday AM peak. The map shows that accessibility around the key towns and service centres is better than in more rural areas, however there are corridors of greater levels of service. For example, along the A51 northwest of Nantwich and along the A536 between Congleton and Macclesfield.

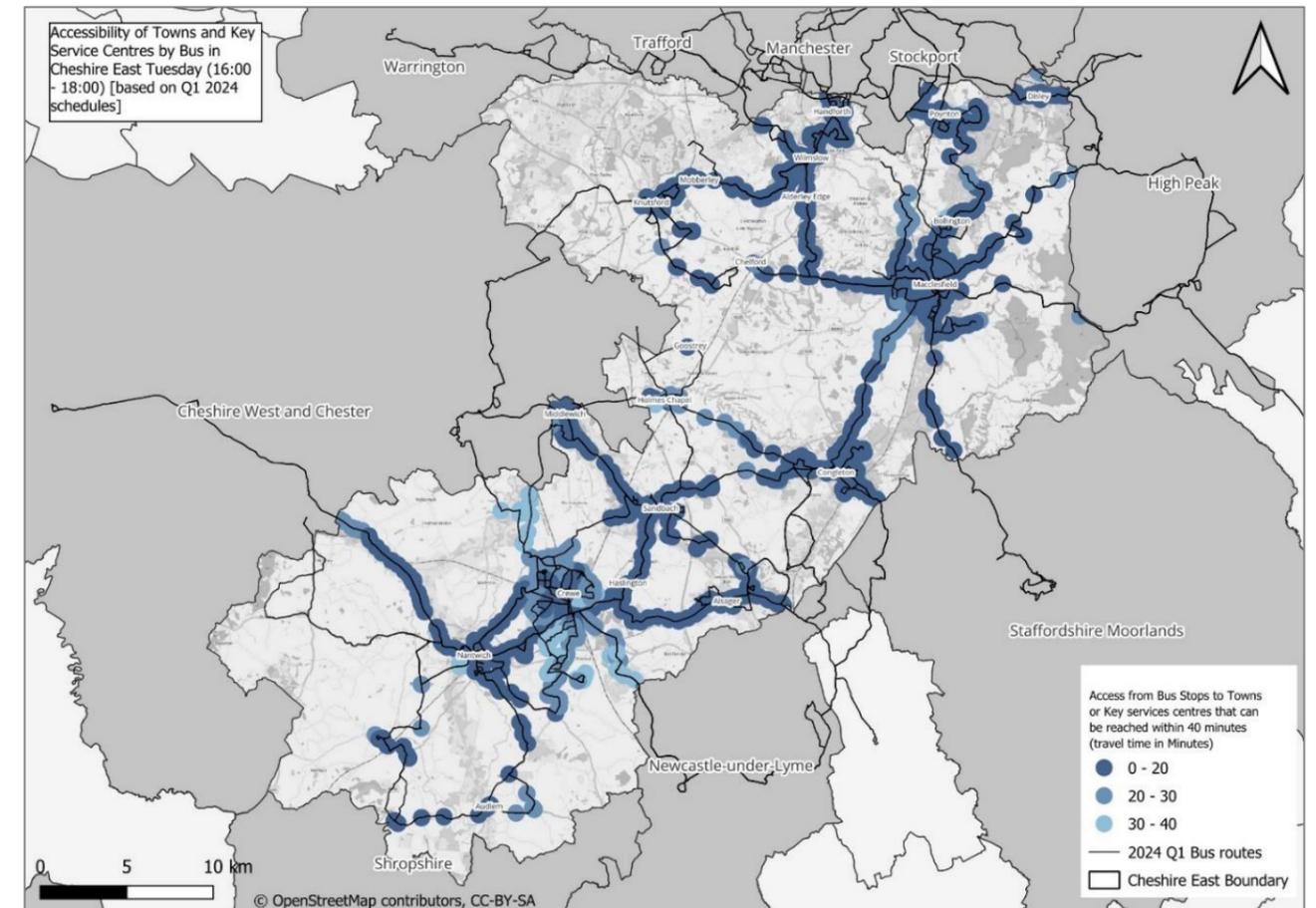


Figure 4-38 Accessibility of the towns and key service centres by bus - Weekday PM peak (April 2024)

Figure 4-38 shows the accessibility to the towns and key service centres within the weekday PM peak. The map shows that accessibility around key towns and service centres is better than in more rural areas, and this can be seen in Crewe and Macclesfield. Accessibility to key towns and service centres in the weekday PM peak is slightly better than in the AM. However, the bus routes along the A51 have a lower level of service, and connectivity between Knutsford and Macclesfield is also lower.

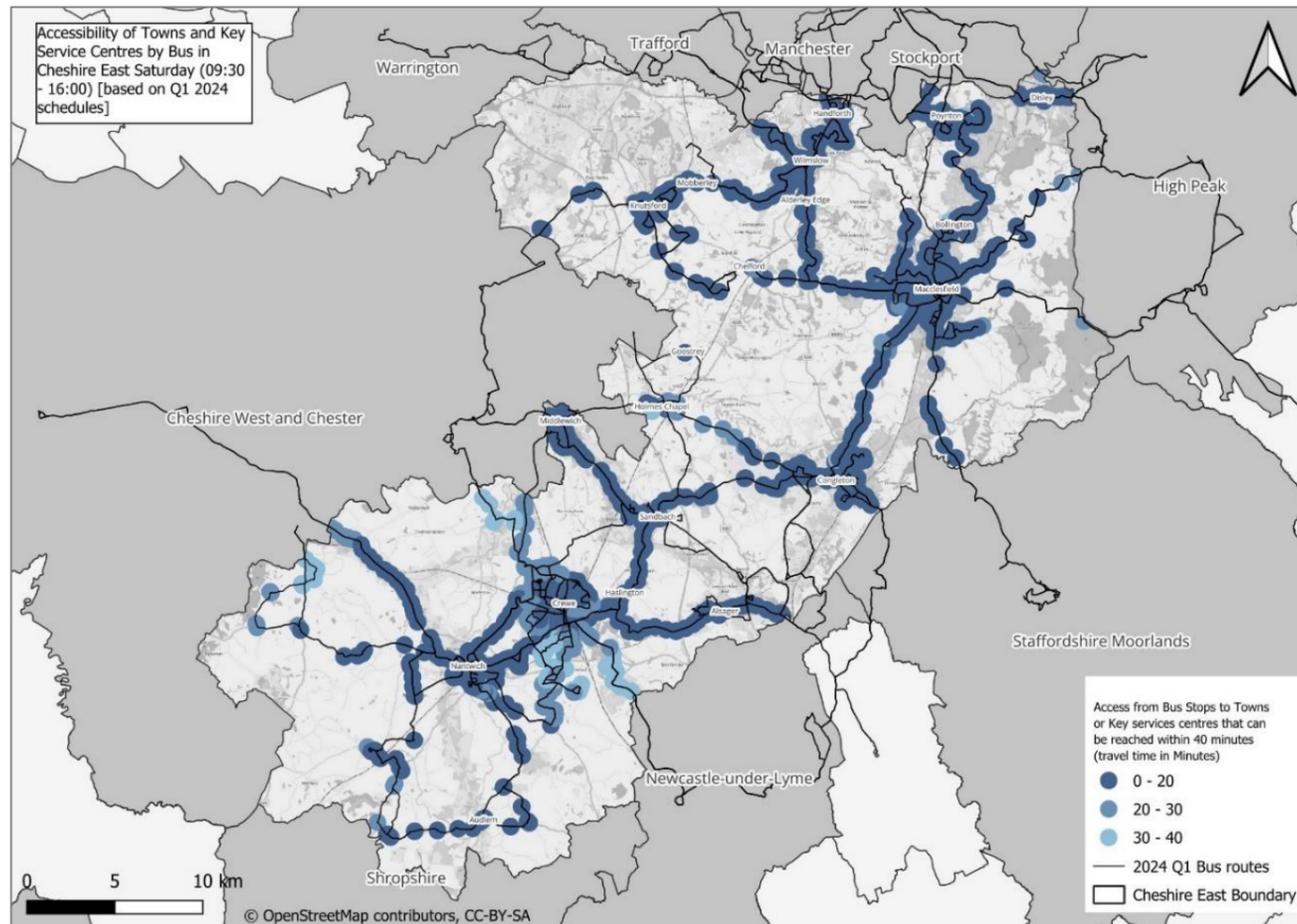


Figure 4-39: Accessibility of the towns and key service centres by bus – Saturdays (April 2024)

Figure 4-39 shows the accessibility to the towns and key service centres for Saturdays between 09:30 and 16:00. The difference in this map compared to Figure 4-37 and Figure 4-38 highlights a reduced service compared to on weekdays and can be visualised by the lack of services along the A51, A537 and between Knutsford and Macclesfield along the A537. Within the towns and key service centres accessibility is still high however further away the levels are significantly lower.

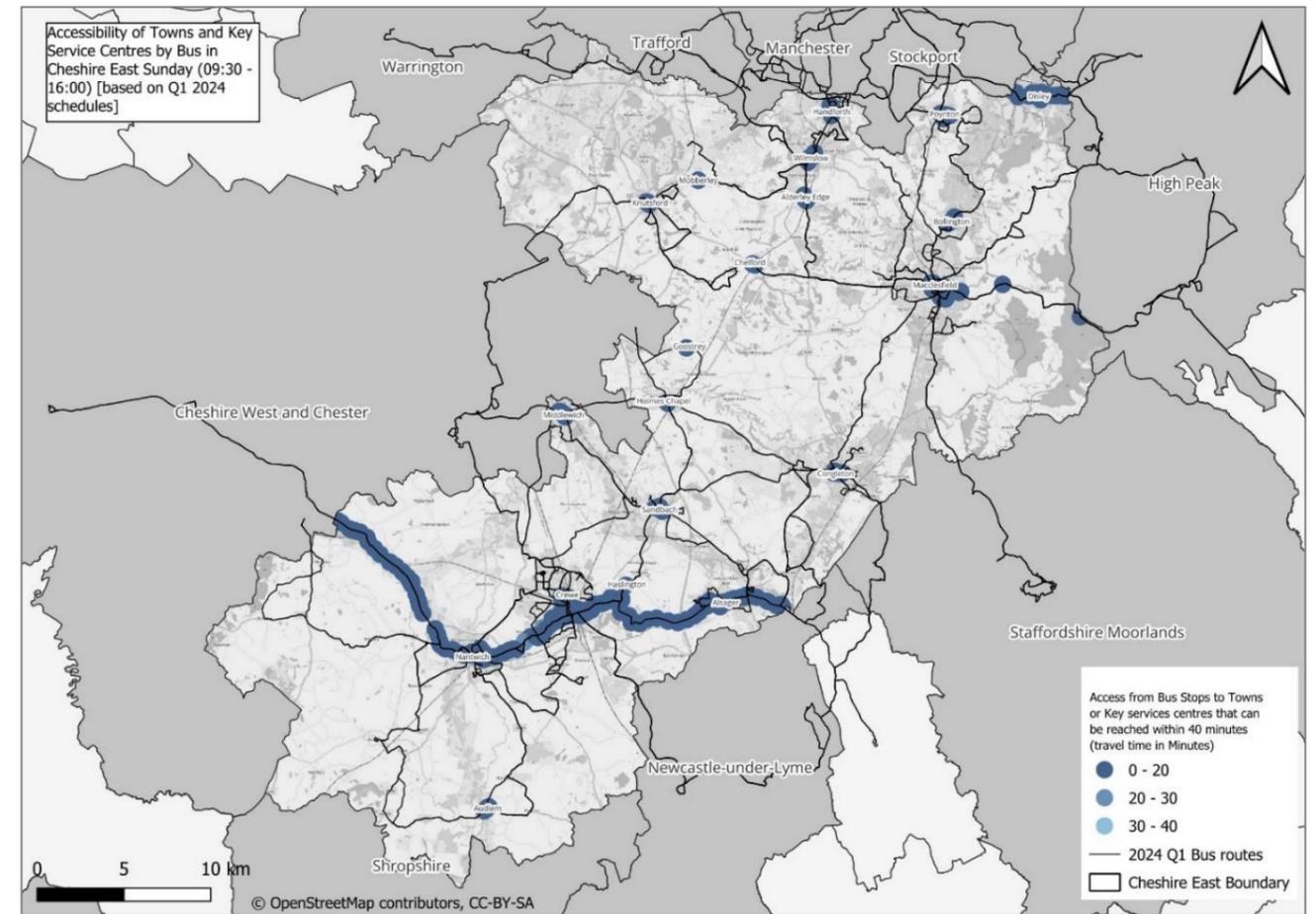


Figure 4-40: Accessibility of the towns and key service centres by bus – Sundays (April 2024)

Figure 4-40 shows the accessibility to the towns and key service centres for Sundays between 09:30 and 16:00 and compared to the other maps above, Sundays show a significant reduction in accessible locations – commercial services provide accessibility around Nantwich and Crewe, with pockets in other towns including Macclesfield and Disley.

The map is based on data from April 2024; however, a series of Sunday service enhancements were implemented in June 2024 on services 38, 130 and 12. As a result of the service enhancements, there has been an increase in accessibility from 25% to 54%.

Overall, Figure 4-37, Figure 4-38 and Figure 4-39 above show that the most connected areas of the borough are the more urban areas, such as Crewe, Nantwich, Wilmslow, Handforth and Macclesfield. All the maps shows that quite a far distance can be travelled in 20, 30 and 40 minutes on the bus network in the borough. However, the maps shows that the more rural areas in the borough, the areas outside of the towns, cannot be accessed within 20, 30 and 40 minutes.

4.3.8 Passenger satisfaction

Transport Focus released their annual report in March 2024 of bus passengers within Cheshire East. This has been analysed to understand whether previous targets around passenger satisfaction in Cheshire East have been met.

Cheshire East respondents were asked to identify their satisfaction or dissatisfaction with their bus journey. Passengers surveyed provided their feedback about a single leg of a journey. The surveys focus on measures of satisfaction, with optional further detailed questions. The data is weighted to be representative of the demographics of passengers by

gender, age, and journey time banding. Respondents could select one of five options (very satisfied, fairly satisfied, neither satisfied nor dissatisfied, fairly dissatisfied, or very dissatisfied).



Figure 4-41 Overall satisfaction with bus journey (March 2024)

Figure 4-41 shows the overall satisfaction of bus journeys in Cheshire East from March 2024. The data shows that around 51% of the Cheshire East population are very satisfied with their bus journey and around 33% are fairly satisfied with their bus journey. In comparison, around 4% of individuals are both fairly and very dissatisfied with the bus journey services.

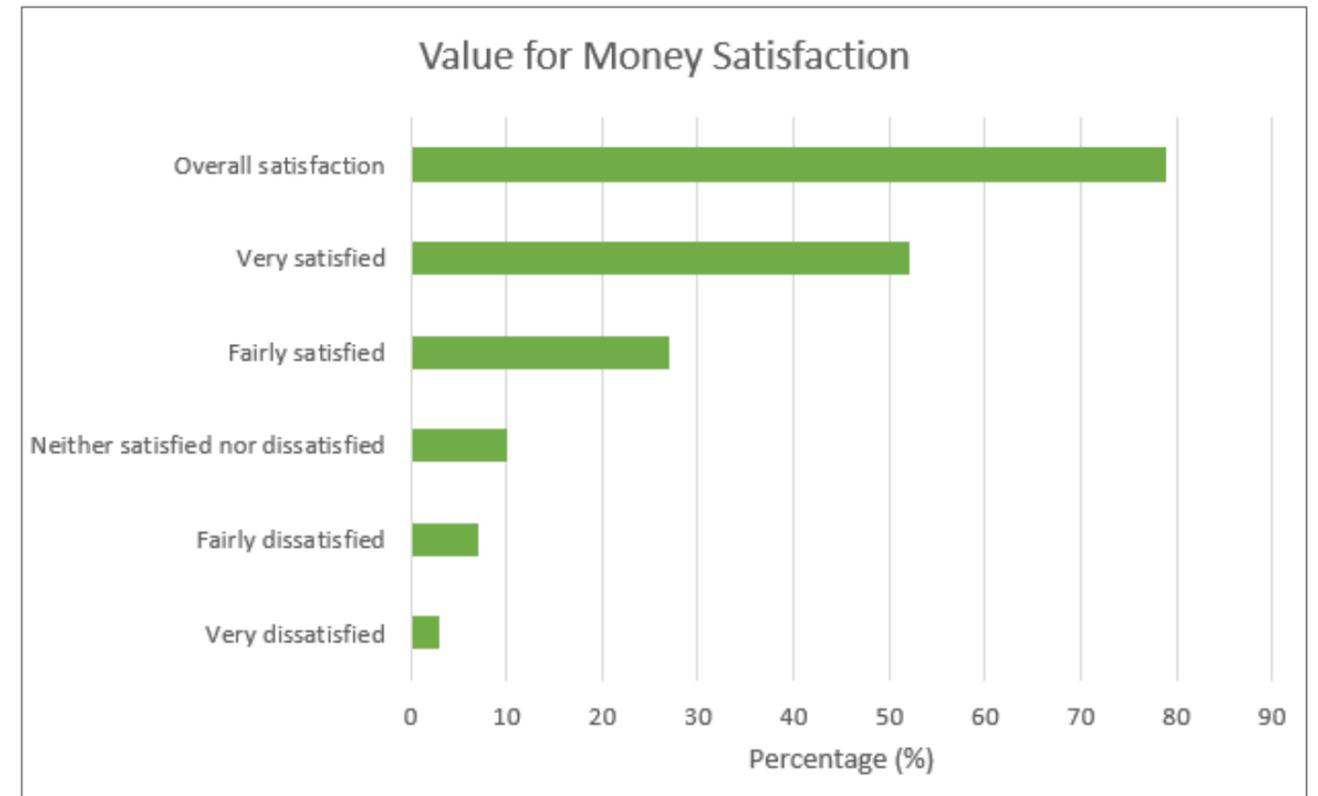


Figure 4-42 Value for money (March 2024)

Figure 4-42 shows the satisfaction results for value for money of Cheshire East bus services. Data shows that just under 80% of individuals surveyed were satisfied with the value for money overall, with 52% identifying that they were very satisfied and 27% were fairly satisfied. Figure 4-42 shows that around 8% of individuals are fairly dissatisfied and around 4% of individuals are very dissatisfied with the bus services in Cheshire East.

Cheshire East Council have set a target to increase passenger satisfaction with 'Value for Money' from 60% to 64% by 2024/25.

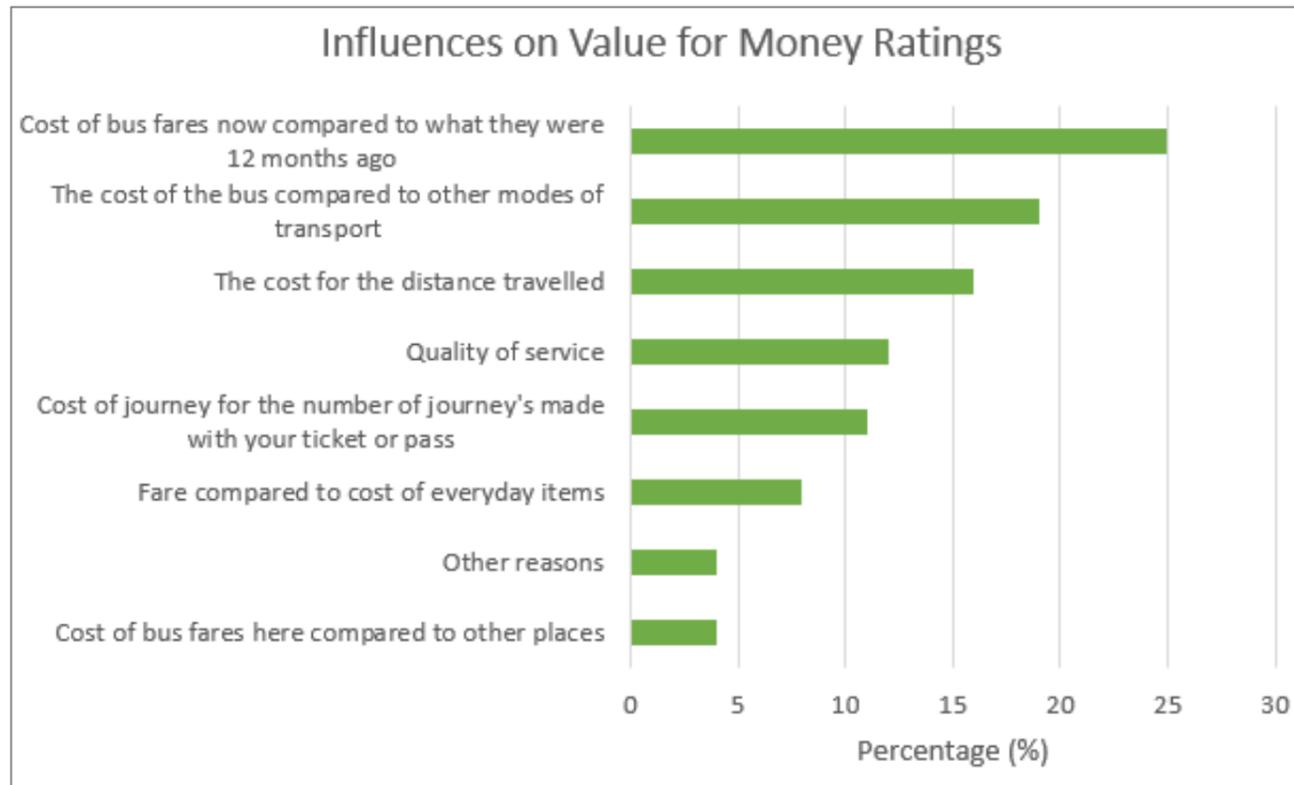


Figure 4-43 What has the biggest influence on value for money rating? (March 2024)

Figure 4-43 shows responses which have the biggest influence on value for money rating. Respondents could choose from eight options, including the cost for the distance travelled and the fare compared to the cost of everyday items.

Figure 4-43 shows that the most popular response was the cost of the bus fares compared to what they were 12 months ago (25%), which may be as a result of the introduction of the £2 fare cap. 19% selected the cost of the bus compared to other modes of transport, and 16% selected the cost for the distance travelled.



Figure 4-44 Bus journey satisfaction - reasoning (March 2024)

Respondents were asked to identify their satisfaction with each of the following elements during their bus journey:

- the bus stop where you caught the bus;
- the length of time you had to wait for the bus;
- the punctuality of the bus at the stop where you caught the bus (arriving on time);
- the bus driver; and
- the length of time your journey on the bus took.

The figure shows that 42% of respondents were very satisfied with bus stop where they caught the bus, 40% very satisfied with the length of time they had to wait for the bus, 54% very satisfied with the punctuality of the bus at the stop where they caught the bus, 67% very satisfied with the bus driver, and 55% very satisfied with the length of time the journey took.

4.3.9 Demand Responsive Transport

In Cheshire East, the current method of operating bus services continues to be challenging. The analysis in earlier sections shows that the decline in bus use has occurred across many years and whilst there are key locations which rely heavily on using the traditional bus network, this is not seen everywhere across the borough.

Moving beyond the delivery of a traditional model of delivering bus services may reflect a changing attitude to bus travel generally, as well as the need to deliver different transport options for key parts of the borough by alternative means.

One available option is that of Demand Responsive Transport (DRT), where this model of delivery is intended to 'fill the gaps' in the network, where it is a more appropriate solution for bus service delivery and where it offers value for money. The focus for DRT in Cheshire East, is one which is delivered alongside that of the local bus network option, to increase the level of service to support rural areas, compared with what is currently being delivered.

The potential for future DRT is being investigated as part of Bus Service Review and 2024 BSIP to enable improved connectivity by bus for some of the rural communities across Cheshire East.

DRT can work well within rural areas (or at the urban fringe) as it is more efficiently able to directly serve hard to reach locations and areas of isolation, as well as providing feeder links to the current fixed route network.

Additionally, future consideration of DRT should not be limited to rural areas alone, with the potential for town connections which could strengthen the bus network and public transport availability across Cheshire East.

4.3.9.1 FlexiLink

FlexiLink is funded by the council as part of the supported bus network. The service operates during core hours between 9.30am and 2.30pm Monday to Friday, excluding bank holidays. Passengers book by telephone and are offered a personalised, door-to-door service similar to traditional 'dial a ride'. 99% of passengers are concessionary pass holders who travel free of charge, otherwise passengers are charged a £3 fare per journey.

The current criteria for the FlexiLink service includes Cheshire East residents who:

- are aged 80 or over;
- have a disability; and
- live beyond the reach of any other public transport.

There is a fleet of 10 vehicles to provide the FlexiLink service, which integrates with the provision of home to school transport for children with special educational needs and disabilities (SEND).

Ansa Transport, who operate both FlexiLink and go-too, have developed marketing and promotional material to improve awareness and increase the use of both DRT services.

During August and September 2023, the council conducted a consultation to seek views on a set of potential proposals to expand and improve the FlexiLink service. There was a mix of viewpoints from current passengers and those who were not. Challenges such as low levels of demand and under-utilised vehicles were identified. In order to address these issues, the FlexiLink has proposed to:

- Expand the eligibility criteria to serve a wider population;
- Expand the operating hours and days;
- Improve integration with the mainstream network (i.e. feeder service);
- Modernising the booking and scheduling system; and
- Introducing a new fare structure, including a charge for concessionary pass holders.

A further round of consultation was undertaken as part of the bus service review between May and July 2024.

4.3.9.2 'Go-too' DRT service

The council were successful in securing £1.26m from the DfT Rural Mobility Fund to trial a demand responsive service in the rural area to the south and west of Nantwich. The 'go-too' service launched in October 2021. The objective of this scheme is to improve connectivity across the rural area through the provision of demand responsive transport.

The go-too service is open to all residents in the target area and the service operates Monday to Saturday from 7am until 9pm. The standard fare is £3 per journey or £2 for concessionary passholders. The service is provided with two vehicles. More information on the service is available at www.go-too.co.uk.

Go-too currently operates to the south and west of Nantwich and is designed to serve the rural communities, including Bunbury, Wrenbury and Audlem, as well as the surrounding rural areas.

Figure 4-45 illustrates the operating area of the 'go-too' service. The study area from the DRT was selected based on its rural nature, limited fixed bus provision and low population density.

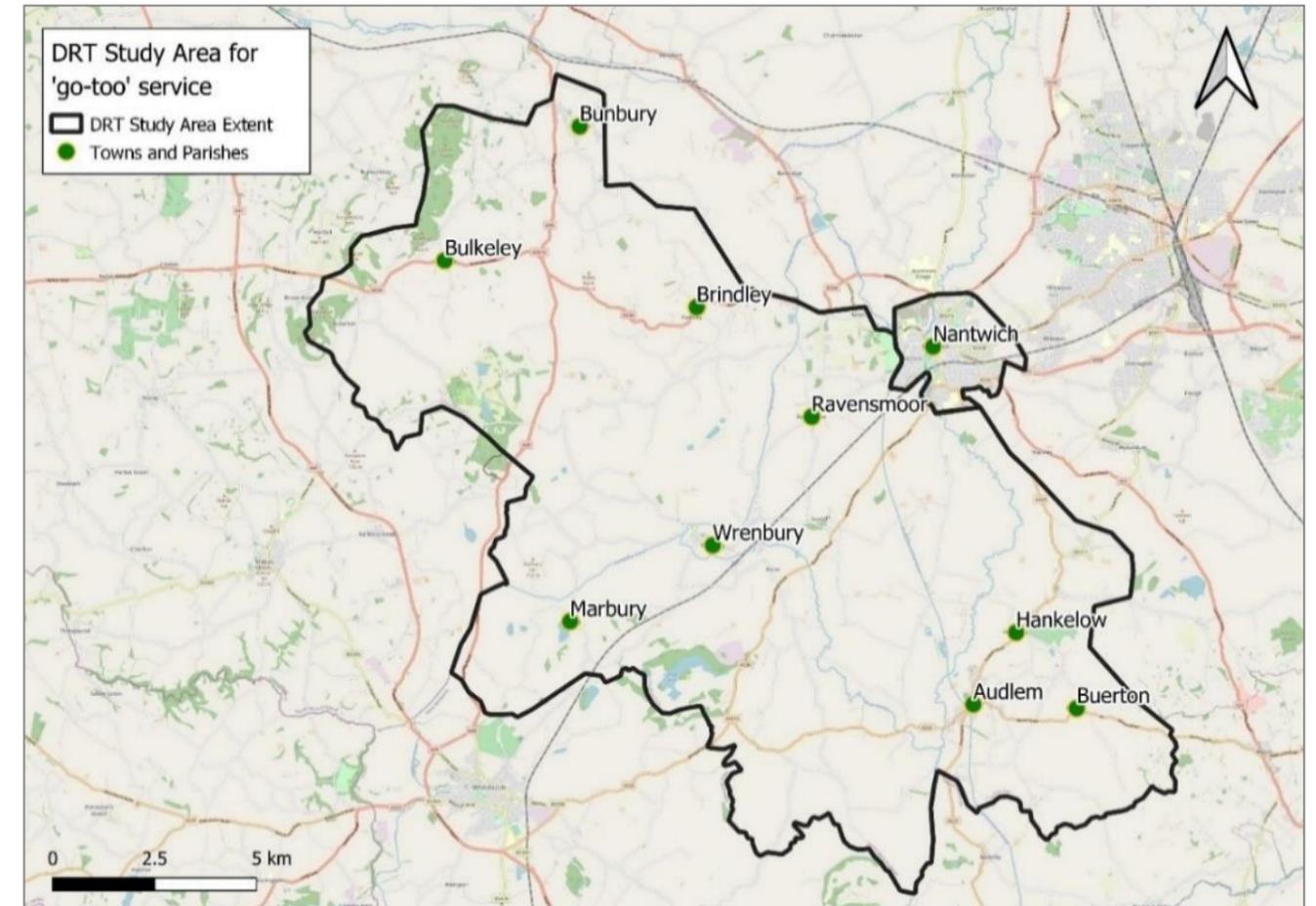


Figure 4-45 The geographic coverage of the 'go-too' network and key locations

During 2024, Cheshire East Council carried out a bus service review, which looked for opportunities to encourage more bus use and get more services operating commercially, tweak services to improve performance and passenger uptake and get better value out of what the council is spending. As part of this review, there is a proposal to combine the FlexiLink and Go-Too services into a single, integrated service. This will be:

- Available to all age groups = where no alternative and/or suitable public transport is available;
- Available Monday to Friday during the day (9:30am – 2:30pm) and in the evenings (4:30pm – 9:00pm);
- Available Saturdays (9:00am – 6:00pm);
- Chargeable (£4 full fare and £2 concessions); and
- Booking using an online app or by telephone.

4.3.10 Bus Stop Infrastructure

Cheshire East currently has five bus stations. These bus stations are located in Crewe, Nantwich, Congleton, Macclesfield, and Knutsford. A new bus station has recently opened in Crewe as part of the Royal Arcade development.

In addition to bus stations, data from the National Public Transport Access Nodes database (NaPTAN) shows that Cheshire East has a mixture of marked and unmarked bus stops and are outlined 'by type'⁷⁰ in Table 4-10.

Table 4-10 Bus stops by type across the borough

Type	Number
Pole or Lighting Column	662
Unmarked or Road Markings	549
Bus Shelter with Timetable	377
Pole or Lighting Column with Timetable	183
Bus Shelter	30
Hail and Ride Stops	19
Total	1820

Table 4-10 shows that for the 1,820 bus stops across Cheshire East, 407 of the bus stops have shelters. There is work to do in upgrading the quality of bus stop infrastructure and this is being addressed as part of the Bus Service Improvement Plan (BSIP) delivery programme. The council has developed bus stop infrastructure standards to support the improvement of bus stops within the borough, which are summarised in Table 4-11.

Table 4-11 Bus Stop Infrastructure Standards

Infrastructure	Bronze	Silver	Gold
Pole	✓	✓	✓
Bus stop flag	✓	✓	✓
Printed stop-specific timetable	✓	✓	✓
QR code link to bus real time information	✓	✓	✓
Accessibility adjustments both to and at the bus stop (where practical)	✓	✓	✓
Covered waiting area e.g., bus shelter	X	✓	✓
Bus box markings	X	X	✓
Cycling parking provision (at targeted locations)	X	X	✓
Real-time information displayed (at targeted locations)	X	X	✓

⁷⁰ There have been discrepancies between NaPTAN data and local knowledge of bus routes regarding the number of Hail and Ride stops.

4.3.11 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below:

Section	Key Findings	Implications for the LTP
4.3.2	Bus service frequencies and coverage varies depending on the day and time of day. Coverage is reduced in particular at the weekend off-peak (evenings). A number of rural areas have low bus frequency or do not have bus provision.	The next LTP should consider the approach to bus services in line with the council's BSIP.
4.3.3	The DfT launched the £2 bus fare cap on 1st January 2023. This scheme caps all adult single fares at £2 and is in place across Cheshire East operators. The cap will continue through 2025 at the increased price of £3.	The DfT published an interim report in February 2023 on the £2 fare cap that found patronage was continuing to recover in the aftermath of the Covid-19 pandemic and data suggested the fare cap may be playing a role in this recovery. This been extended, which in turn will help increase bus patronage.
4.3.4	There has been a general decline in bus patronage over the last 10 years regionally and nationally, although the decline has been more pronounced in Cheshire East. The Covid-19 pandemic resulted in a steep decline, and bus passenger numbers are currently lower than pre-pandemic for Cheshire East and England, with some improvements since the £2 bus cap fare.	The LTP needs to consider how the local bus network can be stabilised and how improvements can be delivered, drawing on recommendations from the BSIP.
4.3.5	Major commuting movements can be seen around all towns and key service centres of the borough, with the largest movements around Crewe and Macclesfield, around 3-4%. Compared to more rural areas where less than 1% of individuals travel to work via bus.	The data highlights that bus usage is highest in urban areas. This is partly driven by higher densities of employment and residential areas. Therefore, it is essential urban areas have good bus connections to ensure individuals can access their place of work, education, and key services.
4.3.6	Key locations of bus delay have predominately been identified in the principal towns of Crewe and Macclesfield as well as, to a lesser extent, other key service centres.	Cheshire East Council needs to continue to work with stakeholders to identify, assess and prioritise these main locations where delays are occurring to ensure these delays can be addressed and punctuality and reliability of bus services in the borough can be improved.
4.3.7	There is increased bus accessibility around towns and key service centres with reduced levels of service in rural areas. This means that these areas could feel quite disconnected in terms of the bus network, and therefore have to rely on other modes of transport such as the private car.	The LTP needs to consider how rural areas of Cheshire East can be served through passenger transport.
4.3.9	Demand Responsive Transport (DRT) provides an alternative to traditional fixed route services through users specifying desired locations and pick-up/drop offs. The two services offered in Cheshire East are FlexiLink (CEC funded) and 'go-too' (Pilot project – DfT funded) and help overcome some of the rural connectivity challenges linked to lower population density, frequency, and reliability of services.	To improve bus accessibility for the LTP, Cheshire East Council should consider the modernisation of DRT in line with the BSIP and bus service review 2024.
4.3.10	Outside of the principal towns, there is a lack of bus infrastructure in the key service centres, with potential for further bus/multi-modal interchanges with high quality facilities to provide additional capacity and improve bus patronage.	Cheshire East Council needs to deliver improved bus stops and interchange facilities.

4.4 Rail

The Cheshire East area plays an important role in rail connectivity, with Crewe providing a nationally significant hub for connections on the West Coast Mainline with London, Birmingham, North Wales, Manchester, Liverpool, and Scotland. The Borough also possesses access to intercity services from Macclesfield and Wilmslow, and a number of inter-urban connections that are essential to the ongoing vitality of the economy.

The rail network plays a key role in connecting people, places, and key attractors across a wide demographic. The additional capacity rail provides to the transport network can also contribute to reducing congestion in the borough.

4.4.1 Rail Network

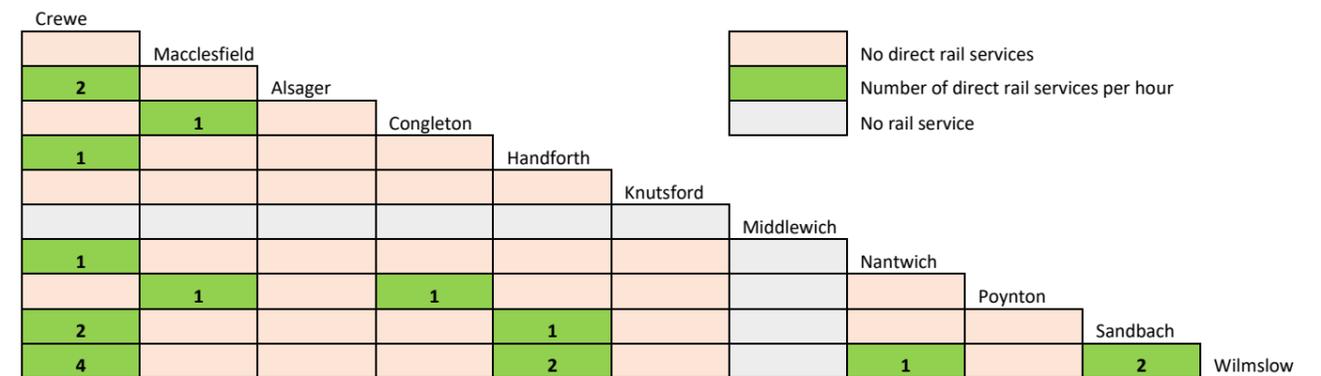
Cheshire East is serviced by several different rail lines, serving 22 rail stations in total throughout the borough. Train operating services throughout Cheshire East include:

- Avanti West Coast;
- Cross Country;
- London Northwestern Railway;
- Mersey rail;
- TransPennine Express;
- Transport for Wales; and
- West Midlands Railway.

Crewe acts a regional hub for the borough in terms of rail connectivity and provides links to Chester, Liverpool, Manchester, Stoke on Trent, Shrewsbury, and Stafford. However, there are areas in Cheshire East with no access to rail stations, including Middlewich where residents must rely on other modes of transport to get around the borough or neighbouring towns to access a rail station. Therefore, it is important that these towns have efficient, reliable, and frequent public transport services connecting these towns to existing rail stations until infrastructure is improved.

Figure 4-46 shows that Crewe is the best linked station, however there are no direct links to Macclesfield from Crewe. Also, there is no service at Middlewich, resulting in a lack of rail connectivity impacting opportunities for local residents and encouraging car dependency. However, there are aspirations to reopen the Middlewich line and provide a station at Middlewich in the future. Figure 4-46 shows Crewe to Wilmslow provides the most direct weekly rail services of four trains per day (Mon – Fri). Furthermore, some links within Cheshire East’s rail service requires changing at Crewe, Kidsgrove or Cheadle Hulme. Due to the geography of the rail network, a direct journey cannot be made from Crewe to Macclesfield and would require a change at Kidsgrove. In addition, Knutsford is not connected to any other Cheshire East town by rail.

Figure 4-46 Direct rail services in Cheshire East and the number of direct rail services per hour in Cheshire East (Trainline, 2024)



4.4.2 Ticketing and Fares

Table 4-12 Rail Fares Across Cheshire East (brfares.com) – March 2024

Origin	Destination	Anytime Single	Off-Peak Single	Anytime Return	Off-Peak Return
Crewe	Manchester	£17.40	£16.40	£19.50	£16.50
Macclesfield	London	£181.60	£74.10	£363.30	£105.90
Crewe	Chester	£15.50	£15.50	£15.70	£20.80
Congleton	Stoke-on-Trent	£7.30	£6.70	£8.10	£6.80
Sandbach	Liverpool	£17.50	£14.50	£21.00	£23.10
Alsager	Birmingham	£37.30	£32.20	£74.50	£32.80

Table 4-12 shows the fare structure for rail journeys⁷¹ from station in Cheshire East to key destinations across the UK. For most journeys, cheaper advanced tickets can be bought prior to the journey. Table 4-12 shows that anytime singles and returns are more expensive compared to off-peak singles and returns. This is due to ticket flexibility and access to a wider range of services throughout the day.

Rail fares in the UK have risen by an average of 4.1% in March 2024. This change in price often affects passengers in many ways:

- It becomes more expensive for residents to travel to work and school. This can strain individual’s budgets, especially for those that rely on rail travel every day;
- If rail fares become too expensive, individuals may choose to travel via private cars, hence increasing road congestion, air pollution and greenhouse gas emissions, and
- Higher fares may discourage people from using trains and therefore those that rely on rail travel and will impact on access to jobs, education, and leisure.

CEC need to work with rail operators to ensure the rail services are more frequent, reliable, and comfortable to use, to improve passenger experience – especially if prices continue to increase, and services face further disruption. Furthermore, CEC can improve local connectivity, ensure bus services, cycling infrastructure and footpaths are better integrated into train stations to make active travel an easier and more convenient for individuals.

⁷¹ BR Fares - fares for train journeys in Britain

Affordability

There should be efforts made to ensure all transport modes are accessible by as many as possible throughout Cheshire East. Factors such as incoherent fare structures and inconsistency in fare prices can impact individuals' ability to access transport. Within Cheshire East there are numerous service providers throughout the Borough with different fare structures. This can deter rail travel as individuals do not want to have to think about travel, they just want to make a journey as quick, easy and as cheap as possible.

There are also concessions for certain individuals such as 16–25-year-olds, individuals aged between 26-30 and seniors are entitled to reduced fares on trains by purchasing railcards. Reduced fares allow individuals of these age groups and individuals with differing levels of mobility to access public transport, meaning they can be more active and access leisure and employment opportunities, due to the reduced cost becoming an incentive to travel.

Gender inclusivity

UK Opinions and Lifestyle Survey, undertaken in 2021, shows that one in two women and one in seven men felt unsafe walking alone after dark in a quiet street near their home, with two out of three women aged 16 to 34 years having experienced one form of harassment in the previous 12 months. The experiences of women and girls in a transport report⁷² produced in March 2022 found that 85% of participants thought about safety when planning a journey which influenced routes, times travelled and avoiding certain modes. Furthermore, those that felt very safe across several modes was between 15-30%, much lower than those using a car (59%). Factors such as visible staff and lighting were suggested as elements that would improve safety, however the research has emphasised that it is often others behaviour that was the issue.

There are opportunities to improve the perception of safety on public transport through inclusive design. This would encourage more women and girls to access the public transport network. Potential measures include:

- Improve surveillance systems and lighting at transport hubs to provide a sense of safety for passengers;
- Run public awareness campaigns to educate passengers about their rights and how to report incidents;
- Involve women in the design and planning of transport services and ensure their needs and preferences are considered when designing routes; and
- Work with community organisations and women's groups to address safety concerns.

A multi-dimensional approach to the design is required to improve the perception of safety which should contribute towards women feeling safer on public transport.

4.4.3 Patronage and Station Usage

Table 4-13 Passenger entries, exits and interchanges by station – ORR

Station	Entries, Exits and Interchanges between April 2016 and March 2017 ⁷³	Entries, Exits and Interchanges between April 2022 and March 2023 ⁷⁴
Crewe	3,085,604	2,922,754
Knutsford	513,422	321,962
Macclesfield	1,661,398	1,183,784
Wilmslow	1,530,954	992,844
Alsager	111,016	94,622
Handforth	289,104	240,226
Nantwich	216,292	185,690
Poynton	236,746	161,930
Sandbach	285,622	230,552
Congleton	347,208	255,892

Table 4-13 compares the number of individuals entering, exiting, and interchanging at rail stations within Cheshire East. Crewe station is the busiest station with 2,922,754 passengers entering and exiting the station between April 2022 and March 2023. This is a 5.3% decrease from 2016 to 2023. Macclesfield is the second busiest station, with 1,183,784 passengers in 2022/23. The stations with the least demand are Alsager, Poynton and Nantwich where there were fewer than 190,000 individuals entering and exiting the stations between April 2022 and 2023.

Figure 4-47 shows the number of passengers that have entered, exited, and interchanged at all Cheshire East stations between 1997 and 1998⁷⁵. The graph shows that as the years increase since 1997-1998 to 2019-2020, the number of entries and exits to all stations has increased at a steady rate. However, between 2019-2020 and 2020-21 there is a dramatic decrease in the number of entries and exits. This decrease was as a result of the COVID-19 Pandemic meaning individuals could not travel and therefore passenger numbers were very low compared to other years.

Figure 4-47 shows that the number of passengers has increased in the years after the COVID-19 Pandemic but are still below pre-pandemic levels. This may be as a result of a shift in work patterns as more individuals are working from home, therefore less individuals are commuting to work via rail. CEC need to work with rail operators to ensure they are providing a reliable service which makes commuting to work convenient and attractive. This could encourage those individuals to travel back to work, hence increasing the numbers of passengers entering and exiting rail stations in Cheshire East.

There are opportunities to work alongside partners such as TfN and the rail industry to provide flexible ticketing options to cater to the change in work patterns, by offering part time ticket options or discounts for regular commuters. For example, National Rail has a Flexi Season Ticket that gives you any 8 days of travel in 28 days without needing to choose the days in advance⁷⁶ This could encourage those individuals to travel back into work due to the reduction in price of tickets.

⁷² [Experiences of women and girls on transport](#)

⁷³ [ORR Estimates of Station Usage 2016-17](#)

⁷⁴ [Table 1410: Passenger entries, exits and interchanges by station \(annual\), Great Britain, April 2022 to March 2023](#)

⁷⁵ [Passenger Entries and Exits and Interchanges by Station - ORR 2023](#)

⁷⁶ [Flexi Season Tickets | National Rail](#)

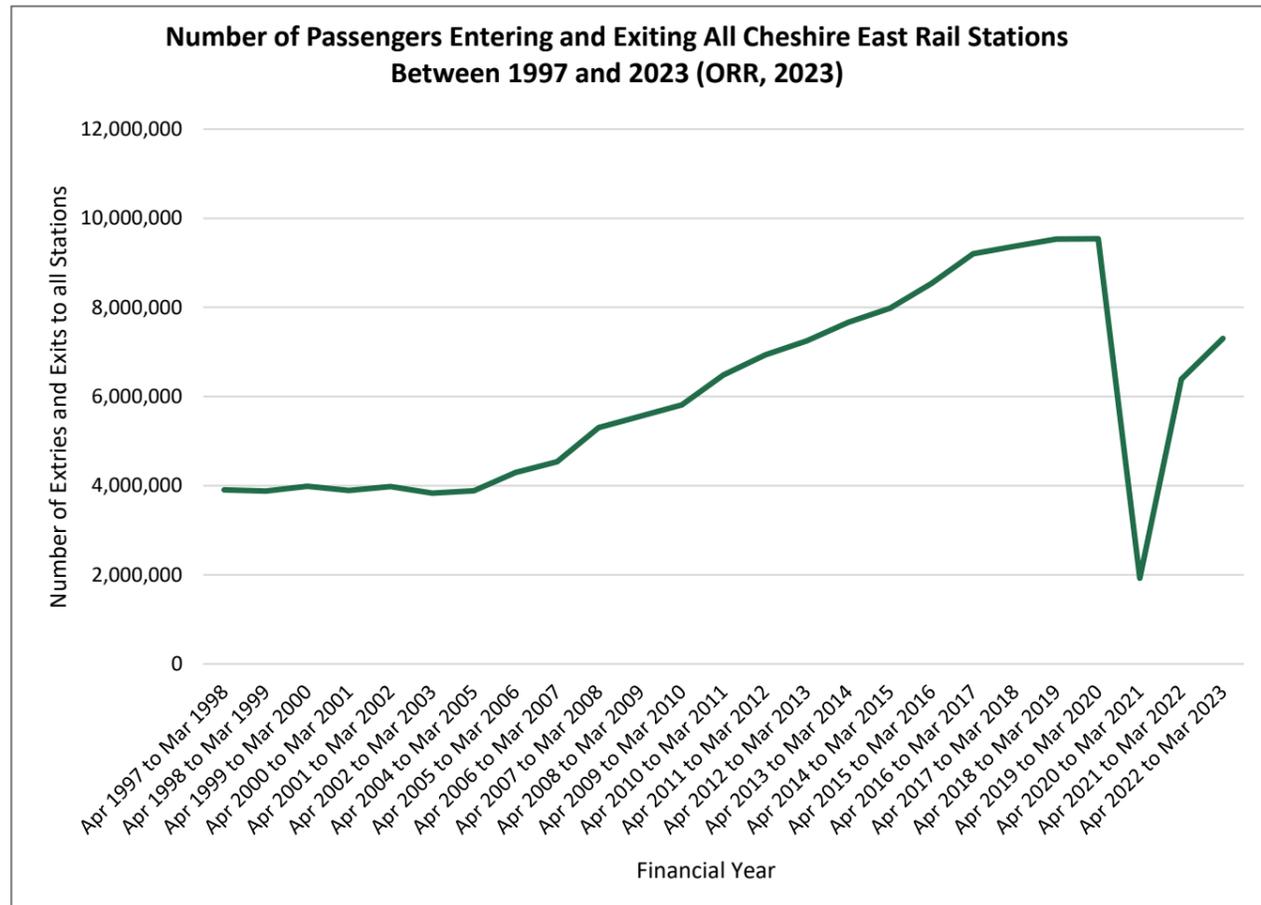


Figure 4-47 Number of Passengers Entering and Exiting All Cheshire East Rail Stations Between 1997 and 2023 (ORR,2023)

4.4.4 Method of travel to work

Figure 4-48 shows the percentage of individuals that use rail to travel to work⁷⁷. This data is taken from the 2011 due to the 2021 Census being carried out during the COVID-19 Pandemic, therefore data may be skewed and not reliable as many people worked from home.

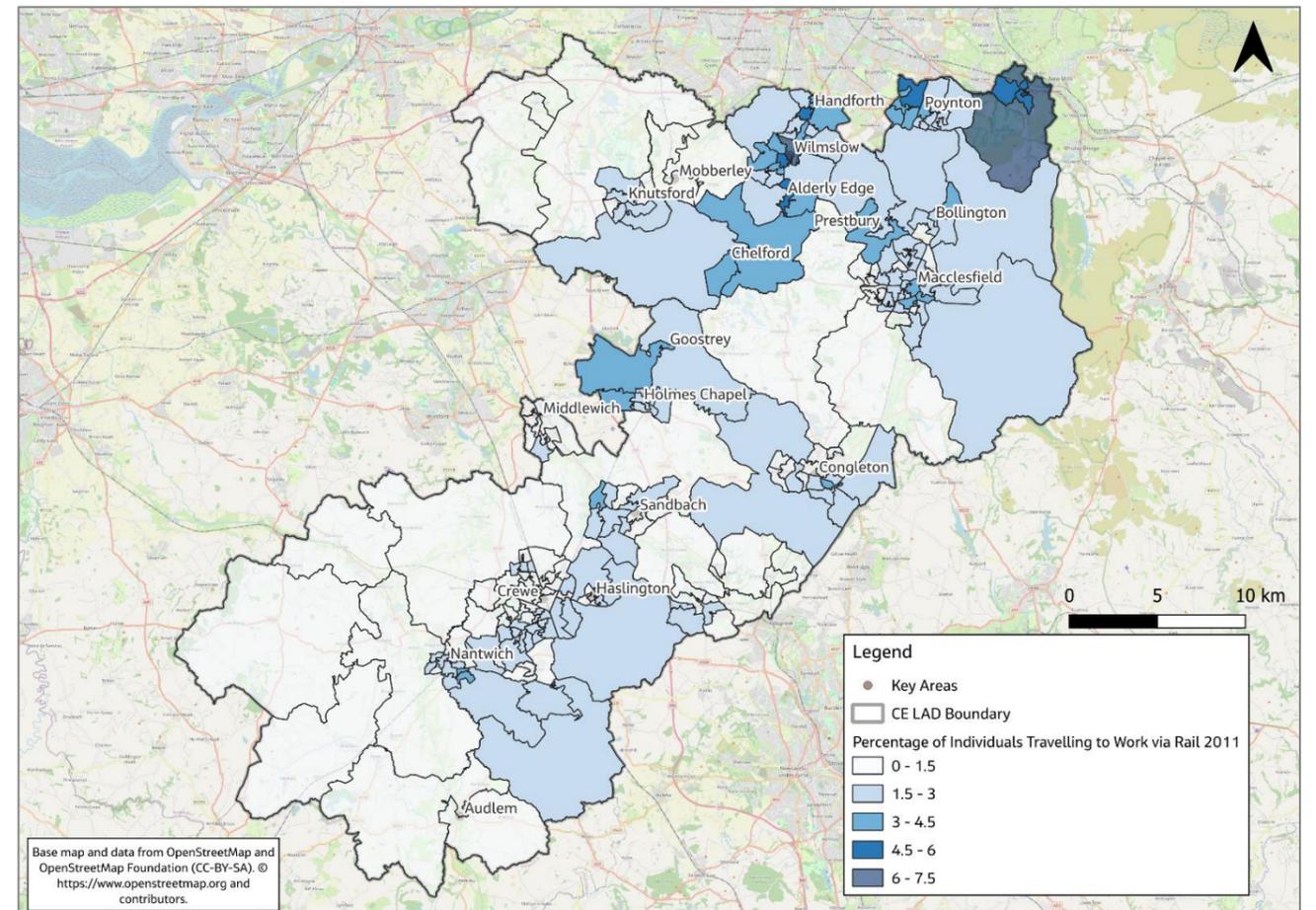


Figure 4-48 Percentage of individuals travelling to work via rail (2011 Census)

Figure 4-48 shows that close to urban centres such as Crewe, Knutsford, Congleton and Nantwich, there are fewer individuals travelling to work via rail. This may be due to an individual's workplace being within walking distance or a short bus ride away from their household, therefore individuals may choose to not opt for a train to travel to work. Furthermore, train fares, as analysed in 4.4.2 shows train fares can be high, which may impact individuals choosing to travel to work via rail due to the high cost of rail compared to other modes of transport. In Disley (east of Poynton) 6-7.5% of individuals use rail to travel to work, compared to only 0-1.5% of individuals using rail to travel to work in Crewe. This could be due to Disley being closely linked to Greater Manchester.

It is essential trains are on time and run frequently so individuals can access work opportunities with ease and without delay. However, in some areas such as Middlewich, whilst being located further away from urban centres such as Crewe and Macclesfield, the number of individuals travelling to work via rail is low. This is impacted by the lack of rail infrastructure in Middlewich, which means individuals have to rely on other means of transport to travel to work. There are aspirations to reopen the rail line and provide a station at Middlewich in the future, therefore numbers of individuals travelling to work via rail from Middlewich may increase in the future.

⁷⁷ QS701EW - Method of Travel to Work

4.4.5 Key aspirations and issues

The West Coast Main Line (WCML) is a crucial railway corridor that connects London to cities in the northwest of England; however, there are significant capacity constraints that impact Cheshire East. Currently, the WCML timetable has insufficient capacity to provide a consistent and reliable service. However, there is no available capacity without compromising on performance therefore the timetable needs restructuring to address the issues with punctuality and reliability of the trains.

High Speed Two (HS2) has faced significant challenges and changes, leading to the cancellation of Phase 2 of the development which was originally planned to extend from London Euston to Manchester and Leeds. This cancellation will impact Cheshire East in many ways. There will be a loss of connectivity at Crewe Station where there were plans for five to seven HS2 trains per hour, therefore impacting enhanced travel options and no longer being the catalyst for economic development in Cheshire East. Furthermore, as HS2 will deliver the London to Birmingham route, Cheshire East will be left without the anticipated economic benefits that HS2 was going to provide.

Access to Manchester Airport from Cheshire East is seen to be challenging due to the infrequent and unreliable train services. Stockport train station also has a lack of capacity negatively impacting customer experience. Stockport station acts as a key transport hub for Cheshire East residents, therefore creating reliable and consistent services is essential for efficient movement throughout the borough. Stockport station could receive £65 million for the refurbishment of the station in order to improve the stations facilities⁷⁸, along with increasing rail capacity to meet the demand in the catchment area, hence benefitting Cheshire East.

On the 25 March 2024, the Government published their next steps on Northern Powerhouse Rail between Liverpool and Manchester, this signalled their commitment to the future of NPR. Linking NPR into the Mid-Cheshire Line could help to improve connectivity to the airport.

Alongside issues with the lack of capacity of certain stations and lines around Cheshire East, rail strikes have impacted the borough in many ways. Over the month of December 2023, union members of 16 train operating companies carried out a strike between 2nd and 8th December. It is predicted that rail strikes have cost the UK economy around £1 billion to date⁷⁹ and may have affected passenger confidence in the reliability of the service.

4.4.6 Passenger satisfaction

Rail User Survey carried out by Transport Focus, regularly asks a representative sample of 2000 people across Great Britain about their public transport use⁸⁰. This survey was carried out between March 2023 and February 2024 and participants were asked if they used rail in the last seven days and their overall satisfaction with their most recent rail journey in terms of;

- Value for money,
- Punctuality,
- Cleanliness,
- Frequency of trains,
- Level of crowding, and
- Value for money of tickets.

Table 4-14 Great Britain Rail User Survey - Overall satisfaction with the journey - 24th March 2023 - 4th February 2024 - Transport Focus

Operating Service	Overall Satisfaction Level
Avanti West Coast	85%
CrossCountry	75%
Merseyrail	91%
Northern	84%
TransPennine Express	78%
Transport for Wales	74%
West Midlands Trains	85%

Table 4-14 shows the overall satisfaction levels for train journeys of different operating services that operate in and around Cheshire East. The results show that for the majority operating services, a large proportion of passengers are satisfied with their rail journey. However, for certain services, a larger proportion of individuals are dissatisfied with the service, this can be seen for Transport for Wales where only 74% of individuals are satisfied with their rail journey and CrossCountry where only 75% of individuals are satisfied with their rail journey.

In order to improve passenger satisfaction in the services that have higher dissatisfaction levels and keep satisfaction levels high, CEC needs to they work with rail operators and the wider industry to improve the reliability and punctuality of train services.

4.4.7 Station assessment – provided by TfN

Out of the 22 train stations throughout the borough, each station varies in the number of facilities that are provided. A snip from the TfN data can be found in Table 4-15.

The largest station in Cheshire East is located in Crewe and provides a large variety of facilities, including having full time staff, waiting room and toilets. However, more importantly, the whole of Crewe station provides step free access, along with ramps for trains and physically accessible waiting shelters. This ensures that those individuals with accessibility needs can access the station and travel to their destinations with ease.

In total, there are three stations - Crewe, Macclesfield, and Wilmslow - that provide step free access to platforms, with other stations only providing step free access to some platforms. Handforth is the only station that does not provide step free access; however, funding has been secured for the provision of lifts in 2024/25.

⁷⁸ [Stockport station needs 'immediate attention' as council plots £65m refurbishment](#)

⁷⁹ [Rail strikes cost UK £1bn and settling would have been cheaper, minister admits | Rail strikes | The Guardian](#)

⁸⁰ [Rail User Survey - train operator results - February 2024](#)

	Step free access	Access to platforms	Ramps for trains	Physically accessible waiting shelters	Cycle parking
Adlington	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	No	None
Alderley Edge	Platforms Only	Ramps to All Platforms	Yes	No	Parking
Alsager	Poor Standard Ramps	Ramps to All Platforms	Yes	Yes	Parking
Ashley	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	No	None
Chelford	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	No	Parking
Congleton	Platforms Only	Ramps to All Platforms	Yes	No	Covered Parking
Crewe	Whole Station	Ramps to All Platforms	Yes	No	Covered Parking
Disley	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	No	None
Goostrey	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	No	Parking
Handforth	None	No Ramps or Lifts	No	Yes	Parking
Holmes Chapel	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	No	Covered Parking
Knutsford	Some Platforms only	Ramps to Some Platforms Only	Yes	No	Covered Parking
Macclesfield	Whole Station	Ramps to All Platforms & Lifts	Yes	Yes	Covered Parking
Mobberley	Poor Standard Ramps	Poor Standard Ramps & Lifts to All Platforms	Yes	Yes	Covered Parking
Nantwich	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	No	Parking
Plumley	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	Yes	None
Poynton	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	Yes	None
Prestbury	Some Platforms Only	Ramps to Some Platforms Only	Yes	No	None
Sandbach	Some Platforms only	Ramps to Some Platforms Only	Yes	No	Covered Parking
Styal	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	No	Covered Parking
Wilmslow	Whole Station	Ramps to All Platforms	Yes	Yes	Parking
Wrenbury	Poor Standard Ramps	Poor Standard Ramps to All Platforms	Yes	No	None

Table 4-15 TfN Station Quality Demand Model

4.4.8 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below:

Section	Key Findings	Implications for the LTP
4.4.1	There are gaps in the existing rail infrastructure within Cheshire East, with towns such as Middlewich which lack a rail station.	Residents living in Middlewich have to rely on other modes of transport or rely on travelling to neighbouring towns to access a train station. Alongside work to facilitate the reopening of the Middlewich line and provision of a station, investment should focus on providing an efficient, reliable, and frequent public transport services – such as buses - connecting to existing rail stations to address these issues and improve the accessibility and sustainability of transport in Cheshire East.
4.4.2	Rail fares in the UK have risen by an average of 4.1% in March 2024.	Since the COVID-19 Pandemic and the occurrence of rail strikes, public perception of public transport has changed which has impacted the number of rail passengers and overall satisfaction levels.
4.4.3	Crewe is the busiest station in the borough, with around 2.65 million passengers per year. Macclesfield and Wilmslow have the second highest demand of passengers with around 1.4 million individuals entering and exiting the stations per year.	In order to accommodate the needs of a large number of passengers, rail services at these locations need to be efficient, provide reliable services, and provide accessible facilities to ensure all individuals can use the rail services around the borough. The LTP also needs to consider complementary improvements to local transport that can improve sustainable access to rail stations.
4.4.3	The number of rail passengers has increased in the years after the COVID-19 Pandemic but remain below pre-pandemic levels.	To encourage rail usage post COVID-19 Pandemic, Cheshire East can engage with DfT, TfN and rail operators to focus on improving the reliability, flexibility, and connectivity of the rail network, whilst providing flexible ticketing options in order to encourage more individuals to travel back to work via rail.
4.4.4	In urban centres like Crewe, Knutsford, Congleton and Nantwich, fewer people travel to work by rail because their workplaces are often within walking distance or a short bus ride. High train fares also discourage use. Middlewich has low rail usage due to a lack of rail infrastructure, but there are long term ambitions to reopen the rail line and build a station, which could increase future rail travel from Middlewich.	It is essential that Cheshire East works with rail operators to ensure rail services are frequent and reliable. This will ensure rail travel is the chosen method of travelling to work due to individuals accessing work opportunities with ease and without delay.
4.4.6	There is reported dissatisfaction across many of the train providers, and TransPennine Express reported 13% of individuals are dissatisfied with the service. This can include: <ul style="list-style-type: none"> • Value for money; • Punctuality; • Cleanliness; • Frequency of trains; • Level of crowding; and • Value for money of tickets. 	In order to improve passenger satisfaction Cheshire East need to ensure they work with rail operators closely to improve the reliability and punctuality of train services and ensure delays and cancellations are communicated effectively. Additionally, accessibility improvements are required to make sure all stations have lifts, ramps, and clear signage.
4.4.7	The majority of stations in Cheshire East, only providing step free access to some platforms. However, Handforth is the only station that does not provide step free access, therefore those individuals with accessibility needs such as wheelchairs and prams cannot access the station and therefore will have to travel to their destination via another mode of transport.	Funding has been secured for the provision of lifts in 2024/25. This ensured all stations and platforms can be accessed by wheelchairs, making sure no individuals are excluded from the public transport network in Cheshire East.

4.5 Electric Vehicles (EVs)

A key benefit of transitioning vehicles to electric is reducing carbon emissions. CEC in January 2022 set a target of committing to becoming a carbon neutral across the wider borough by 2045⁸¹. The UK is committed to reducing greenhouse gas emissions to net zero by 2050 in response to recommendations from the Committee on Climate Change. EVs have a lower whole-life carbon footprint than petrol and diesel vehicles and given the UK's progress towards greener electricity generation these benefits will increase further in the future.

Additionally, CEC is committed to improving air quality as outlined in the 2018 Air Quality Action Plan. EVs reduce emissions, particularly in congested urban areas where, stopping and starting, idling, and over-revving of petrol/diesel vehicles in queues produces high concentrations of emissions. However, EVs still contribute to non-exhaust emissions through brakes and tires. These friction-related wear and tear processes release particulate matter (PM) into the environment.

Cheshire East has ambitious plans for EV transition as detailed in the Electric Vehicle Charging Infrastructure Strategy which has been through public consultation and was approved by the councils Highways and Transport Committee. The EV Charging Infrastructure Strategy has been developed to directly support CEC's aim of reducing carbon emissions by accelerating the transition to EVs.

4.5.1 Factors Influencing Electric Vehicle Uptake and Usage

Chapter 4 in Cheshire East's EV Strategy⁸² describes the existing levels of EV uptake within the borough, the level of charging infrastructure and electricity supply network in Cheshire East, as well as a comparison against the EV charging infrastructure progress being made by similar local authorities within the UK.

To inform potential future locations of charging infrastructure, the chapter presents a review of the key factors that can influence charging demand in Cheshire East, including areas of limited off street parking, household type and income levels across the borough, as well as commuter journey patterns.

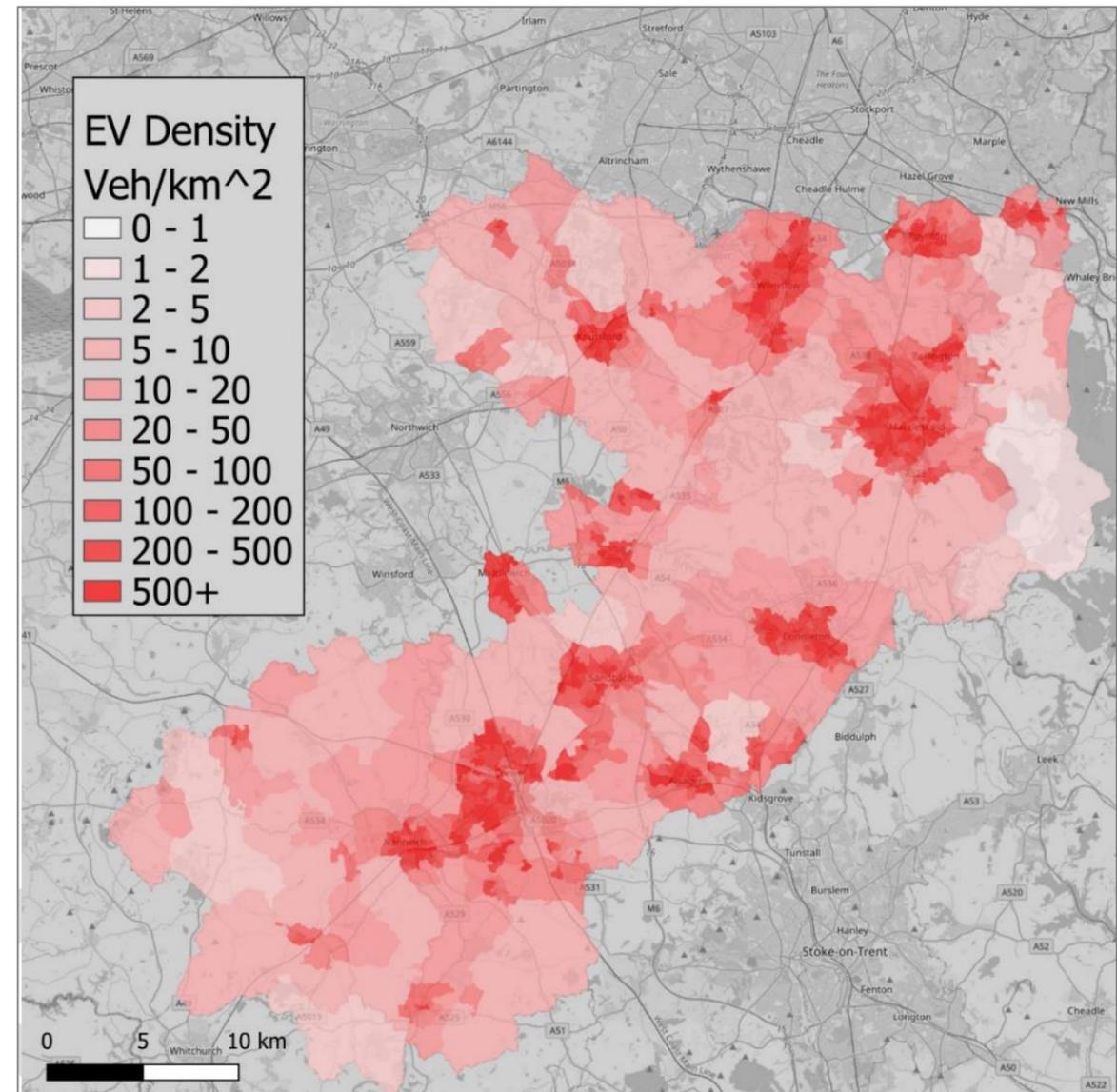


Figure 4-49 Electric Vehicle Density Across Cheshire East (EV Charging Strategy 2023)

Table 4-16 shows that in Cheshire East 5,285 Plug in Vehicles (PIVs) were registered in Quarter 2 of 2022, making up 2.11% of the vehicles registered in Cheshire East during Q2 of 2022. This is slightly below the national average for the UK which is at 2.39%.

⁸¹ Carbon neutral by 2045 (Cheshireeast.gov.uk)

⁸² CEC EV Charging Infrastructure Strategy 2021

Table 4-16 Cheshire East PIV Adoption (CEC EV Charging Infrastructure 2023)

District / Area	Total Registered Cars & Light Goods Vehicles as of Q2 2022	Total Registered PIV as of Q2 2022	PIV as % of Total Registered Vehicles as of Q2 2022
Cheshire East	250,667	5,285	2.11%
UK	37,715,246	901,488	2.39%

Figure 4-49 shows the density of EVs throughout Cheshire East. Figure 4-49 shows that the density varies across Cheshire East, with there being higher densities of EVs in urban areas. This can be linked to population density as seen in Figure 3-4. This data shows that without intervention, the private sector will focus the provision of chargepoints in areas of higher density and in this case in more urbanised areas. The CEC EV Charging Strategy⁸³ recognises this risk, and therefore has set out measures to support the provision of an equitable network that ensures access to charge points across the borough for all residents.

A key factor that is driving consumer demand for EVs is the UK government legislation of phasing out the sale of new ICE vehicles by 2035. Along with government legislation there are other factors that can influence the demand of EVs⁸⁴.

Household Type

Owning an EV requires infrastructure to charge them, and those individuals with off-street parking have a better ability of doing so. With access to off-street parking, individuals can install EV charging points at home, making it easier and more convenient to charge an EV. Individuals who are without access to off-street parking lack the ability to install a chargepoint at home and rely on public chargepoints. As noted in later sections CEC is developing an investment programme to overcome these challenges.

Demographics

There has been an established link between income levels and the uptake of EVs, due to the higher cost of EVs compared to an Internal Combustion Engine vehicle. Therefore, higher income individuals within Cheshire East may be more willing to purchase an EV or already own an EV. In general, areas that are less wealthy and may be more deprived may have lower levels of EV uptake due to not being able to afford EVs. However, the council is seeing demand for EVs and charging facilities widely across the borough in both higher lower income areas, linked to other aspects driving EV uptake such as individuals who are provided with an EV for work related journeys.

4.5.2 Existing Chargepoint Provision

Figure 4-50 shows the locations of existing publicly accessible EV charging points in Cheshire East⁸⁵, created using the National Chargepoint Registry and Zap-Map data. This map breaks down the existing chargers into rapid and fast chargers. The figure shows that chargepoints are located around towns within Cheshire East, especially around the towns of Crewe, where there is a clustering of rapid chargers.

There is a lack of charging infrastructure around the east of the borough around Macclesfield, Congleton and Poynton, as well as limited infrastructure in rural areas. It is likely that fewer chargepoints are located in rural areas due to the lower population and more houses having access to off-street parking, and therefore not having to use publicly available chargepoints.

It is estimated that around 1,300 chargepoints need to be installed throughout Cheshire East by 2030 in order to meet the demand that is associated with the forecasted EV uptake.

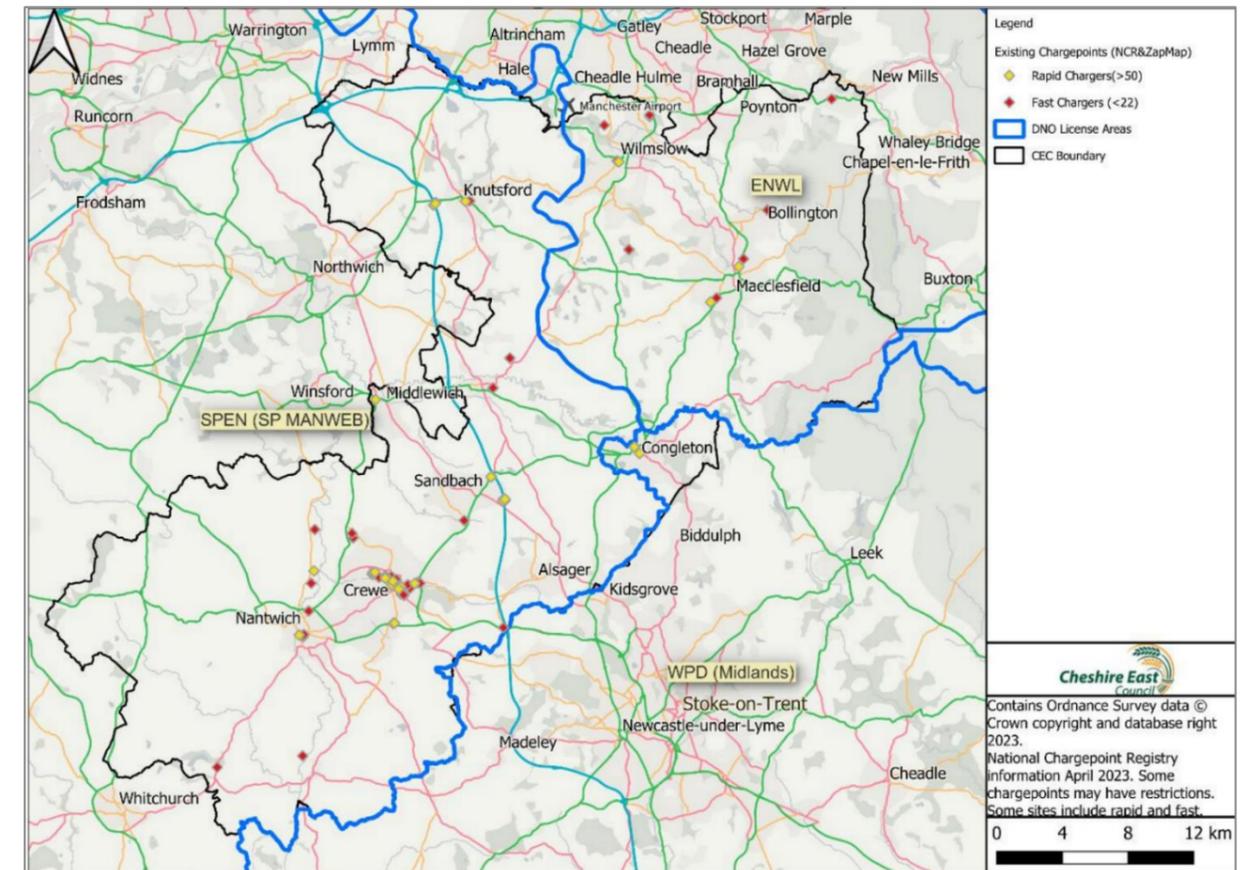


Figure 4-50 Existing Charging Infrastructure and DNO Boundaries (CEC EV Charging Infrastructure Strategy 2023)

⁸³ CEC EV Charging Strategy 2023

⁸⁴ CEC EV Charging Infrastructure Strategy

⁸⁵ CEC EV Charging Infrastructure Strategy 2021



Figure 4-51 Public Chargepoints Per 100,000 as a Percentage of all Local Authorities in the UK

Figure 4-51 shows the number of public charging devices per 100,000 of the population. There are 40.9 chargers per 100,000 individuals in Cheshire East, compared to 55.6 in Cheshire West, 56.7 in Manchester and 83.2 in Trafford. This shows that Cheshire East has a lower number of public chargepoints per 100,000 of the population.

Cheshire East is placed between 20-40% of all local authorities in the UK in terms of the number of public chargepoints per 100,000 of the population. This number is lower than surrounding boroughs such as Cheshire West and Chester and Manchester that are both in between 40-60% of all local authorities in the UK. As well as ensuring there around enough

numbers and types of EVs throughout Cheshire East, it is important to ensure chargepoints are provided in the vicinity of where they are needed by residents and people travelling into and through the borough.

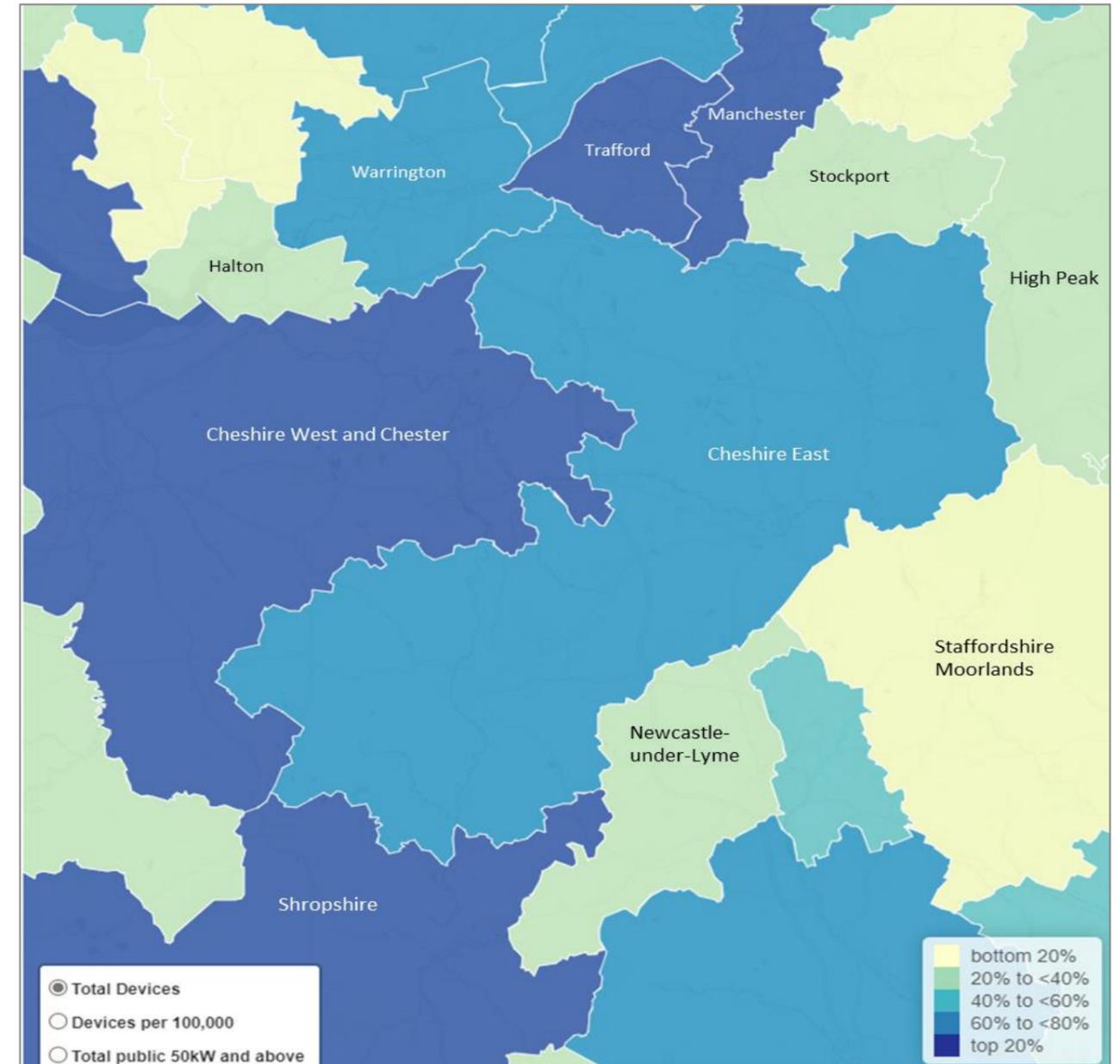


Figure 4-52 Total Number of Public Chargepoints as a Percentage of all Local Authorities in the UK

Figure 4-52 shows the total number of public chargepoints as a percentage of all local authorities in the UK. There are 164 public chargepoints in Cheshire East⁸⁶, compared to Manchester which has 312 and Cheshire West which has 199. This shows that Cheshire East has fewer public chargepoints compared to surrounding local authorities.

⁸⁶ DfT EV Charging Devices by Local Authority

Cheshire East is placed in the top 60-80% of all local authorities in the UK in terms of the number of public chargepoints. This number is lower than surrounding boroughs such as Cheshire West and Chester and Manchester that are both in the top 20% of local authorities for the total number of public chargepoints.

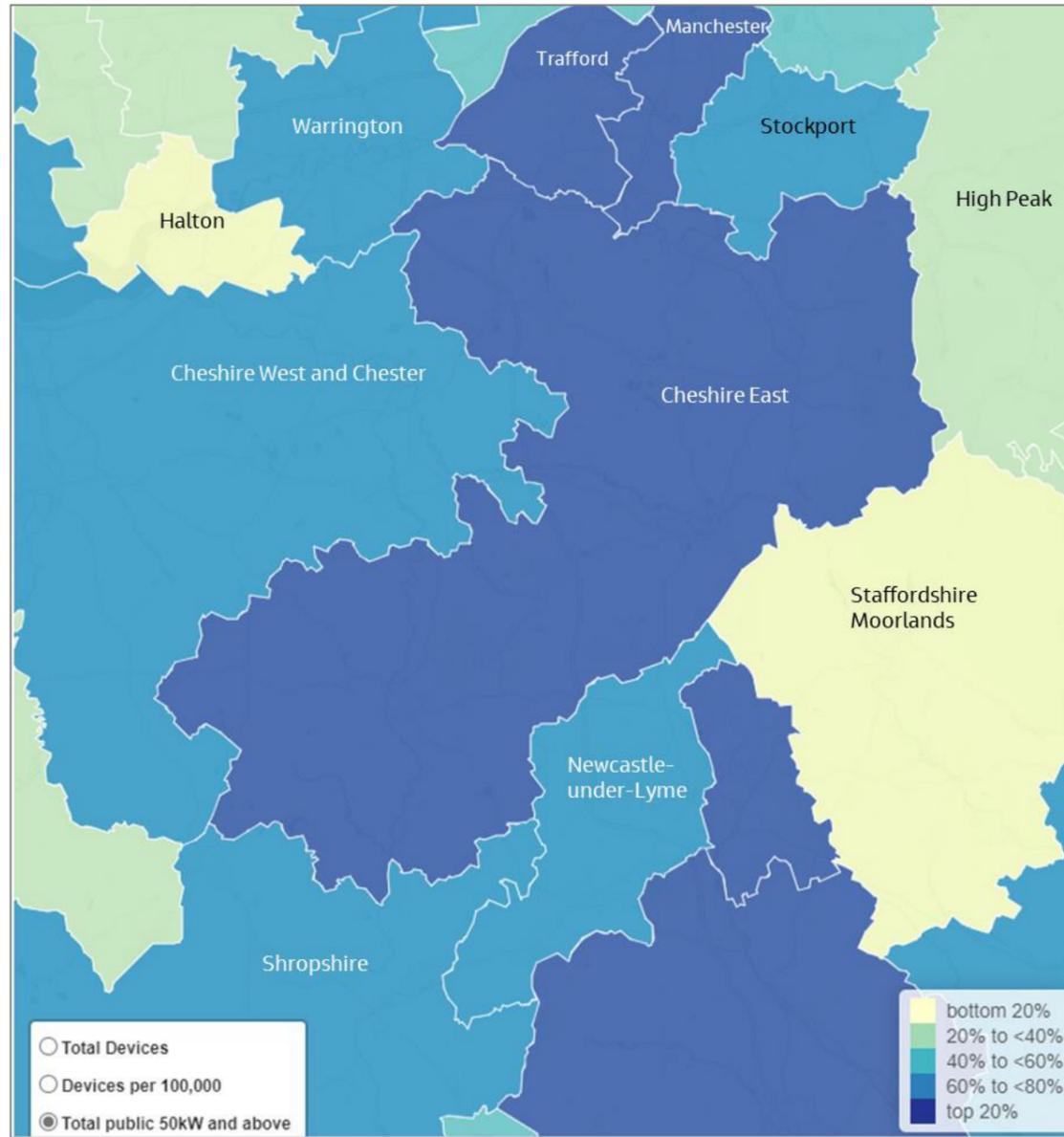


Figure 4-53 shows there are 54 public chargers 50kW and above within Cheshire East. This means that Cheshire East sits within the top 10% of all local authorities for the total number of public charge points that are 50kW above.

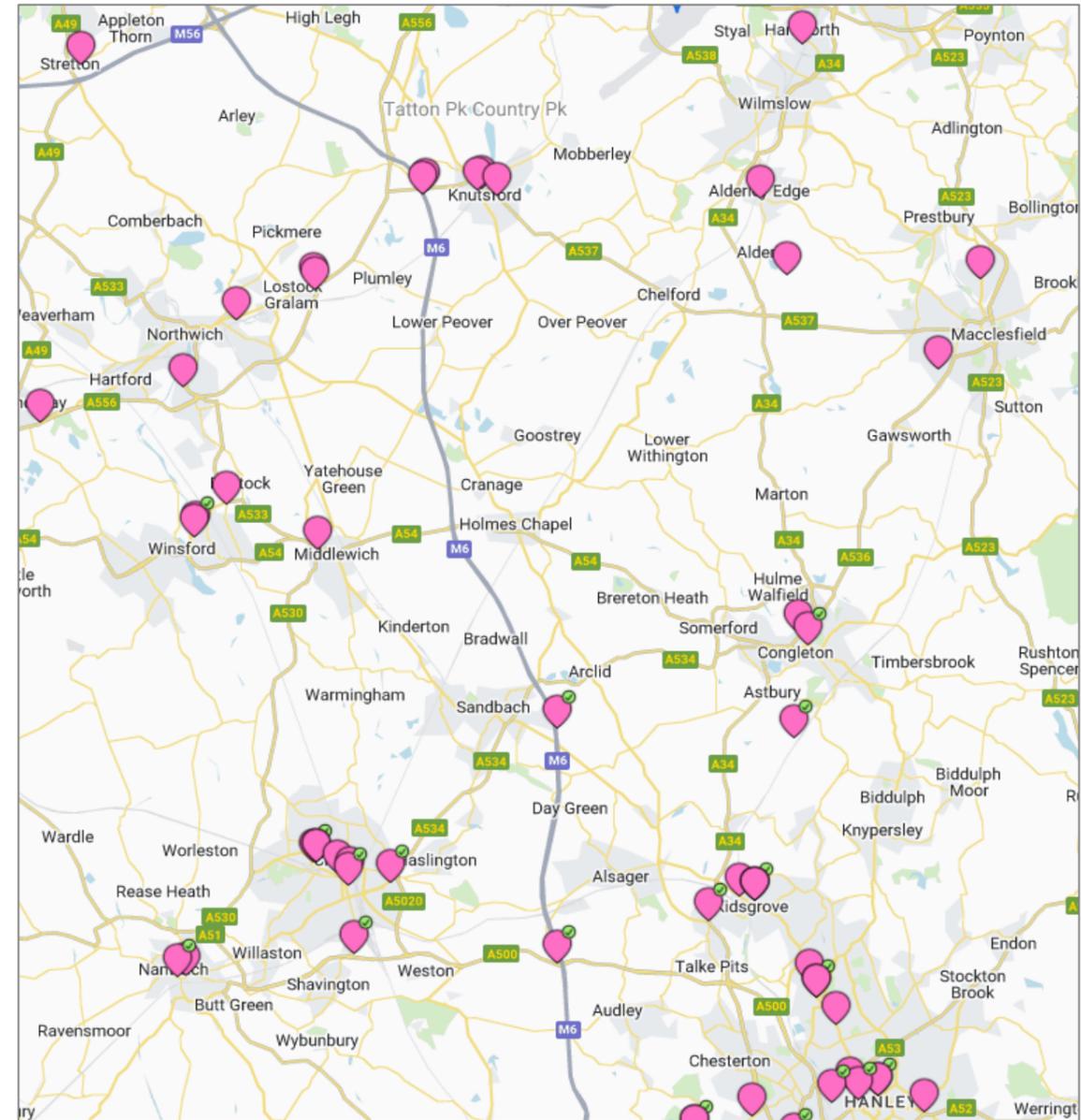


Figure 4-54 Rapid and Ultra Rapid Chargepoint locations in Cheshire East - Zap Map

It can be seen in Figure 4-54 that there are a high number of 50kW public chargepoints throughout the borough⁸⁷. There are multiple 50kW chargepoints along the M6 at Sandbach Services and Knutsford Services and along major A roads such as the A51, A34, A500, that all provide key links regionally around Cheshire East. Providing Rapid and Ultra Rapid chargepoints at these locations ensures individuals can charge their vehicles quickly if they are carrying out a long journey. Throughout the rest of the borough there are multiple 50kW chargepoints in locations such as Middlewich Morrisons, Booths Knutsford, Love Lane Car Park in Nantwich, Tesco Extra in Crewe and many more distributed around Cheshire East.

⁸⁷ Map of electric charging points for electric cars UK: Zapmap (zap-map.com)

Accessibility to the EV Network

A key issue with the current network is that chargepoints are being focused predominantly on more well used areas and are not also being installed in locations where they are needed but would be less likely to be well used. This means that areas of Cheshire East which are less attractive to investors such as more rural areas and urban areas with lower levels of EVs are lacking in provision.

Accessibility to the EV network requires installing chargepoints at a variety of location types. Different charging use cases require the presence of chargers at different locations. Chargepoint use cases include:

- 'Destination' charging - occurs in public locations where there is a high footfall of people typically spending two hours or more. This can include high streets, leisure and cultural facilities.
- 'Residential' charging - provision for residents without access to off-street parking where charging at home is not possible. This is often used in areas of terraced housing and apartments where there are no dedicated facilities for off-street parking at the property. It is essential that a technical solution is found that appropriately balances the ability to charge a vehicle on street, with the issues of liability for trailing cables across the highway, and the ability to maintain infrastructure that facilitates charging cables.
- 'On-route' charging – charging facilities individuals can use on their journeys, such as motorway facilities. These chargers are usually owned by private operators.
- 'Commuter' charging – charging facilities in public car parks that link to a form of transport such as a train station, interchange or park and ride facilities.

Providing chargepoints at each of these locations will ensure strong accessibility to the network for users across the borough. Where the market may fail to install chargepoints at less commercially attractive locations, CEC will seek to provide socially necessary chargepoint sites through specific procurement exercises and funding bids to ensure a geographically balanced network is created to allow access for all residents.

CEC need to ensure the EV network is accessible to all and infrastructure is not impaired for users with protected characteristics or differing accessibility needs. This can include ensuring trailing cables from chargers do not pose a trip hazard for prams or those with mobility issues. Due to the ongoing advances in technology, chargepoints need to be accessible to the elderly and people with disabilities. By providing an accessible EV network throughout the borough, there may be a higher demand for EVs due to the accessibility and ease of use.

4.5.3 Forecasted Requirements for Chargepoints

Future EV Demand

As noted in the EV Charging Strategy⁶³, forecasts of the number of chargepoints that are needed to serve the anticipated number of EVs in Cheshire East have been produced, as seen in Table 4-17. Forecasts show that above 300 publicly available chargepoints are needed, across residential, destination and on-route chargers by 2025, rising to around 1300 chargepoints by 2030⁸⁸. This is a large increase on the current number of publicly available chargepoints which according to UK Government figures was 153 in April 2023. Providing sufficient chargepoints is vital to enabling a timely transition to EVs as well as helping to reduce environmental issues and meet decarbonisation targets.

Table 4-17 Forecasted Publicly Available Charger Demand for Cheshire East (CEC EV Charging Strategy 2023)

Residential Parking Type	Charging Location		
	Residential	Destination	On-Route
2025	255	57	26
2030	1,015	220	96
2035	2,289	488	212
2040	3,309	693	299
2045	3,713	765	329

There is an opportunity for CEC to work towards achieving net zero by transitioning fleet vehicles to electric. In order to do this residential and on-route charging locations need to be provided. Residential charging is needed as some individuals take home their fleet vehicles at the end of the day and therefore need to charge at home, as well as requirements for top-up charging for fleet vehicles during daily operations, hence needing on-route charging infrastructure. Currently, the council has a number of chargepoints available for fleet use, however new sites that will provide a strategic network of chargepoints for the council's fleet are being assessed, some examples of these locations can be found in Table 4-18 below.

Table 4-18 Potential Council Fleet Chargepoints (CEC EC Charging Strategy 2023)

Location	Type
Sandbach Leisure Centre	Destination/Worktime
Crewe Multistorey / Delamere Street	Overnight/Worktime
Civic Way Car Park for Middlewich Library	Destination/Worktime
Knutsford Library	Destination/Worktime

4.5.4 Future Investment in Chargepoints

CEC has secured £151,000 of funding⁸⁹ from the Office of Zero Emission Vehicles which is committed as part of the On-Street Residential Charging Fund (ORCS) to install chargepoints. This funding is to be matched by the contracted chargepoint operator to provide 28 chargepoint across 15 locations in Cheshire East. The allocated chargepoint sites, included in Table 4-19 include a mixture of on-street charging locations and car parks located near residential properties that do not have off-street parking. Providing on and off-street charging infrastructure ensures that those individuals without off-street parking still have the opportunity to access EV charging infrastructure. This means owning an EV becomes more convenient, allowing individuals within Cheshire East to make the switch to a more sustainable mode of transport.

Table 4-19 ORCS Chargepoint Locations in Cheshire East (CEC EV Charging Strategy 2023)

Sites	Area	Postcode	Location Type
Fairview Car Park	Alsager	ST7 2AE	Off-street
Antrobus Street Car Park	Congleton	CW12 1HB	Off-street

⁸⁸ Cheshire East EV Strategy 2023

⁸⁹ CEC EV Infrastructure Programme Briefing Report 2023

Sites	Area	Postcode	Location Type
Wrexham Terrace Car Pa	Crewe	CW1 2ND	Off-street
Bulkeley Street	Crewe	CW1 6ET	On-street
Edleston Road Car Park	Crewe	CW2 7DG	Off-street
Hope Street Car Park	Crewe	CW2 7DR	Off-street
King Street Car Park	Knutsford	WA16 6DX	Off-street
Tatton Street Car Park	Knutsford	WA16 6AG	Off-street
Brook Street	Macclesfield	SK11 7AW	On-street
Churchill Way Car Park	Macclesfield	SK11 6AY	Off-street
Whalley Hayes Car Park	Macclesfield	SK10 1BS	Off-street
Southway Car Park	Middlewich	CW10 9BL	Off-street
Snow Hill Car Park	Nantwich	CW5 5LS	Off-street
Chapel Street Car Park	Sandbach	CW11 1DH	Off-street
The Carrs Car Park	Wilmslow	SK9 4AA	Off-street

engagement is required to determine the deliverability of transitioning buses to EV and where the best place to install chargepoints will be. Due to the nature of their operation these vehicles come with specific charging demands which will need to be considered and catered for.

As well as ORCS funding, CEC have confirmed funding for the Local Electric Vehicle Infrastructure Fund from the UK Government, with £2.2 million allocated to deliver chargepoints and maximise investment in EV charging infrastructure across the borough⁹⁰. The LEVI Fund builds on the ORCS Fund to support local authorities in England to work with the chargepoint industry, to improve the roll out and commercialisation of local charging infrastructure.

4.5.5 Other Electric Vehicle Classes

As part of the CEC EV Charging Strategy in the short to medium term, CEC intends to support the provision of rapid charging for taxis in convenient locations. By providing strategically located chargepoints, the uptake of EV Taxis throughout the borough will increase due to the accessible charging network that is in place. Taxis contribute to air quality issues and therefore it is important to transition to EVs.

At the time of writing in Cheshire East, there are 607 taxis throughout the borough comprised of;

- Private Hire Vehicles – taxis pick up passengers from taxi ranks or can be flagged down in the streets by passengers and do not require pre-booking.
- Hackney Carriage Vehicles - taxis that provide services that need to be pre-booked, where it is illegal to hail down the taxi on the street.

In Cheshire East there are currently only two battery electric taxis out of the 607 taxis in the borough, with both being private hire. Of the 607 taxis there are currently 101 hybrid vehicles throughout the borough. From the data available it is unclear whether a proportion of these hybrid taxis are plug-in or not.

It is important that Cheshire East increases the number of electric taxis throughout the borough to ensure reduced emissions, contributing to improved air quality and reduced pollution in the borough.

As well as taxis, Cheshire East's Bus Service Improvement Plan (BSIP) supports a shift to low and zero emission in total bus fleet. In the medium term the borough is committed to providing charging infrastructure for buses, however, further

⁹⁰ Cheshire East EV Strategy 2023

4.5.6 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below.

Section	Key Findings	Implications for the LTP
4.5.1	In Cheshire East 5,285 Plug in Vehicles (PIVs) were registered in Quarter 2 of 2022, making up 2.11% of the vehicles registered in Cheshire East during Q2 of 2022. This is slightly below the national average for the UK which is at 2.39%.	Cheshire East need to accelerate the update of EVs in order to meet decarbonisation targets set internally and by the UK Government.
4.5.1	The density of EVs varies across Cheshire East, with there being higher densities of EVs in urban areas. This can be linked to population density of the borough which shows the most populated areas are situated in urban areas.	This data shows that without intervention, the private sector will focus the provision of chargepoints in areas of higher density and in this case in more urbanised areas. The CEC EV Charging Strategy recognises this risk, and therefore has set out measures to support the provision of an equitable network that ensures access to charge points across the borough for all residents.
4.5.2	There are 40.9 chargers per 100,000 individuals in Cheshire East, compared to 55.6 in Cheshire West, 56.7 in Manchester and 83.2 in Trafford. This shows that Cheshire East has a lower number of public chargepoints per 100,000 of the population.	Improvement to the charging network are required to enable an acceleration in EV uptake within the borough. It is important that CEC ensures chargepoints are provided in the vicinity of where they are needed by residents and stakeholders in addition to locations where their use will be maximised.
4.5.2	Chargepoints are located around towns within Cheshire East, especially around the towns of Crewe and Knutsford, where there is a clustering of rapid chargers. There is higher demand for charging in these areas due to the lack of driveways and therefore access to off-street parking.	Due to the higher demand in these areas, it is important to ensure that Cheshire East are providing enough chargepoints in these locations to keep up with the demand of EVs in Cheshire East.
4.5.3	Forecasts show that above 300 publicly available chargepoints are needed, across residential, destination and on-route chargers, by 2025 rising to around 1300 chargepoints by 2030.	Providing sufficient chargepoints is vital to enabling a timely transition to EVs in Cheshire East, as well as ensuring that environmental issues are reduced, and decarbonisation targets are met.
4.5.4	CEC has secured £151,000 of funding from the Office of Zero Emission Vehicles as part of the On-Street Residential Charging Fund (ORCS) to install chargepoints at various locations. The allocated chargepoint sites, include a mixture of on-street charging locations and car parks located near residential properties that do not have off-street parking. Further to this £2.2m has also been secured from the Local Electric Vehicle Infrastructure (LEVI) Fund that will play a major role in accelerating the provision of chargepoints for residents.	Significant funding has already been secured to accelerate the rollout of chargepoints.
4.5.5	In Cheshire East there are currently only two fully battery electric taxis out of the 607 in the borough, with both being private hire.	It is important that Cheshire East increases the number of electric taxis throughout the borough to ensure reduced emissions, contributing to improved air quality and reduced pollution in the borough. As well as improving air quality, by providing a fleet of electric taxis throughout the borough Cheshire East will lead by example for other organisations and individuals within the borough by encouraging the shift to cleaner transport options.

4.6 Highways

Cheshire East relies heavily on the condition and availability of its road network, which also supports other modes of travel such as bus and active travel. Ensuring this network operates effectively and has adequate capacity is a strategic priority for the council.

4.6.1 Road Network

The highway network in Cheshire East performs different roles and with different characteristics. The Strategic Road Network (SRN)⁹¹ comprises the country's motorways and trunk roads and is managed by National Highways. Figure 4-55 shows the roads included within the SRN in Cheshire East connecting the key towns and economic centres in the borough and across England.

The M56 provides access to Manchester Airport and South Manchester at the eastern end. Towards the western end the M56 provides access to the wider Cheshire area and Chester and North Wales. The M6 runs north - south and provides access at its southern end to the West Midlands areas such as Birmingham and Coventry and further north areas such as Chester, Manchester, Liverpool, Blackpool and Lancashire, and further linking north of England through Cumbria and Scotland. Within Cheshire East, the M6 provides access to Sandbach and its surrounding areas from Junction 17, Middlewich from Junction 18, Knutsford and surrounding areas from Junction 19, the M6 then crosses the M56. Just outside of Cheshire East the M6 provides access to Birchwood, a key employment site in Warrington. The A556 runs between the two motorways and provides access to areas of Cheshire East such as Knutsford and Tatton Park before moving into Cheshire West.

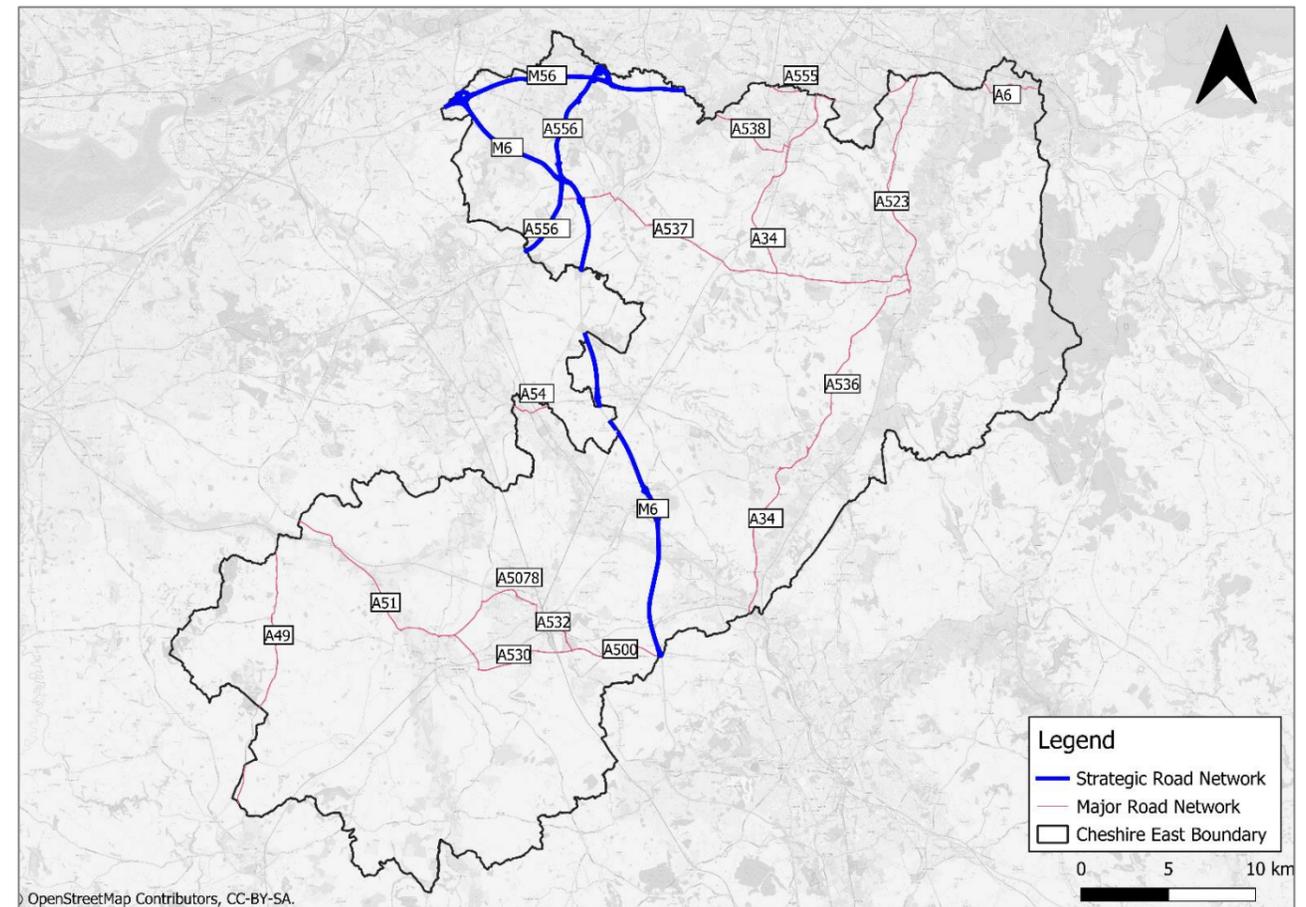


Figure 4-55: Cheshire East Strategic Road Network and Major Road Network

Also highlighted in Figure 4-55 is Cheshire East's Major Road Network⁹²; these roads form the middle tier of the country's busiest and most economically important local authority 'A' roads. The A-road network provides an important economic function in linking the key centres of Cheshire East with each other and the SRN and is managed by CEC as the Local Highway Authority.

In terms of Cheshire East's road network, this comprises of 2,700km⁹³ of carriageway which can be classified as A, B, C roads or unclassified local roads. The unclassified network accounts for 58% of the overall network length. The A-Roads and motorways within Cheshire East are highlighted in Figure 4-56.

⁹¹ <https://nationalhighways.co.uk/our-roads/roads-we-manage/>

⁹² Major Road Network

⁹³ Cheshire East Highway Asset Management Strategy

- Similarly in Great Britain, annual vehicle miles were increasing until 2020 when miles dropped by 21.5%, miles have recovered since the pandemic, however they are still below pre-pandemic levels.

Figure 4-58 shows the Percentage Change in Traffic across Cheshire East, the North West and nationally. This data has been derived from annual traffic data from 2009 to 2022.

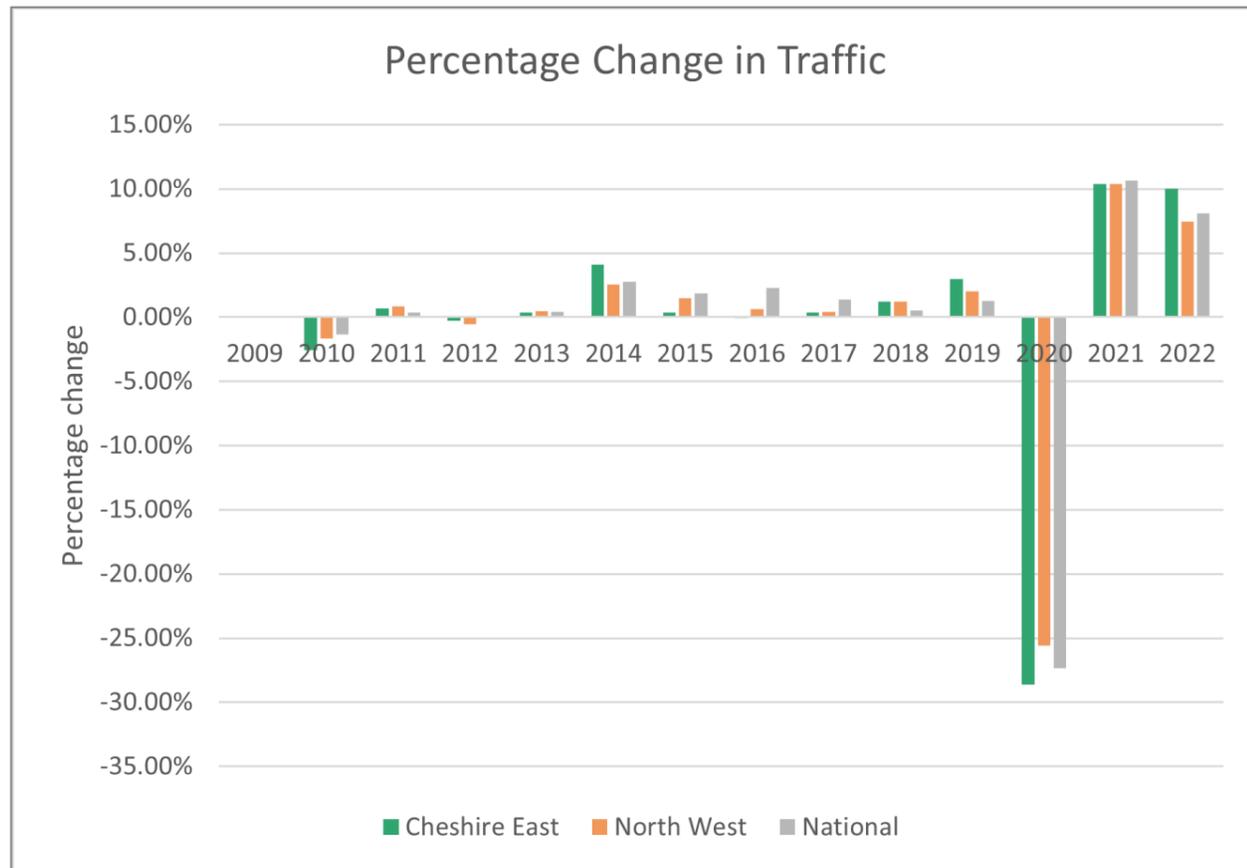


Figure 4-58: Percentage Change in Traffic

As shown above, all three areas experienced a significant drop in traffic in 2020, Cheshire East experienced the largest change out of the three areas. In 2021, traffic numbers increased by around 10% for all three areas, however in 2022 traffic figures increased by 10% in Cheshire East, this was around a 2.5% higher increase than the North West and 1.9% higher increase than England. Cheshire East traffic has been steadily increasing by around 10% for the past two years data is available for from 2021 and 2022, whereas the North West and the nation saw a reduction in increase in 2022.

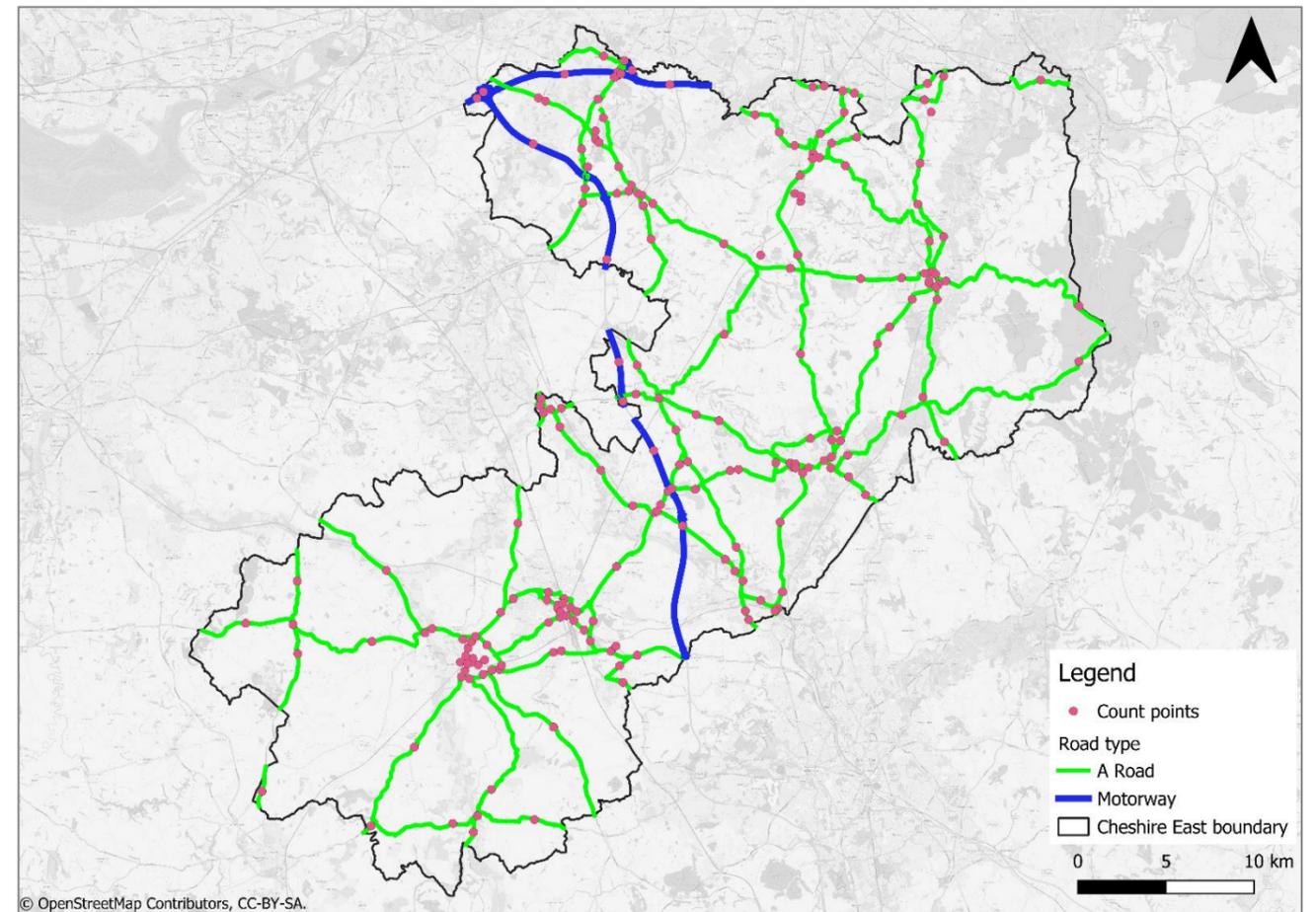


Figure 4-59: Major Road count points

Figure 4-60 shows the average traffic in each year across the major road count points within Cheshire East for the latest four years of data between the hours of 07:00 and 18:00⁹⁵. Traffic is calculated by multiplying Annual Average Daily Flow (AADF) by the corresponding length of road and the number of days in the given year. AADF is calculated by counting the number of vehicles that travel past the count point on an average day of the year. The count point locations can be seen above in Figure 4-59.

⁹⁵ Road Traffic statistics CE

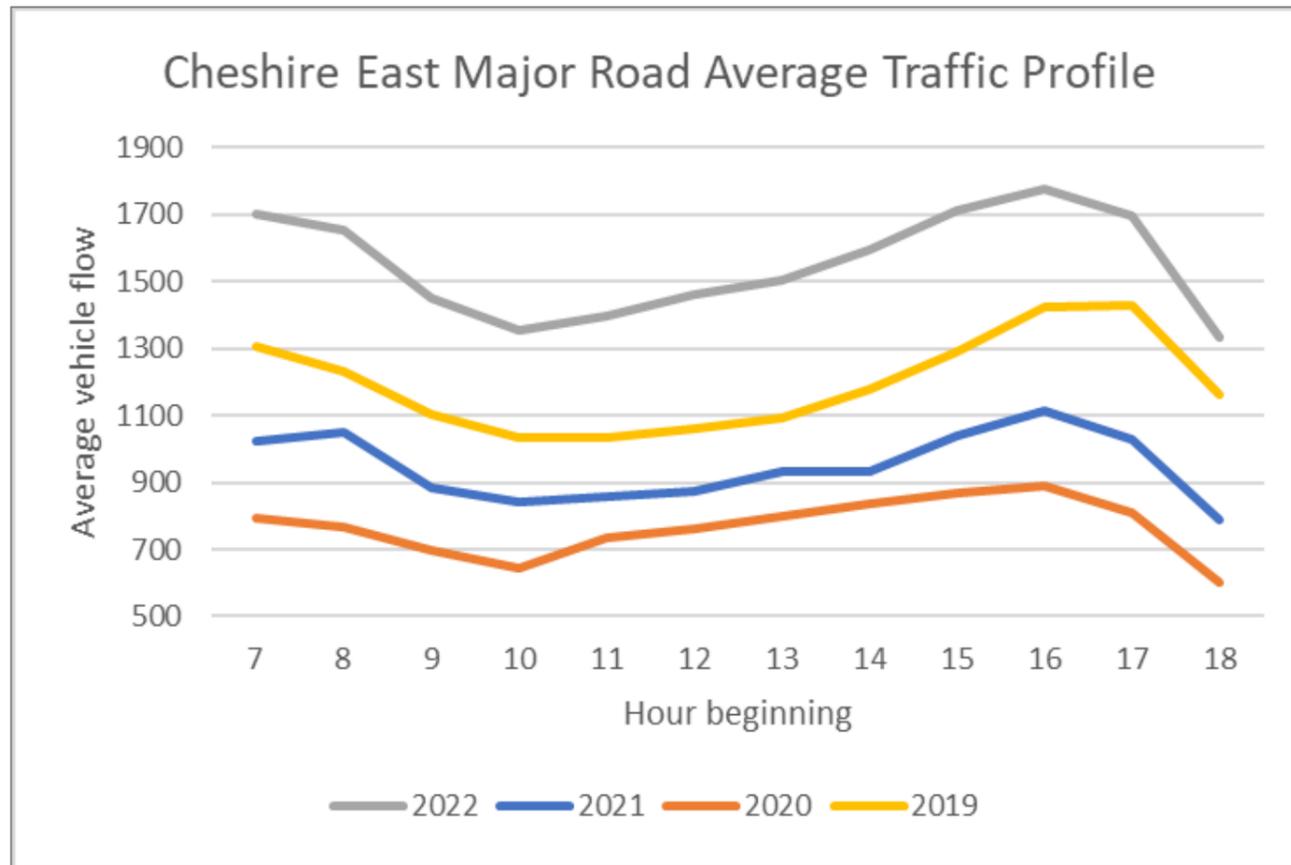


Figure 4-60: Cheshire East Major Road Average Traffic Profile

The above graph shows that for major roads the peak hours for traffic tend to be between 07:00 and 08:00 in the morning and between 16:00 and 17:00 in the evening; interestingly, this is a similar trend throughout the pandemic impacted years 2020 and 2021, however the peaks are less pronounced. In 2022 the data shows traffic levels to have exceeded pre-pandemic 2019 levels. This may be due to an increase in population and car use, reduced public transport services which may cause people to rely on the car more, or the inadequate delivery of active travel infrastructure which may deter people from cycling and have more people rely on the car for travel.

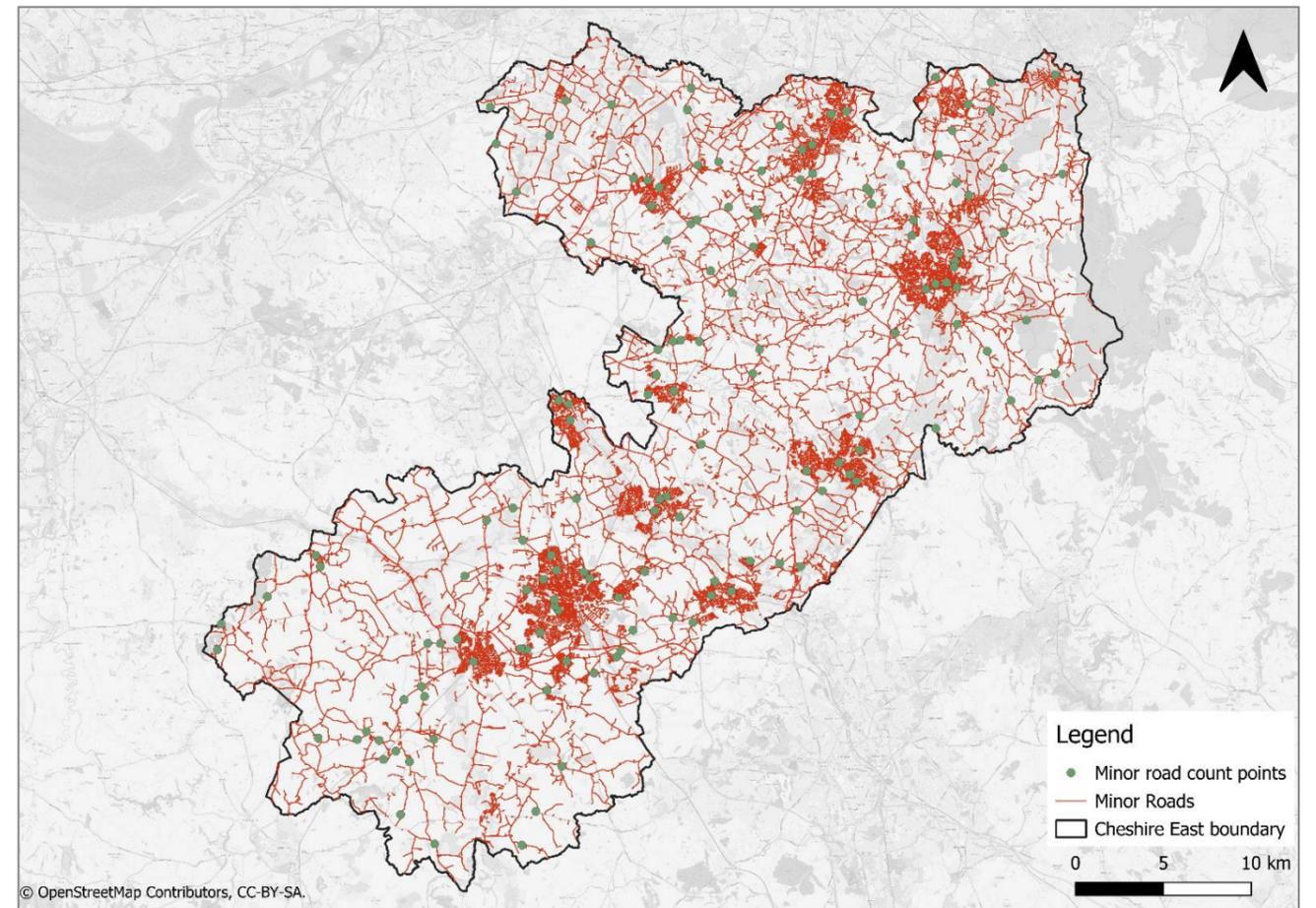


Figure 4-61: Cheshire East Minor Road Count Points

Figure 4-62 shows the average annual daily vehicle flow in each year across the minor road count points within Cheshire East for the latest four years of data between the hours of 07:00 and 18:00⁹⁶. These profiles are created using Average Annual Daily Flow, the count point locations can be seen above in Figure 4-61.

⁹⁶ Road Traffic statistics CE

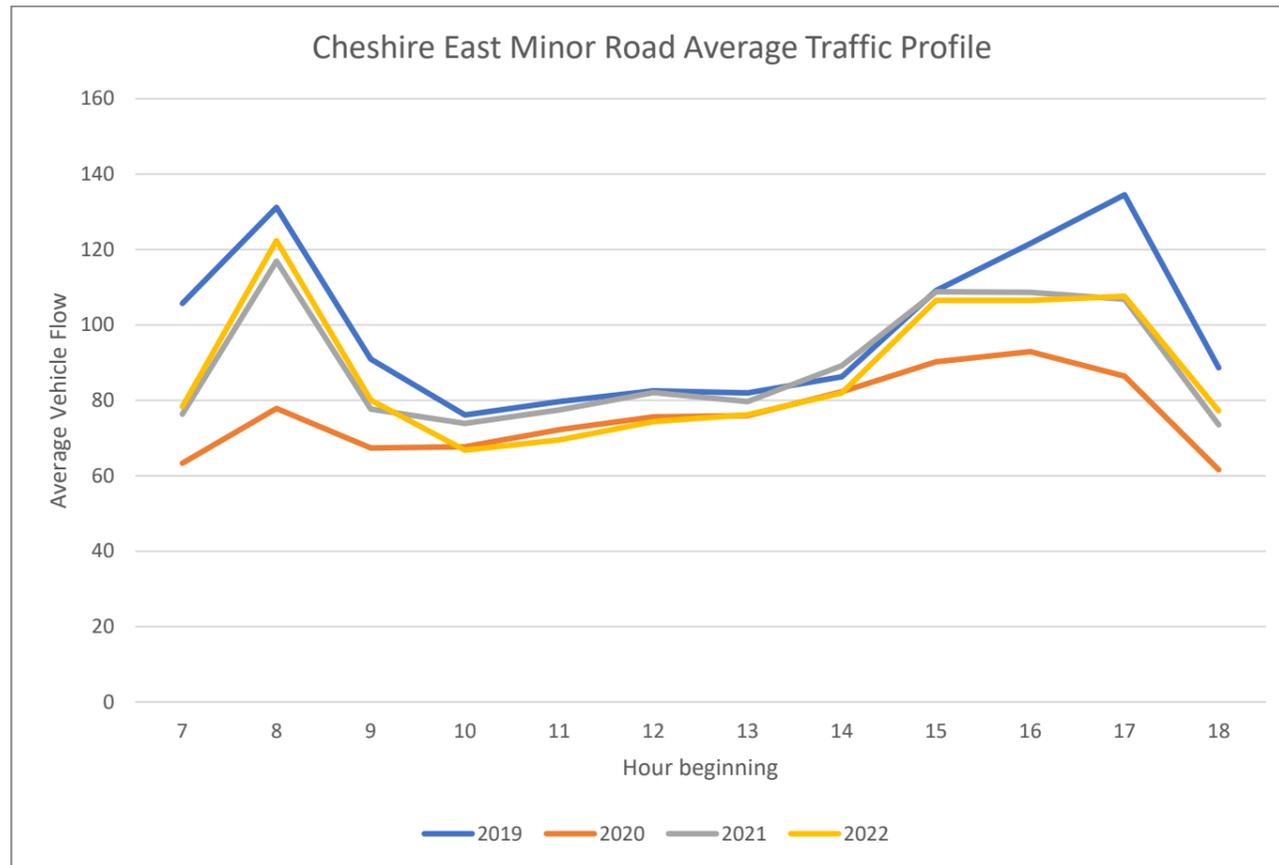


Figure 4-62: Cheshire East Minor Road Average Traffic Profile

Figure 4-62 above shows that for minor roads the peak hours are between 07:00 and 08:00 in the morning and 15:00 and 17:00 in the evening. Between 09:00 and 14:00 traffic is relatively lower for all the years; this may be because these roads are used to travel to and from people’s homes for work and taking children to school. Therefore, once people are out of their homes, or in the case of the pandemic not leaving their homes, these roads are travelled on less. During the pandemic in 2020, traffic along minor roads was lower on average than the other years for most of the day, as less people were leaving the house for work, school or other activities. At 08:00 and 17:00 the morning and evening peak, for 2019, there were on average approximately 50 less vehicles counted for both times. Compared to the major roads, traffic is a lot lower with less journeys on average. In 2022 the data shows traffic levels are below pre-pandemic levels; this may be because of a change in work habits that has resulted in less people travelling to work.

4.6.3 Performance/Reliability of the network

Information to be added on congestion/delay when Streetlight analysis has been undertaken (see section 4.9.2).

4.6.4 Annual Average Daily Flow

Figure 4-63 and Figure 4-64 show the Annual Average Daily Flow (AADF) for a selected number of key A-Roads and the motorways in Cheshire East. AADF is the average over a full year of the number of vehicles passing a point in the road network each day and is supplied by DfT⁹⁷.

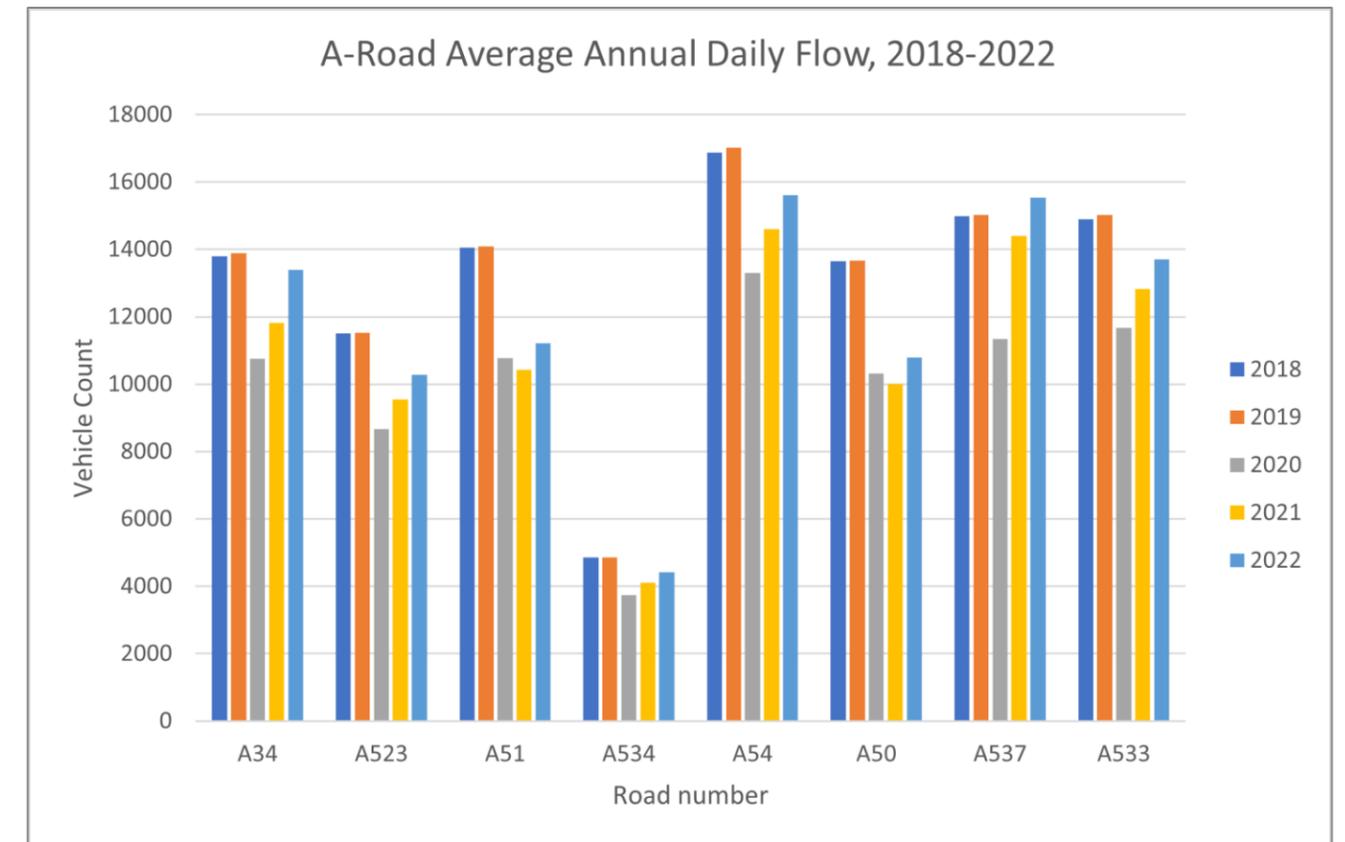


Figure 4-63: A-Road Average Annual Daily Flow, 2018-2022

Figure 4-63 shows that for all the chosen roads, a significant drop in AADF was experienced in 2020 due to the pandemic. From 2021 onwards, AADF has increased, however along all but one road it has not yet reached pre-pandemic levels. It is only along the A537 that AADF has returned to and surpassed pre-pandemic levels of traffic flow.

⁹⁷ DfT Cheshire East road traffic statistics

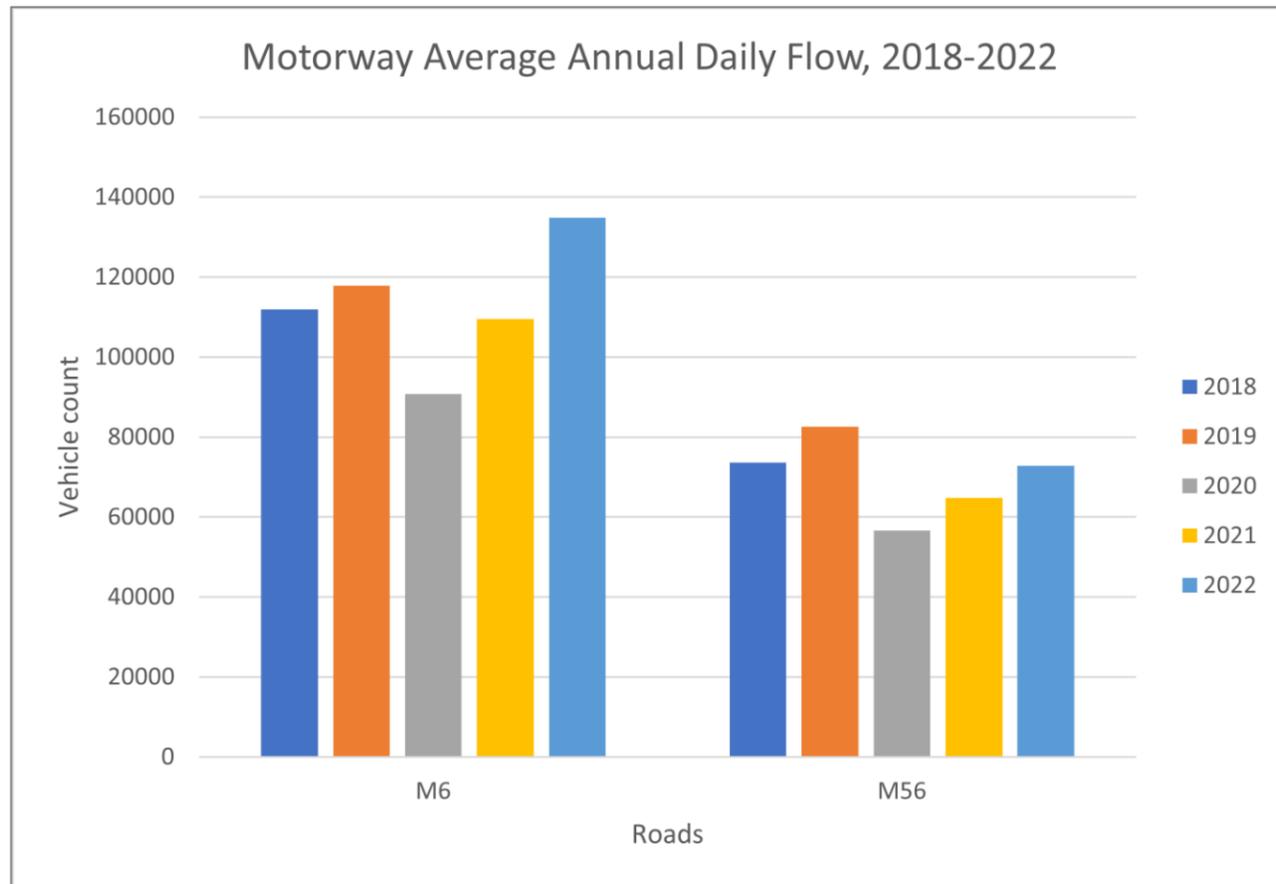


Figure 4-64: Motorway Average Annual Daily Flow, 2018-2022

Figure 4-64 shows that for both motorways the pandemic caused a significant reduction in AADF. Since 2020, the AADF of both motorways has increased with the M6 flow significantly higher than pre-pandemic levels. The M56 flow has not surpassed pre-pandemic levels, however it is at a similar level to 2018.

Figure 4-65 shows the Great Britain AADF for all major roads in the country. As shown the flow portrays a similar pattern to that of the M56 and A-Roads in Cheshire East. Flow fell significantly in 2020 and has been increasing since, however flows have not yet reached pre pandemic levels.

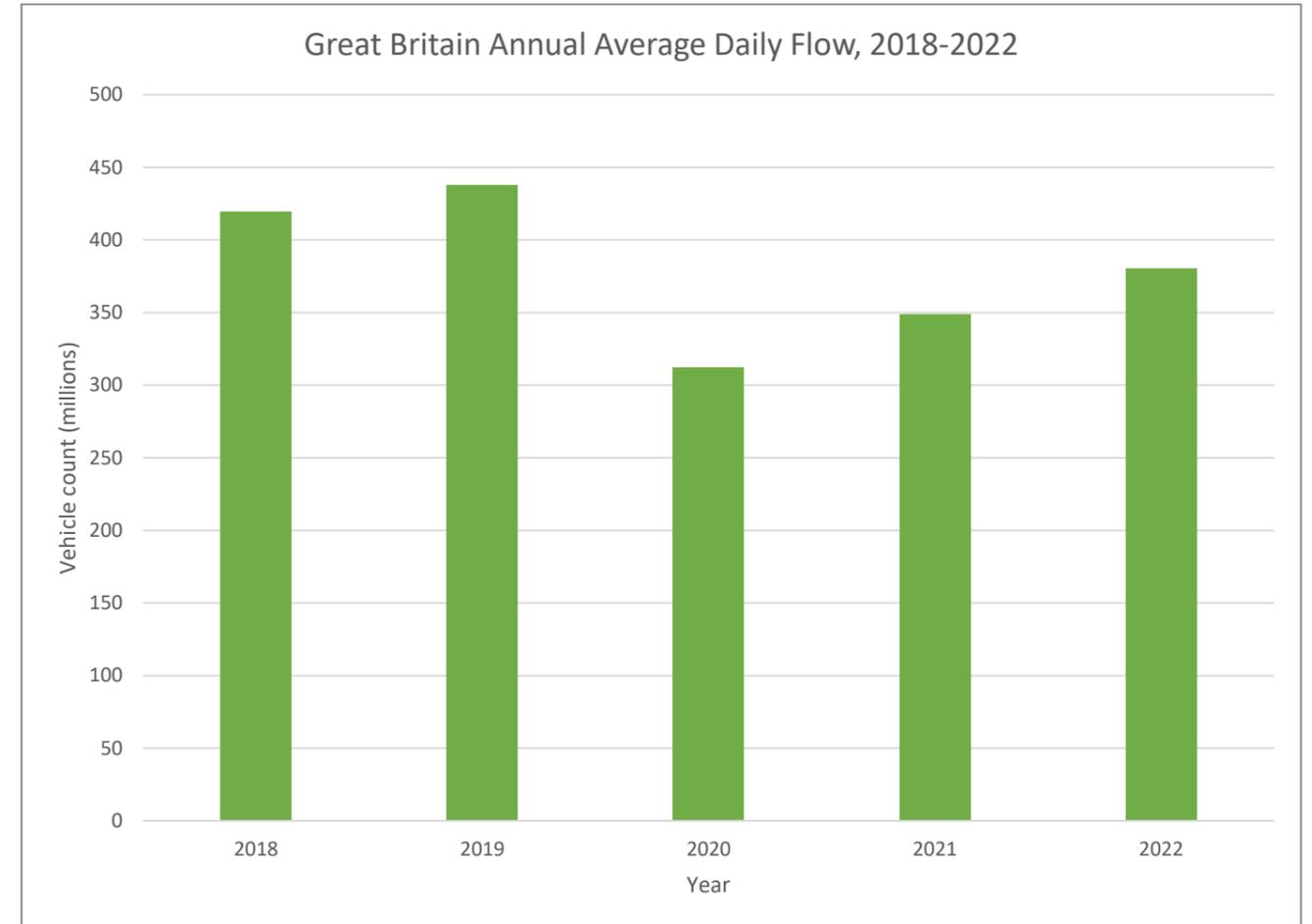


Figure 4-65: Great Britain Annual Average Daily Flow, 2018-2022

4.6.5 Car trips by distance

Figure 4-66 shows the number of car trips within Cheshire East separated into the distances of each trip for the years 2002 to 2022. The data has been derived from the National Travel Survey and provided by Transport for the North.

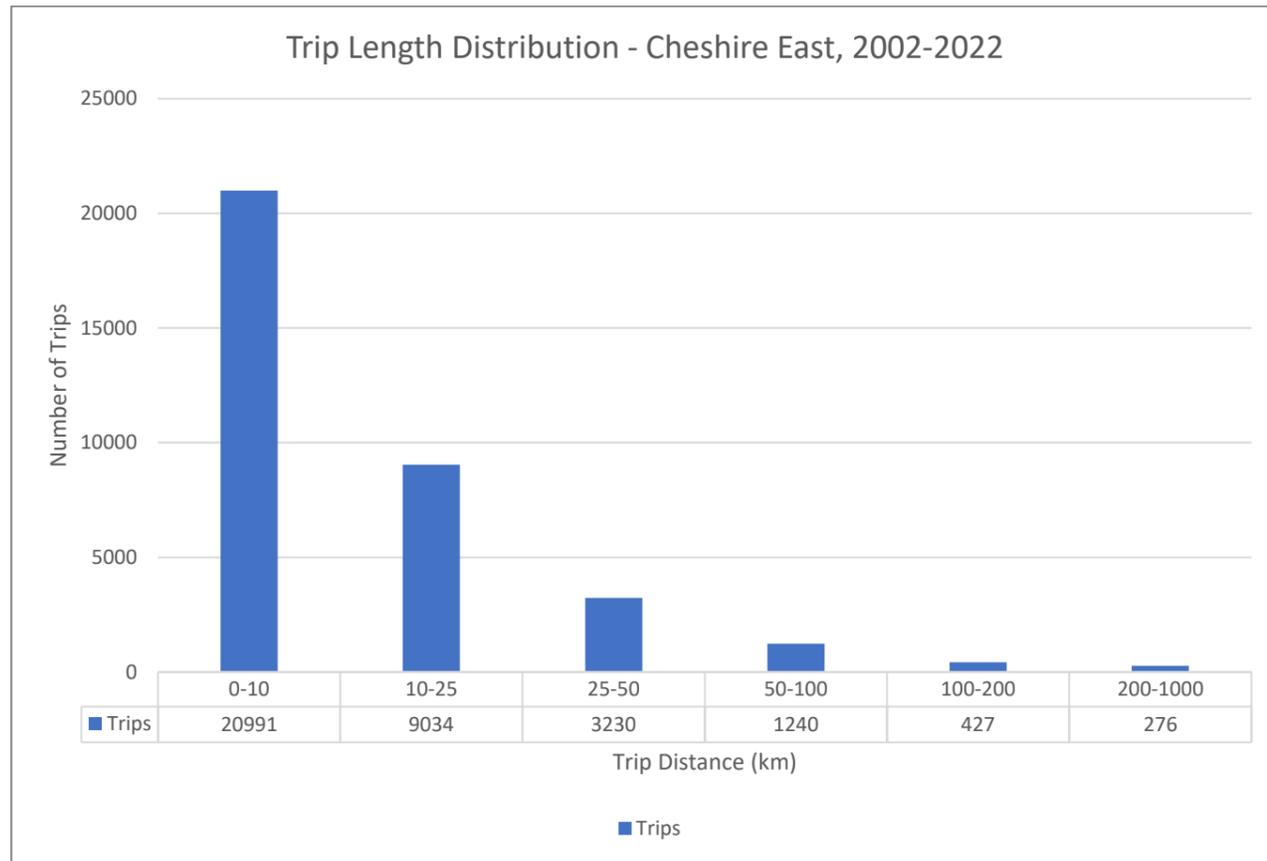


Figure 4-66: Trip length distribution, 2002-2022

As shown in Figure 4-66 the majority of trips in Cheshire East are under 10km, these trips make up 59.6% of car trips. The next most trips are within the 10-25 km range with 25.6% of trips being within this distance, and 9.2% of trips being between 25-50 km. Cheshire East could look to reduce the number of shorter distance trips and replace these with active travel and public transport trips. The longer distance trips may rely more on improving the rail network to reduce the number of these.

4.6.6 Traffic flow composition

Based on the 2022 DfT average annual daily flow (AADF) traffic counts for Cheshire East, the composition of traffic flow is shown in Figure 4-67⁹⁸. Figure 4-67 highlights that the road network in Cheshire East is car and taxi dominated, they account for just over two thirds of all vehicles. LGVs account for around 19% of Cheshire East's composition and HGVs just under 13%.

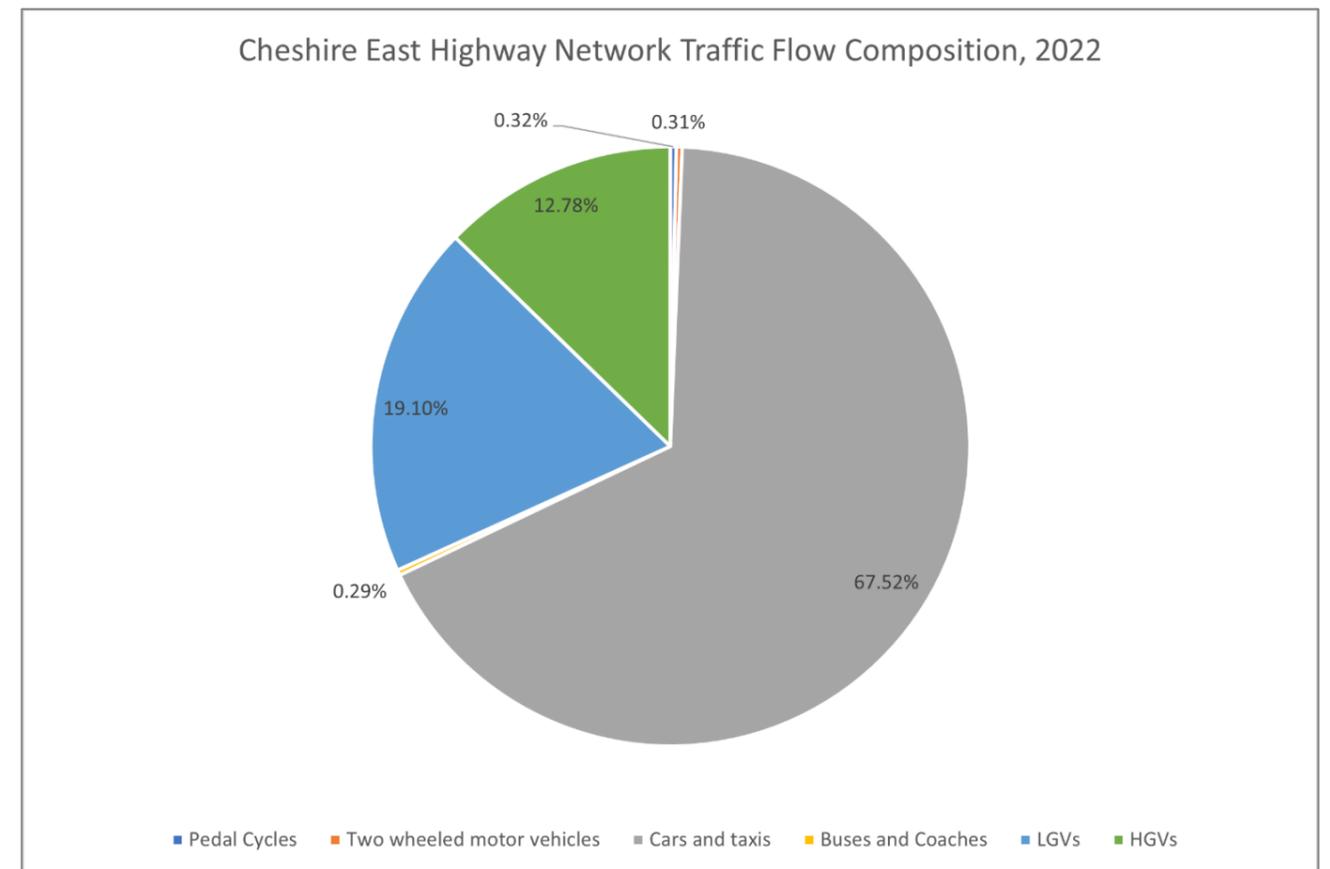


Figure 4-67: Cheshire East Highway Network Traffic Flow Composition, 2022

The impact of the pandemic on Cheshire East's traffic flow composition can be seen in Figure 4-68. The graph shows the proportion of cars and taxis, HGVs and LGVs on the Cheshire East road network over the latest four years of data, which is taken from DfT count point data. The location of these count points is shown earlier in Figure 4-59 and Figure 4-61.

⁹⁸ Road Traffic statistics CE

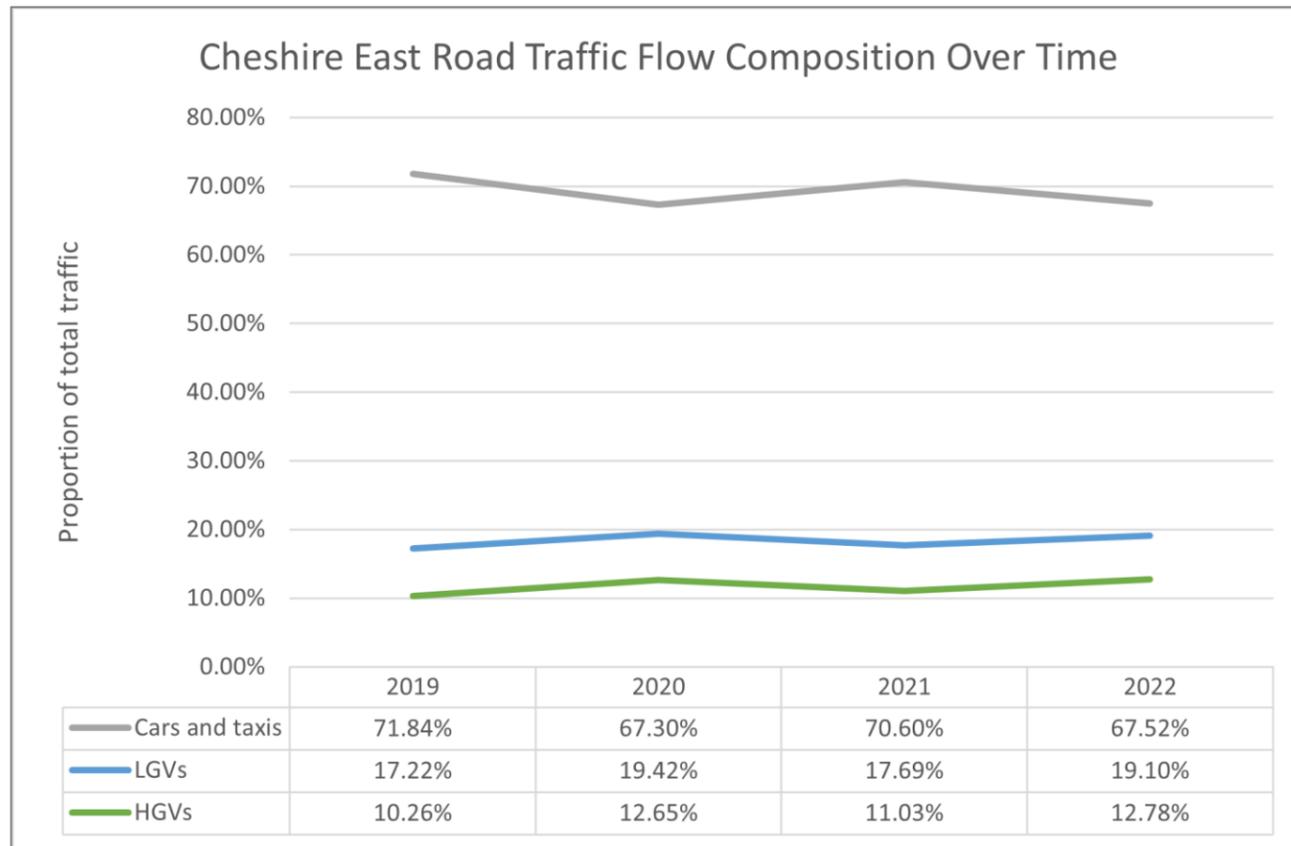


Figure 4-68: Cheshire East Traffic Flow Composition Over Time

Figure 4-68 shows that the proportion of cars dropped by 4% in 2020 as a result of the pandemic; and the proportion of LGVs and HGVs increased by around 2% each. Since the pandemic, the proportion of LGV and HGV has increased and is now higher than pre-pandemic levels by around 2% each. The proportion of cars has remained 4% lower than prior to the pandemic. During, and since, the pandemic the number of LGVs and HGVs has increased due to the rise in e-commerce and the demand for delivering these goods. Along with the decrease in car journeys during the pandemic, this may be the cause of the increase in the proportion of LGVs and HGVs on Cheshire East roads. This is further explored in Section 4.8.

4.6.7 Road safety

The following tables below highlights the collision data for Cheshire East⁹⁹. Table 4-20 below highlights the number of collisions resulting in fatal or serious injury which have occurred by road class.

Table 4-20: Collisions (2018-2023) by Road Class

	A-Road	B-Road	C-Road	Unclassified	Total
Fatal	45	9	4	9	67
Serious	246	57	43	133	479

	A-Road	B-Road	C-Road	Unclassified	Total
Total	291	66	47	142	546

Table 4-20 shows that 67% of fatal collisions in Cheshire East occur on A-roads. C-Roads account for the least number of collisions with 8.6% of fatal or serious collisions occurring on these roads. Between 2018 and 2023 fatal collisions made up 12.3% of fatal or serious collisions.

By improving safety and reducing the number of collisions on the road network first and foremost the human cost of collisions will be reduced, and the reliability of the network will improve. Delays will also be reduced for road users, as a result of less people being delayed, and the productivity of Cheshire East Road users will increase. Therefore, the region's economy will benefit from more people being more productive. The costs related to collisions will also be reduced, thus decreasing the impact of collisions on the Cheshire East economy.

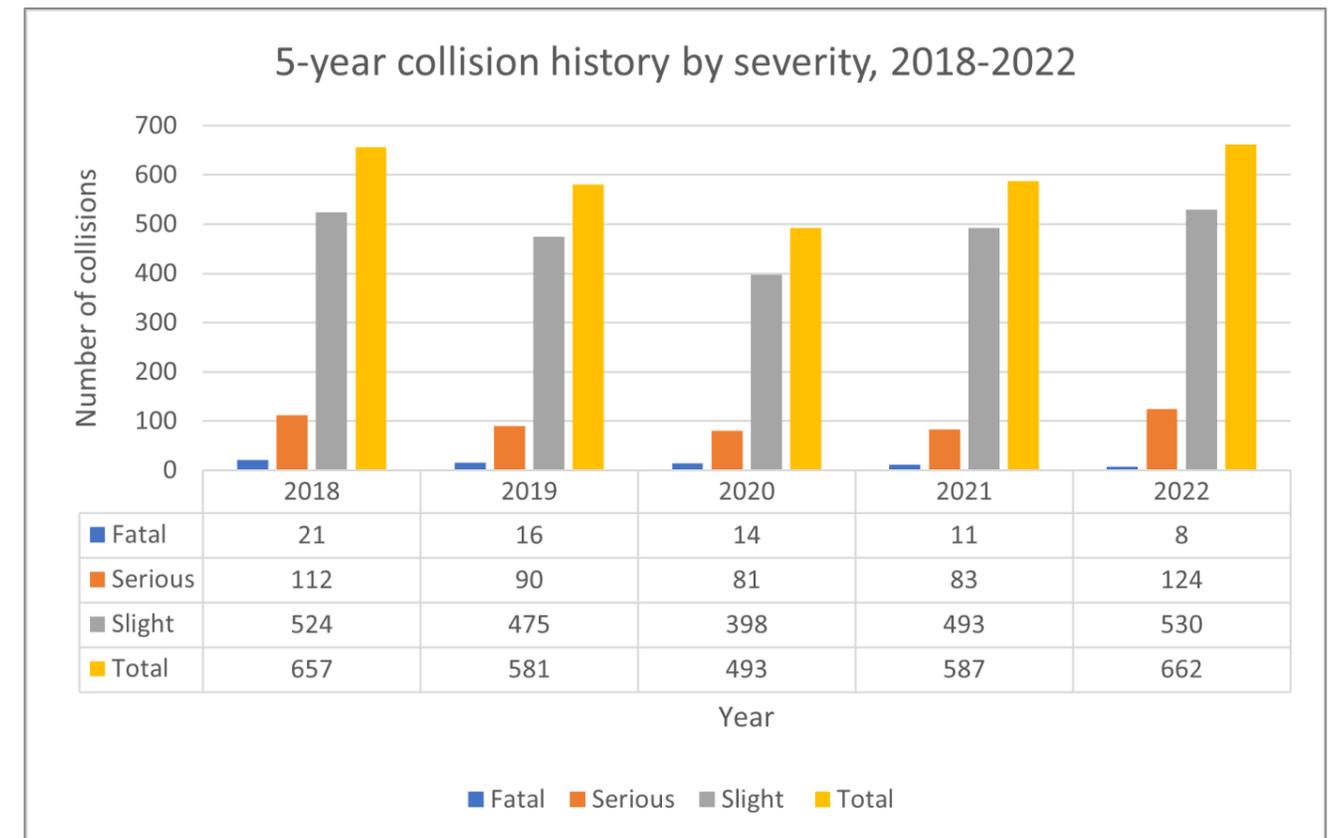


Figure 4-69: 5-year collision history by severity, 2018-2022

Figure 4-69 shows collision data between 2018 and 2022. The data shows that there was a significant drop in collisions in 2020 compared to 2019 by approximately 90. This is because, as shown previously the level of traffic was lower during this period due to the pandemic, therefore collisions were also lower. This figure increased to 2019 levels and has continued to rise further in 2022 to reach 2018 levels of collisions. The most significant fall in collisions was in 'slight' collisions which fell by around 75 between 2019 and 2020. However, 'slight' collisions in 2022 were higher

⁹⁹ Road Safety Data

than for any other year in the data shown, as were serious 'collisions', this has led to collisions in total being higher in 2022 than any other year. 'Fatal' collisions have continued to reduce year on year with the 2022 figures being the lowest number of 'fatal' collisions over the past five years. Whilst there could be number of reasons for this, the reduced volume of traffic levels may have influenced the number of fatalities. However, the low sample size means that there is going to be some variance expected. Overall, fatal accidents have been reducing over the last five years which could be a result of improved road safety schemes and awareness. This may be as a result of road safety education provided by Cheshire Fire and Rescue Services.

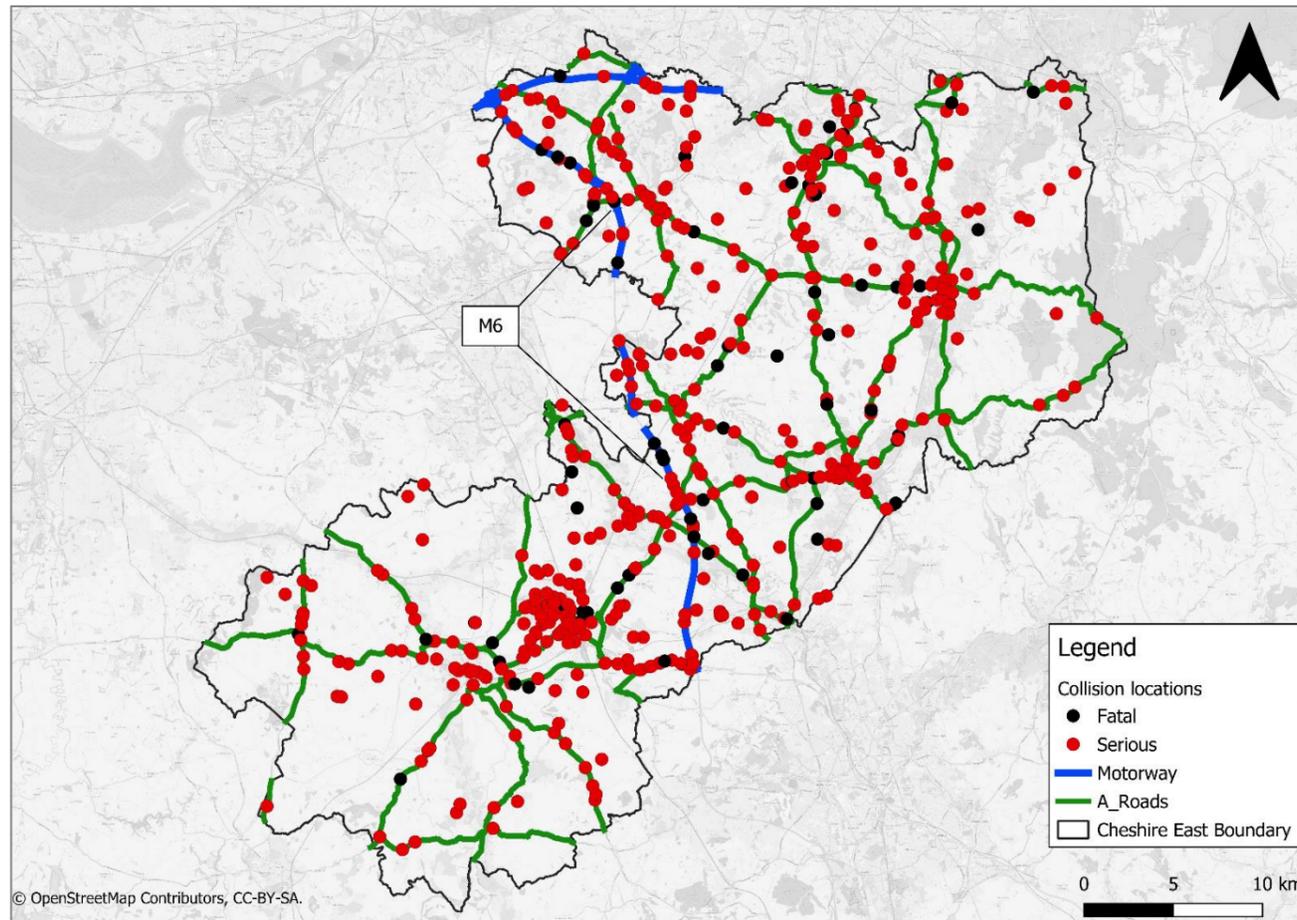


Figure 4-70: Fatal and serious collisions, 2018-2022

Figure 4-70 highlights the locations of all the fatal and serious collisions within Cheshire East between 2018 and 2022. The figure shows that there is a large concentration of collisions within the key towns of Crewe and Macclesfield. Away

from these towns, many of the collisions take place on the Motorways and A-Roads within Cheshire East with many of the fatalities occurring along the M6.

4.6.8 Car ownership

Figure 4-71 Shows the number of cars owned per household at a Cheshire East level in 2011. Figure 4-72 compares the number of cars or vans owned per household at a local authority, regional and national level for 2021¹⁰⁰. Compared to the 2011 Census, the data shows that in Cheshire East in 2021 the proportion of people without a car or van in the household is approximately 10% lower than the North West and 9% lower than England. Whilst the percentage of households owning 1 car or van is similar across the three areas, the number of households owning 2 cars or vans is significantly higher in Cheshire East. The proportion of households owning 2 cars or vans in Cheshire East is 33%, the North West is 8% lower and England is 7% lower. Whilst not as large, the proportion of Cheshire East households with 3 or more cars or vans is also higher than the region by 4% and the nation by 2%. Comparing 2011 car ownership with 2021 shows car ownership to be relatively similar, however the number of households without access to a car or van has decreased by 1.6% and the number of households with access to 3 or more cars or vans has increased by 1.1% within the time period.

The higher proportion of households owning 3 or more cars or vans may be because Cheshire East overall is seen to be relatively affluent with the majority of the borough in the 40% least deprived areas nationally. In terms of transport, cars and vans are the dominant mode of travel in Cheshire East. This is further highlighted in the Figure 4-71 and Table 4-21 which focus on the method of travel to work and how this relates to car ownership.

¹⁰⁰ [nomis Car or Van availability](#)

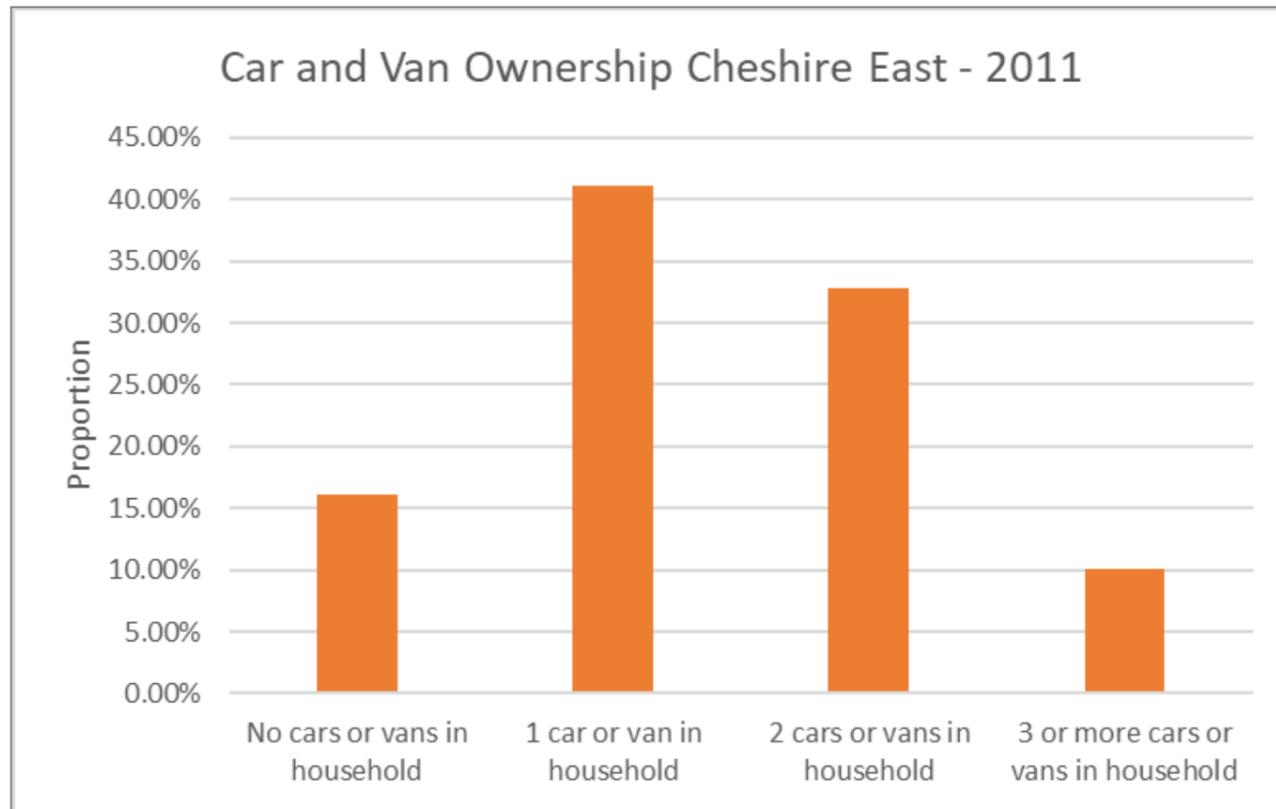


Figure 4-71: Car Ownership Per Household in Cheshire East, 2011

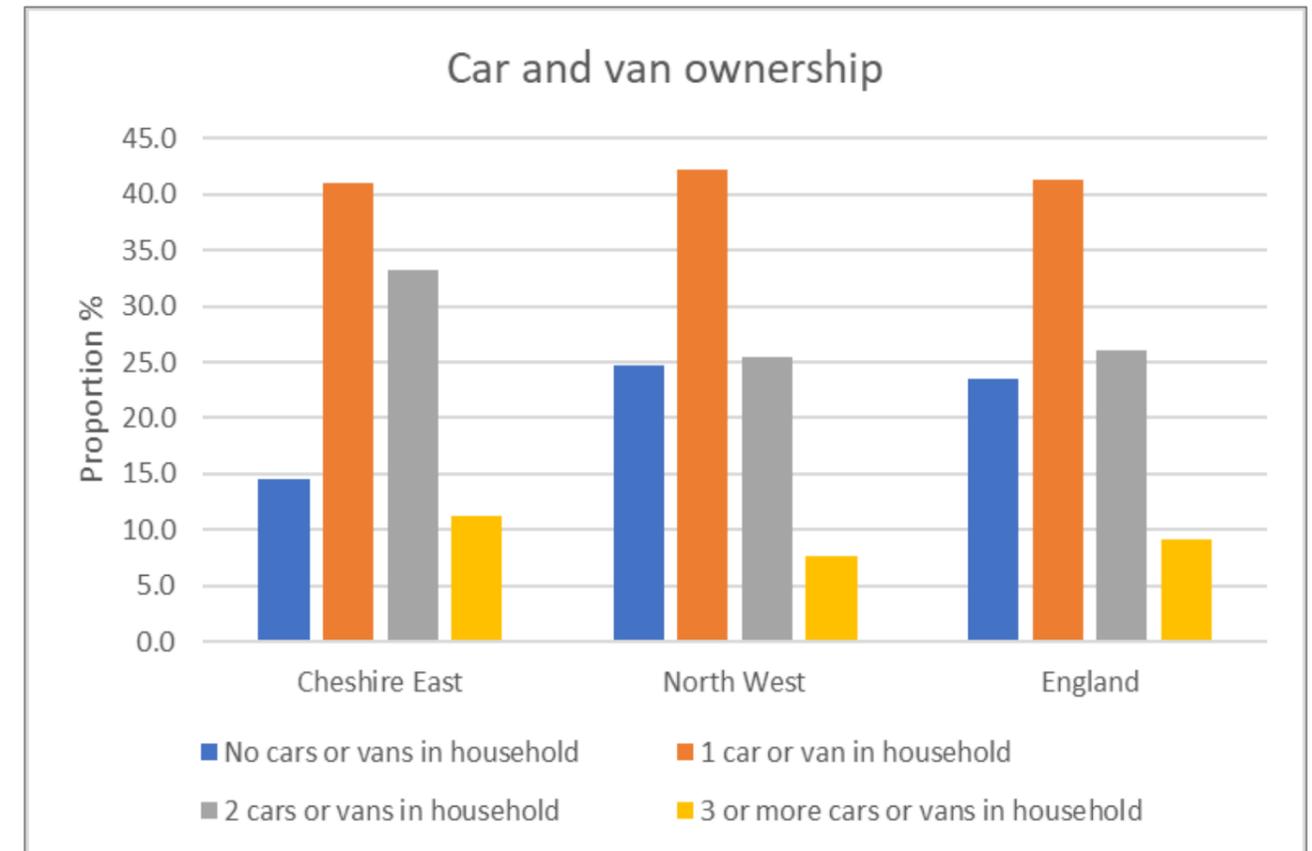


Figure 4-72: Car Ownership Per Household in Cheshire East, North West and England, 2021

Figure 4-73 shows the number of households that do not own a car or van for the year 2021, low ownership is particularly concentrated around Crewe and Macclesfield, within some areas of Crewe and Macclesfield, the percentage of households not having access to a car is as high as 56% in Crewe. Particularly in Crewe and Macclesfield, as outlined in Chapter 2 and shown in Figure 3-11 deprivation levels are significantly higher than the rest of the region. Higher deprivation levels may result in lower car ownership as less people can afford to own a car or van, therefore people in these areas may be forced to take jobs nearby that do not require travelling by car. There also may be more access to alternative modes of travel (public transport) in these more built-up areas with better infrastructure which may deter people from owning a car as it is not required.

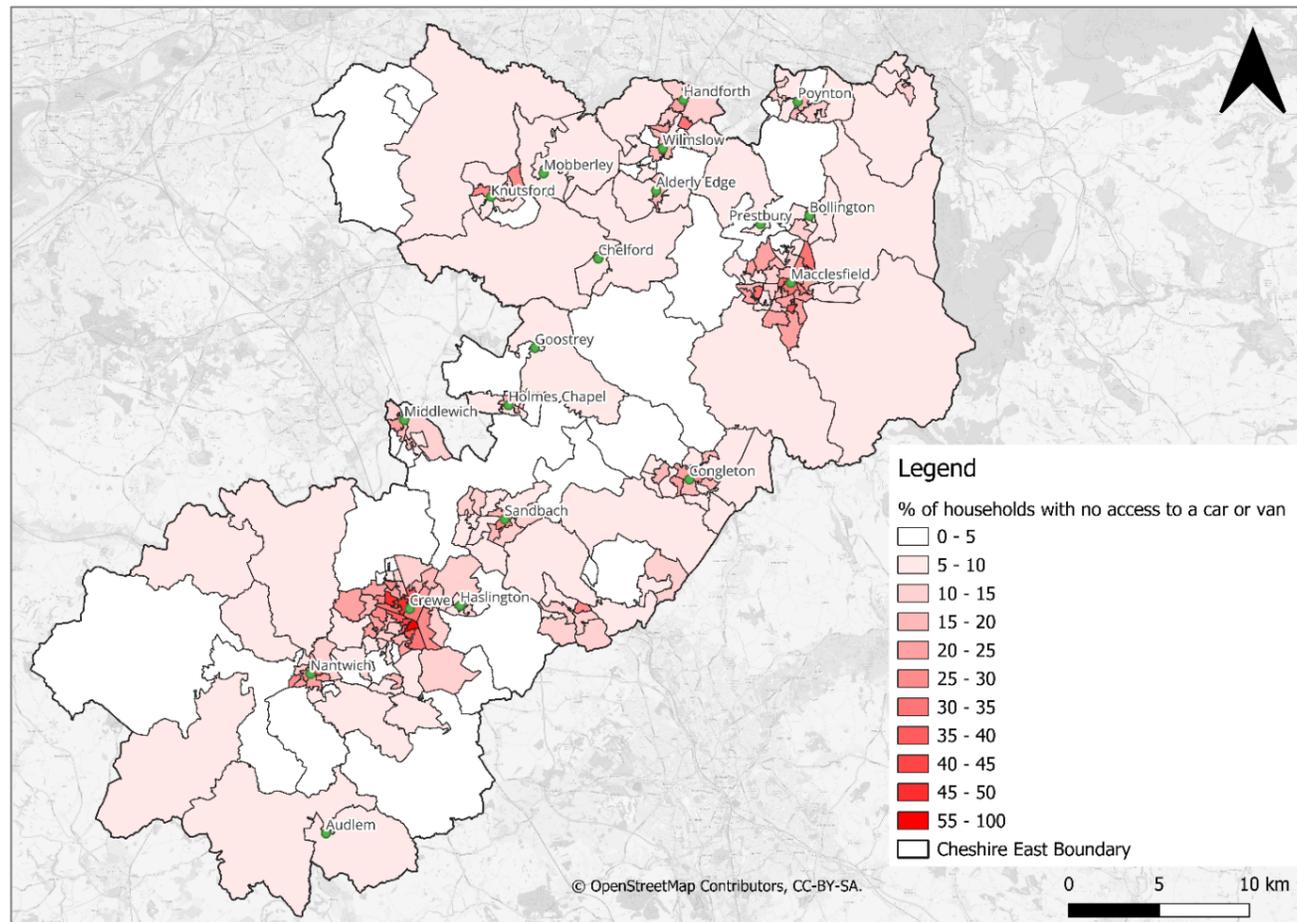


Figure 4-73: Percentage of Households with No Access to A Car or Van, Census 2021

4.6.9 Travel to work by car

Table 4-21 below show the number of people driving to work and the proportion of households with access to no cars or vans and 1 or more cars or vans for each year. The census data for both 2011 and 2021 is shown separately.

Table 4-21: Method of Travel to Work, 2011 And 2021

Method of travel to work	Total	Proportion of method of travel to work (%)	Proportion of households with no car or van (%)	Proportion of households with 1 or more cars or vans (%)
2011				
All methods	181,136	100		

Method of travel to work	Total	Proportion of method of travel to work (%)	Proportion of households with no car or van (%)	Proportion of households with 1 or more cars or vans (%)
Driving or passenger of a car or van	133,285	74	16	84
2021				
All methods	192,487	100	10	90
Driving or passenger of a car or van	100,896	52		

Table 4-21 shows that in 2011, 74% of the population were driving or a passenger of a car or van to work. It also shows that for 2021, 22% less of the population of Cheshire East were driving or a passenger of a car or van compared to 2011. This is a relatively significant change in behaviour and is linked to the pandemic that affected where people were working from, as more people were working from home. The proportion of households with or without cars has also changed in the 10-year period with 6% more households owning at least 1 car or van.

Figure 4-74 shows the average number of commuter trips in Cheshire East by car for the years 2017 to 2021, it is derived from National Travel Survey Data and provides more recent travel to work data trends¹⁰¹. The National Travel Survey is based on a household survey to monitor trends in personal travel.

¹⁰¹ Derived NTS Data is licensed under the Open Government Licence v3.0 (<https://www.nationalarchives.gov.uk/doc/open-government-licence/version/3/>), noting the following attribution statement for any use of this data: Department for Transport. (2022). National Travel Survey, 2002-2021: Special Licence Access. [data collection]. 11th Edition. UK Data Service. SN: 7553, DOI: <http://doi.org/10.5255/UKDA-SN-7553-11>

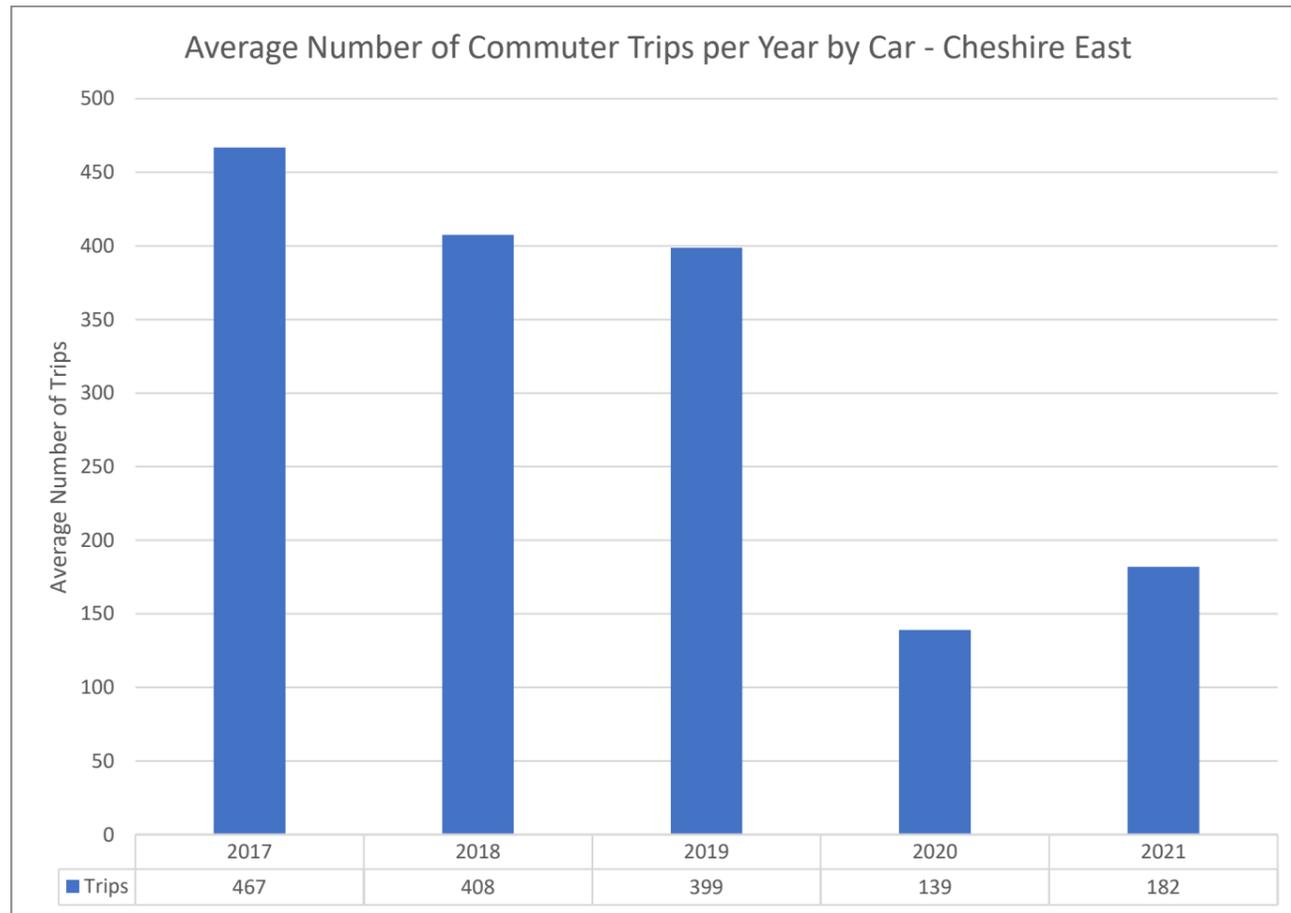


Figure 4-74: Average Number of Commuter Trips by Car, NTS 2017-2021

Figure 4-74 shows that between 2017 and 2019 the average number of commuting trips by car reduced by approximately 70. In 2020 the average number of commuting trips by car reduced significantly, falling by 260 trips compared to 2019. In 2021 the number of commuting trips by car has increased, however this was a relatively insignificant increase and the average number of commuter trips by car is still below pre-pandemic levels by approximately 220 trips. This may be due to a change in commuter and work location habits which were caused by the pandemic.

The figures below highlight the percentage of people travelling to work by car, either as a passenger or driving, across Cheshire East in 2011 and 2021¹⁰². Both census years data has been included as 2021 was affected by the pandemic. It must be noted that the 2011 Census data is dated, however the 2021 Census data is influenced by the prevalence of at home working due to the pandemic. Therefore, both datasets are less reflective of the current situation or predictive of future trends.

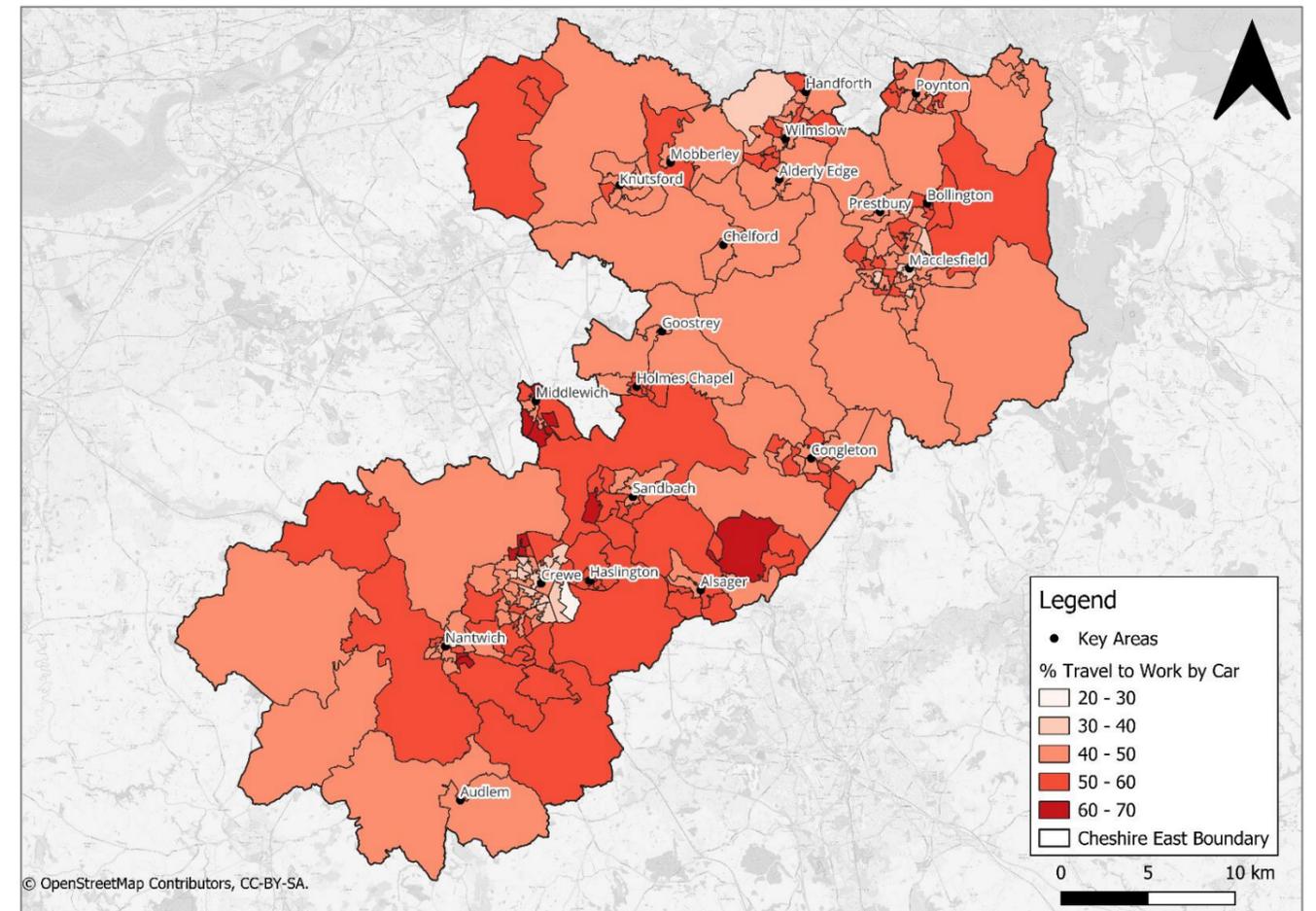


Figure 4-75: Percentage of People Travelling to Work by Car, 2011

Figure 4-75 shows that away from principal towns the percentage of people driving to work is very high, it is within the LSOAs towards the centre of areas such as Crewe and Macclesfield where the percentage of people driving to work is lower. Even within areas such as Handforth and Wilmslow, driving to work is still high. Throughout Cheshire East in 2011 it is evident that driving is a well-used method of travelling to work and is only less in demand closer to the principal towns of the region.

¹⁰² [nomis Method used to travel to work](#)

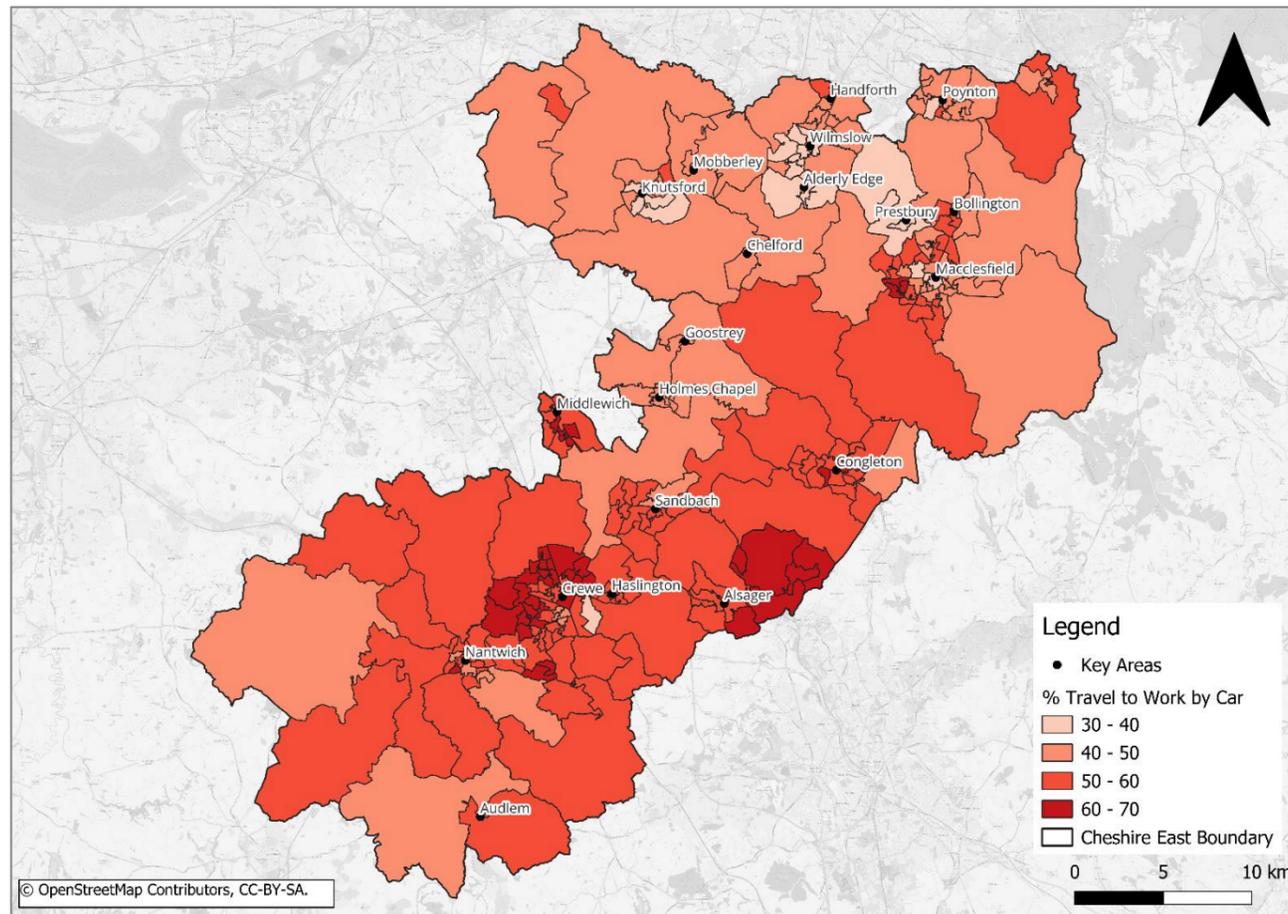


Figure 4-76: Percentage of People Travelling to Work by Car, 2021

Figure 4-76 shows that the proportion of people travelling to work by car in 2021 is relatively similar to the proportion in 2011. It is clear to see that there are more LSOAs where driving to work is lower. Particularly in the north of the region around Knutsford, Alderley Edge, Wilmslow and Poynton, the proportion of people travelling to work by car is lower than areas to the south and east of the region where driving to work is still relatively high. Areas southeast of Sandbach and west of Nantwich also experience lower levels of driving to work.

However, the number of people driving to work in areas such as Crewe and Macclesfield seem to be proportionally higher than 2011 levels. There is less correlation between car ownership and driving to work shown in the 2021 map. Areas such as Crewe, Macclesfield and the east of the borough which have lower car ownership are areas that experienced higher percentages of people travelling to work by car. As shown in Section 4.3.2, Crewe and Macclesfield are better connected to public transport as there are more bus routes and stops in the key towns of Crewe and Macclesfield, therefore reliance on cars may be lower. There are also more NCN routes in the south of Cheshire East and a route through Macclesfield which improves cycle access and may reduce the number of people driving to work as they use the quality cycle routes. However cycling and public transport usage is still quite low in these areas, therefore it may be a case of more people in these areas having jobs that require them to travel by car whilst others in lower proportion areas do not need to travel and can work from home.

4.6.10 Highway asset management

CEC are responsible for most of the roads and footpaths in Cheshire East, the Cheshire East Highway Asset Management Strategy¹⁰³ details that this includes 2,707 km of carriageways, 2,204 km of footways and cycleways and 5.8 million square metres of grass verge. In total there are 2,707km of carriageway length in the borough. This can be broken down to:

- A roads – 414km;
- B roads – 152km;
- C roads – 564km; and
- Unclassified Roads – 1,577km.

Cheshire East Council carries out an annual carriageway survey of the network in order to monitor the current condition of the network and assist with the development of annual programmes and lifecycle planning. Below indicates the current percentage of roads network where maintenance should be considered over the next 12 months:

- A roads = 3%;
- B and C roads = 5%; and
- Unclassified roads = 11%.

The council's highway asset also includes over 112 traffic signal junctions and 152 pedestrian crossings, over 100,000 gullies, 60 km of safety fencing and more than 400,000 streetlights. The council calculated the asset value, in accordance with the whole of Government accounts requirements, as having a gross replacement cost of over £6 billion.

The Council takes a systematic 'asset management' approach to looking after this network. This means making long-term plans and finding the most cost-effective ways of making sure the network continues to meet the needs of road users and residents. To do this CEC consider the following:

- Customer needs;
- Local priorities;
- Road condition;
- Environmental issues;
- Risk management; and
- Money available.

The code of practice "Well Managed Highway Infrastructure" provides guidance to councils on managing and maintaining their local roads. CEC follow this guidance as best practice to deliver an efficient and effective service. In 2020 the council adopted specific recommendations related to Highway Safety Inspections, Winter Service and The Resilient Network. The council developed a network hierarchy¹⁰⁴, this forms the basis of the council's approach to highway safety inspections and winter service. The hierarchy prioritises areas of network by importance. Examples of this include 'their expected use, resilience and economic and social factors including industry, schools, hospitals.' From this prioritisation, roads are split into the following categories:

¹⁰³ Highway Asset Management Strategy

¹⁰⁴ Well managed highway infrastructure

- Resilient network
- Strategic network
- Main distributor
- Secondary distributor
- Link roads
- Local access roads

Enhancing and maintaining the council's existing highway asset is crucial, as it represents a significant portion of the council's responsibilities and an asset which is subject to constant use and degradation. This necessitates a sustained investment programme to rehabilitate the network and prevent further deterioration. Since the condition of this asset affects not only cars but also buses and cyclists for example, securing investment to address these maintenance needs is essential. In relation to road repairs and improvements, the council takes a scored approach to prioritising which roads require improvements first and locating where works are most needed. The scoring is informed by condition, customer reports and engineering knowledge. A list and map of the works programmed for 2023-2024 can be found on the Cheshire East Website¹⁰⁵. For day-to-day maintenance of the highways the budget for the 2023-2024 financial year is £10.6 million and for road network improvements the budget is £21.35 million. As the council only has a limited budget it is unlikely that all road improvement works will be completed within the year's programme of works, however all repairs and improvements are likely to be included within the longer-term plan.

In terms of road repairs, according to the Infrastructure and Highways Services: 2023/24 Mid-Year Review¹⁰⁶ published on 25 January 2024, 12,252 surfacing defects have been repaired to the end of October 2023 (Quarter 2), this is 3,064 more repairs than stated in the mid-year review for 2022/23. The report describes how this is expected to rise in Quarters 3 and 4 due to cold and wet weather. The report also mentions how the council is seeing an increasing number of urgent defects (potholes) across the network where safety repairs are required. This is explained to be due to previous real and actual terms reductions in government funding and there being more expected frequent adverse weather and higher rainfall in the second half of the financial year.

Table 4-22 below shows the condition of the CEC maintained roads broken down by carriageway over the last three years. It shows the percentage of each road type within the category. Each 10-metre road section has been assigned a condition category based on the Road Condition Indicator (RCI) value. The thresholds used to determine the categories of condition are as follows:

- **Green** - 0 to less than 40 - good condition - no further investigation or work is likely needed at this time.
- **Amber** - 40 to less than 100 - likely to be some deterioration – work may be needed sometime in the future.
- **Red** - 100 or more - likely to be in poor condition – further investigation may be required to determine whether this section of road should be considered for maintenance. The local authority will decide whether any intervention is made.

Table 4-22: Highway asset carriageway breakdown over the last 3 years

	2021/22		2022/23		2023/2024		Average Red	Average Amber
	Red	Amber	Red	Amber	Red	Amber		
A Roads	2.7	24.8	3.6	25.9	3.4	27	3	26
B Roads	3.4	24.7	4.3	26.5	4.2	27.4	4	26
C Roads	5	29.2	4.7	28.1	5.6	31.5	5	30

As shown in Table 4-22, over the last three years, the number of roads with a red condition score have predominately stayed consistent. However, the amber scoring roads have increased year on year. Amber roads will eventually move over to red, if not treated appropriately with the right investment.

Table 4-23 shows the percentage of Type 1 and 2 Footways in Cheshire East that have scored within the red category over the last 3 years.

Table 4-23: Percentage of Red category footways over the last 3 years

	2021/22	2022/23	2023/2024	Average Red
	Red	Red	Red	
Type 1 & 2 Footways	32%	33%	33%	33

The table shows that there has been an increase of footways needing maintenance within the next 12 months on Cheshire East's high usage footways by 1%.

4.6.11 Recent Road and Highway Investments

The tables below highlight the recent and upcoming major road and transport investments in Cheshire East¹⁰⁷. For the constructed schemes that have been completed, it is important to monitor them and evaluate the impacts of these interventions to understand if they have been successful or not. They will also require maintaining.

Table 4-24: Constructed major road and transport projects

Major road and transport projects	Status – complete
A6 to Manchester Airport Relief Road	10 km road from the A6 to Manchester Airport now open to traffic.
Congleton link Road	Opened to traffic on 16 April 2021.

¹⁰⁵ [Cheshire East Programmed Works 2023-2024](#)

¹⁰⁶ [Infrastructure and Highways Services: 2023-2024 Mid-Year Review](#)

¹⁰⁷ [Major road and transport projects](#)

Major road and transport projects	Status – complete
Poynton Relief Road	Connecting into the A523 London Road and the A6, Poynton Relief Road is an approximately 3 km single carriageway with a 3.5-metre-wide cycle and footway. It has been designed to take heavy traffic out of Poynton Village and was opened to traffic on Monday 6 th March 2023.
North West Crewe Package (NWCP)	A series of highways and junction improvements around the Leighton area to ease congestion and improve access to Leighton Hospital. This scheme was officially opened to the public on Wednesday 10 July 2024.

For the Congleton Link Road, a '1 Year After Report' was published in January 2024¹⁰⁸, the report summarises that all the key objectives have been achieved to some extent. Most routes in Congleton town Centre have seen a reduction in flow since the scheme opened, and there has been a reduction in the number of HGVs on most of the routes around Congleton town centre. Noise levels within Congleton town centre have also likely reduced and Air Quality has been improved particularly around the town centre.

For the A6 to Manchester Airport Relief Road a '1 Year After Report' was published in March 2022, the report summarises that the scheme was delivering on all three of its objectives. As it is improving business integration and productivity, making a positive contribution to reducing the impact of traffic congestion on local businesses and communities and is contributing to the increasing of road safety particularly for walking and cycling.

Post-scheme monitoring is ongoing for the Poynton Relief Road scheme; however, the monitoring reports have not been published at time of writing.

Table 4-25: Major Road and transport projects in construction

Major road and transport projects	Status – in construction
Middlewich Eastern Bypass	A new two-way single carriageway road will connect a new roundabout junction off Pochin Way to the north, to a new roundabout to the south connecting with the A533 Booth Lane. The target date for the main works to start is Spring 2025, subject to final funding approval.

Table 4-26: Major Road and transport projects in development

Major road and transport projects	Status – in development
A500 Multi Modal Corridor Scheme	A package of measures, including highway pinch point improvements and accessibility improvements to the A500 corridor and Crewe Railway Station.

In addition, given that CEC is an authority with a very high level of private developments, it is essential that newly constructed highway that is presented for adoption under s38 HA1980 is built to appropriate standards, with appropriate materials and supported by financial commitments from developers.

4.6.12 Strategic Roads User Survey

The Strategic Roads User Survey August 2022 to July 2023¹⁰⁹ looks at the views of around 8,000 users of the motorways and major 'A' roads managed by National Highways. The survey is the responsibility of Transport Focus, and it covers the seven regions under National Highways control. Transport Focus is an 'independent watchdog for transport users', they aim to 'get the best deal for passengers and road users.'¹¹⁰ Whilst it does not cover Cheshire East specifically, the North West is surveyed and can provide an indication of the satisfaction of Cheshire East motorways and major 'A' roads. The table below provides the North West's satisfaction scores and England's satisfaction scores for comparison.

Table 4-27: SRUS scores for North West and England

Satisfaction factors	North West	England
Journey Time	71%	70%
Roadworks management	46%	47%
Feeling Safe	81%	82%
Overall	71%	71%

This table shows that in the North West 71% of journeys on the SRN are satisfactory, this matches the national satisfaction which is the overall theme of the North-West's results. There is very little difference between the North-West's satisfaction levels and the nation as a whole, apart from 1% less satisfaction in roadworks management and feeling safe on the SRN.

¹⁰⁸ [Congleton Link Road Monitoring and Evaluation 1 Year After Report](#)

¹⁰⁹ [Strategic Road User Survey - North West findings](#)

¹¹⁰ [Transport Focus](#)

4.6.13 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below:

Section	Key findings	Implications for the LTP
4.6.1/4.6.2/4.6.4	<p>The pandemic caused a significant decrease in traffic flows (28.6% decrease in all vehicle flows), this was particularly evident on the major roads in Cheshire East. Minor roads flows did decrease however not as significantly. In 2022 vehicle flows surpassed pre-pandemic levels.</p> <p>Currently cars and taxis make up the predominant share of vehicles on the Cheshire East road network, during the pandemic in 2020 this share dropped and the proportion of LGVs and HGVs increased as less people were going places whilst deliveries and shipments were still being made.</p>	<p>The return to car dependency and increased traffic levels since the pandemic puts additional stress on the road network with a lack of alternative options to promote sustainable travel.</p> <p>It will be important to reduce the proportion of cars and taxis on the roads and increase the proportion of cycles and other sustainable forms of transport.</p>
4.6.7	<p>Most of the fatal and serious collisions over the last 5 years (2018-2022) have occurred on A-Roads in Cheshire East. The reduction in collisions in 2020 correlates with the reduction in vehicle travel. However, since the pandemic collision numbers have returned to pre-pandemic 2019 levels. Although the composition of these has changed as fatal collision numbers have steadily fallen over the 5-year period, serious collisions were highest in 2022 and slight collisions have returned to pre-pandemic levels.</p>	<p>It is important to improve road safety in Cheshire East and reduce the number of collisions that occur. Reducing the number of collisions will reduce the loss of life and serious injuries which are the cause of personal loss for people and families. It will also provide welfare savings, improve perceptions of safety and contribute to a more reliable road network.</p>
4.6.8	<p>Cheshire East has a significantly higher proportion of households owning 2 or more cars than the North West and England. Crewe and Macclesfield are the two main areas where the proportion of households with no access to car or van is high relative to the rest of Cheshire East.</p> <p>The proportion of households without access to a car or van in Cheshire East is lower than the North West and England and the proportion of households owning 2 cars or vans and 3 or more cars or vans is significantly higher than the North West and England. Low ownership is particularly concentrated around Crewe and Macclesfield.</p>	<p>Outside of Crewe and Macclesfield active travel and public transport facilities and infrastructure need to be significantly improved so that active travel and public transport is a more attractive alternative to the car. If the areas in Cheshire East with high car ownership have a better alternative to the car in the form of public transport or active travel, then the reliance on cars and car ownership may reduce.</p> <p>Within Crewe and Macclesfield, it is important to sustain and improve the active travel and public transport infrastructure so that it is safe and aligns to the latest design requirements where possible, such as LTN 01/20. This will improve accessibility to services, education and job opportunities across these towns. Crewe and Macclesfield's lower car ownership may also be linked to their urban characteristics and high deprivation, as a result there is scope for more investment in active travel infrastructure in these areas. Public transport and active travel facilities and infrastructure must be prioritised in areas with low car ownership to reduce accessibility inequalities. It is also important to provide an attractive alternative to car travel across the borough so that car ownership is required less.</p>
4.6.9	<p>Travel to work follows the same trend as car ownership as most areas outside of Crewe and Macclesfield have a high proportion of people travelling to work by car, this is particularly true for 2011. In 2021 travelling to work by car is lower everywhere, however it does not seem to change as significantly in Crewe and Macclesfield.</p> <p>In 2021, compared to 2011 the proportion of people travelling to work by car reduced by 22%, this is likely linked to the change in work location patterns with more people working from home due to the pandemic. In 2021 driving to work is low in the north of the region around Knutsford, Alderley Edge, Wilmslow and Poynton. Compared to 2021, areas such as Crewe, Macclesfield and the east of the borough which have lower car ownership are areas that experienced higher percentages of people travelling to work by car.</p>	<p>With there being a 'new normal' post-pandemic, it is likely that less people are travelling to work as often, therefore the number of car journeys to travel to work is lower.</p> <p>With patterns of commuting changing, and the demand for car travel to work decreasing, Cheshire East must provide an attractive alternative to car travel in the form of public transport or active travel that can shift individuals away from car travel. This is particularly important in Crewe and Macclesfield to reduce the relatively higher proportion of individuals driving to work.</p>
4.6.10	<p>The annual survey indicates that 3% of A roads, 5% of B and C roads, and 11% of unclassified roads require maintenance within the next 12 months. The number of roads with a red condition score have predominately stayed consistent. However, the amber scoring roads (some deterioration) have increased year on year.</p>	<p>Maintaining and enhancing the council's highway assets is vital, as they represent a significant part of the council's responsibilities and are continuously used and subject to wear. Given that the condition of these assets impacts not only cars but also buses and cyclists, securing investment to address maintenance needs is essential. It is important that the council make long-term plans to find cost-effective ways of making sure the network continues to meet the needs of road users.</p>
4.6.11	<p>In relation to the recently opened (16 April 2021) Congleton link Road, post-scheme monitoring reports that all the key objectives have been achieved to some extent with flow and the number of HGVs reducing on routes</p>	<p>There has been some success with recently opened schemes in Cheshire East therefore it is important to carry on this success and learn from what went well within these schemes to take forward.</p>

Section	Key findings	Implications for the LTP
	in the town centre. Noise pollution and air quality have also likely seen improvements. Poynton Relief Road is currently being monitored, however the reports have not yet been published.	

4.7 Parking

CEC is responsible for the operation, management and civil enforcement of on street and off-street parking regulations across Cheshire East. On-street responsibilities include limited waiting bays, loading bays, waiting restrictions, residents parking schemes and Blue Badge (disabled driver) schemes. Off-street responsibilities cover 111 Council-operated public car parks. Figure 4-77 presents the distribution of off-street car parks across the borough.

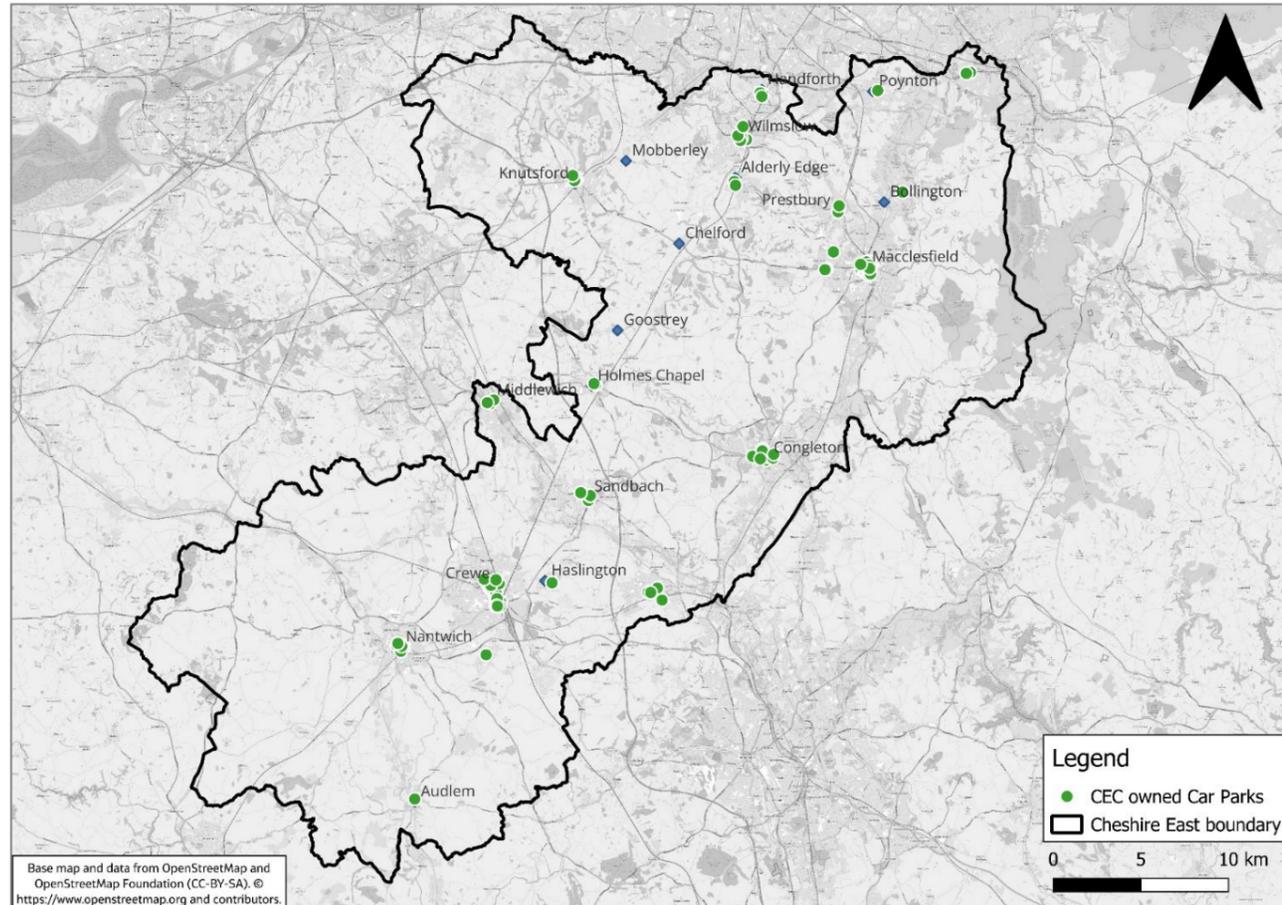


Figure 4-77: Cheshire East Council operated public car parks

In January 2024, the council's highways and transport committee approved a set of proposals¹¹¹ to introduce parking charges in the majority of remaining free car parks in Cheshire East. This followed a statutory consultation period where a parking strategy report for each town and village was published¹¹². The proposals are due to be implemented from 01 December 2024.

4.7.1 Overview

Each year, CEC publishes its Annual PATROL (Parking and Traffic Regulations Outside of London) Report¹¹³. This includes information on the parking services' income and expenditure, as well as educational material such as how to read a tariff plate or sign. The council uses this as an opportunity to showcase in a transparent way how the service operates, its purpose and to dispel some myths.

4.7.1.1 Car Parks

The total number of spaces (and blue badge spaces) by town/ village is presented in Figure 4-78 and further details for each car park are available on the website. This shows that the principal towns (Crewe and Macclesfield) have the most parking spaces. The only other town with over 1,000 spaces is Wilmslow.

Figure 4-78 shows that there are blue badge spaces in the majority of towns and villages in Cheshire East. The only places without blue badge holder spaces are Haslington, Poynton and Shavington. In Haslington and Shavington, there is only one car park in each place with approximately 8-10 spaces, which are primarily used by residents. In Poynton, the council only operate approximately one third of the spaces on Civic Hall car park. There are three blue badge spaces serving Waitrose and four blue badge spaces serving the medical centre and library in the section of the car park that is not Council-operated.

On all Council-operated car parks, blue badge holders can park for free and there is no limit on how long they can park for in one session, as long as they are correctly displaying their blue badge. Blue badge holders are also permitted to park on double yellow lines or in limited waiting bays for up to three hours - [The Blue Badge scheme: rights and responsibilities in England - GOV.UK](#)

¹¹¹ Highways and Transport Committee – Thursday 25th January 2024, 10.30am Agenda and Minutes, CEC (2024). URL: <https://moderngov.Cheshireeast.gov.uk/ecMinutes/ieListDocuments.aspx?Cid=961&Mid=9854&Ver=4>. Last accessed 07/03/2024.

¹¹² Town parking strategy reports – supporting documents, CEC (2023). URL: https://www.Cheshireeast.gov.uk/car-parks-and-parking/reviews_and_consultations/town-parking-strategy-reports-supporting-documents.aspx. Last accessed 07/03/2024.

¹¹³ Cheshire East 2021/22 Annual Report on Parking Services (PATROL UK, 2023). URL: https://www.patrol-uk.info/annual_reports/Cheshire%20East/CEC-Parking-Services-Annual-Report-21-22-160223.pdf. Last accessed 08/03/2024.

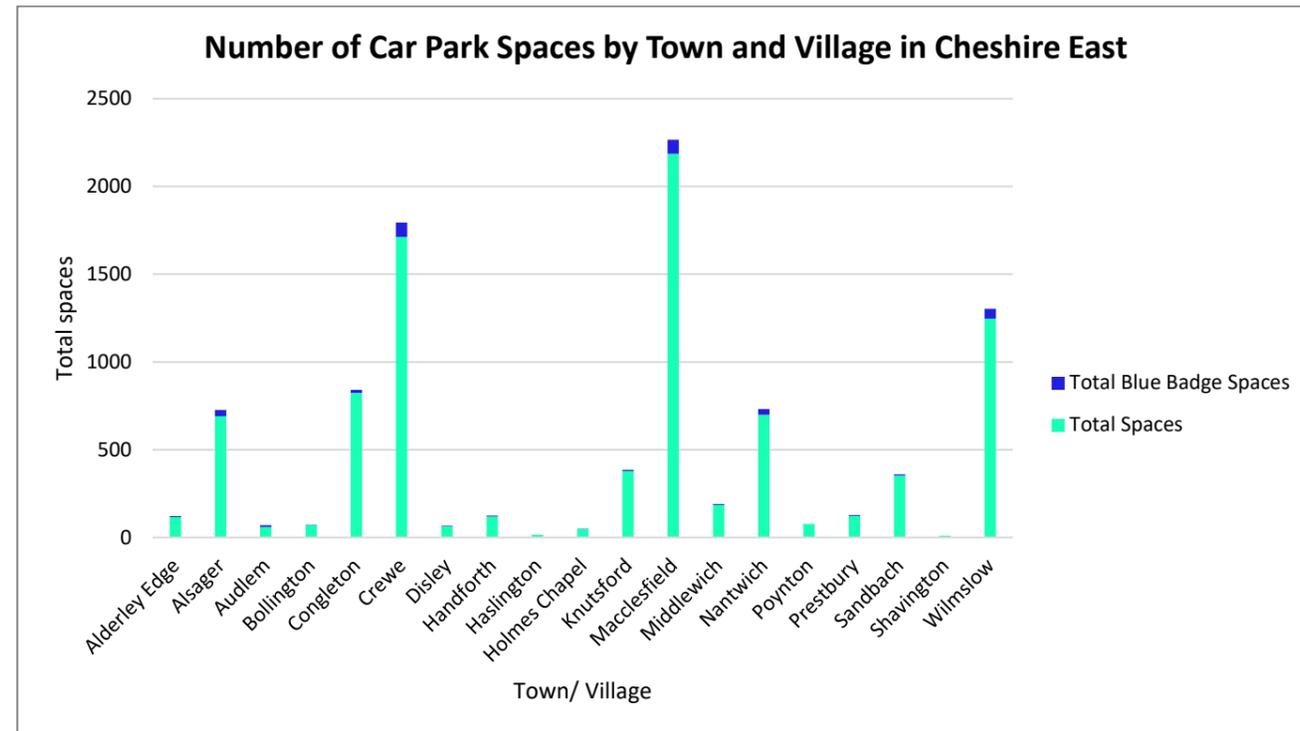


Figure 4-78: Total parking and blue badge holder spaces by town and village

4.7.1.2 On-Street Parking Places

The council's on-street responsibilities include limited waiting bays, loading bays, waiting restrictions, residents parking schemes and Blue Badge (disabled driver) schemes. The Traffic Regulation Orders that enable the council to enforce these restrictions are provided on Cheshire East's TraffWeb GIS mapping¹¹⁴.

It is not possible for the parking service to monitor compliance with all on-street restrictions simultaneously. Therefore, to prioritise enforcement, the parking service reviews where Penalty Charge Notices (PCNs) are issued on a regular basis, which shows the areas where compliance with parking regulations is lowest. The service aims to improve compliance in these areas through greater education and enforcement.

4.7.1.3 Safer Parking Around Schools

The service also patrols streets close to schools on a daily basis during the pickup and drop off periods as part of the 'safer parking around schools' initiative. The Civil Enforcement Officers visit schools on rotation and aim to educate drivers on safe places to park to improve safety for parents, school children and staff. This includes:

- Ensuring that vehicles are not parked on the yellow zigzag lines with 'School Keep Clear' markings;
- Using boards depicting children ('little people') as a visual aid to deter drivers from parking inappropriately;
- Presenting at school assemblies to children about safer parking with the aim of children educating and asking parents to park safely when dropping off or picking them up from school;

- Developing activity booklets for children that educate them about safer parking in a more interactive and visual way; and
- From February 2025, it is anticipated that CCTV cameras will be used to capture contraventions on zig zag lines.

4.7.2 Usage

Parking strategy reports for all towns and villages produced during Spring/ Summer 2023 presented the utilisation of each car park (see footnote 112 on page 96). For towns and villages that already had parking charges, ticket sales data for the 2022 calendar year was used to generate a utilisation profile for each car park. For free car parks, a combination of ANPR surveys and Civil Enforcement Officer beat surveys were conducted for a one-week period in 2023 to generate a utilisation profile. Further details are provided in each town parking strategy report.

Prior to parking charges being rolled out more extensively from 02 December 2024, only seven of the 19 towns and villages in Cheshire East that had Council-operated car parks charged for parking. These were: Alderley Edge, Congleton, Crewe, Knutsford, Macclesfield, Nantwich and Wilmslow. The utilisation figures within the parking strategy reports for each town and village are based on pre-October 2024 conditions, when more parking was free. This should be considered when reviewing the supporting reports.

The baseline data used to underpin the parking strategy reports showed that Crewe and Macclesfield had the most under-utilised car parks. This is a result of the number of car parks across these towns where there is a significant over-supply of car parking (25 car parks and 22 car parks respectively). The towns and villages that had the most utilised car parks were Alderley Edge, Alsager, Audlem, Bollington, Handforth, Holmes Chapel, Nantwich, Poynton and Sandbach. In the majority of cases, the most utilised parking was in towns and villages where there is a small number of car parks. This shows a need to manage the demand and encourage turnover of spaces to ensure there is sufficient parking supply to support town and village economies.

The changes to utilisation over the first year following the introduction of, and changes to existing, parking charges will be monitored across all towns and villages. This will be compared with changes in trips made by other modes of transport to understand if the proposals have improved rail or bus patronage or increased the number of trips made by walking and cycling.

4.7.3 Parking Charges

The tariffs that were implemented are available on the website. Charges in towns which currently charge are due to be increased before October. Charges in towns which were free came in on 2nd December. Though not all will come into effect on that date, some will be phased through October. The table also highlights the car parks that will be free after 3pm. All charges will be operational between 8am and 6pm, Monday to Saturday, with the exception of the following car parks:

- Fairview, Alsager;
- Springfields, Prestbury; and
- Westfields, Sandbach.

These car parks will start charging at 9am to accommodate the morning school run. During school holidays, and on Saturday and Bank Holidays, parking charges at these car parks will start at 8am. Throughout the year, these car parks would cease charging at 6pm. These car parks are also proposed as free after 3pm car parks to mitigate issues associated with the afternoon school run.

¹¹⁴ Cheshire East Traffic Orders, CEC (2024). URL: <https://Cheshireeast.traffweb.app/traffweb/1/TrafficOrders>. Last accessed 08/03/2024.

As part of the proposals, three consolidated tariff bands were put forward (see Table 4-28), which were proposed for each car park depending on their proximity to key services, which are most often in the centre of towns and villages. This means that car parks located further away from key services will be cheaper than more central and conveniently located car parks. The purpose of this approach is to:

- Encourage more parking in peripheral car parking sites, with the aim of increasing walking activity and decreasing the number of miles that vehicles drive;
- Encourage modal shift by make public transport more competitive and attractive when compared to private vehicles; and
- Decrease the number of vehicles in the town and village centres, to:
 - Provide a safer environment for non-motorised users;
 - Provide more pleasant places to dwell and shop;
 - Improve noise and air pollution;
 - Potentially facilitate more regeneration opportunities and improvements to the public realm (council or private sector led).

The consolidated tariff bands mean that charges can be applied more fairly to each town and village, considering their unique characteristics and the level of service provision in each place.

Table 4-28: Consolidated tariff bands

Tariff Band	0-0.5 hours	0-1 hour	1-2 hours	2-3 hours	3-4 hours	4-6 hours	6-10 hours	Quarter Permit	Annual Permit
Lower	£0.30	£0.60	£1.00	£1.50	£2.10	£3.00	£3.40	£163.00	£490.00
Middle	£0.40	£0.80	£1.40	£2.00	£2.70	£3.70	£4.30	£195.00	£620.00
Higher	£0.50	£1.00	£1.60	£2.30	£3.30	£4.40	£5.20	£228.00	£750.00

4.7.3.1 Transition to Cashless Payments

As part of the Highways and Transport Committee decision to roll out parking charges to the majority of free car parks, there was also a resolution to transition towards cashless payments. This was to reflect that society was generally moving towards cashless payments and also provided the opportunity for the council to make savings related to cash collection. As part of the resolution, at least one car park in each town or parish must retain cash payments.

The Department for Transport (DfT) is currently developing a service called the National Parking Platform¹¹⁵. The vision is to provide a single mobile payment solution for the user, which can be used in most local authority areas in the UK. This would improve the user experience as they would not require an app for each provider. Additionally, the National Parking Platform is aiming to provide real time availability on parking spaces and access to more reliable and detailed parking information.

The council monitored the impact of transitioning towards cashless payments and the developments made on the National Parking Platform and became an associate member in January 2024.

4.7.3.2 Sunday and Late Evening Charges Consultation

The council ran a statutory public consultation between 28 August 2024 and 9 October 2024 on proposals to introduce parking charges at all charged car parks on Sundays and during the evening. If implemented, it would mean parking charges would be enforced between 8am and 10pm, Monday to Sunday.

4.7.4 Permits

The council issues several types of permits, which are shown in Table 4-29 alongside a description and the total permits issued for the 2023/2024 financial year.

Table 4-29: Number of permits issued by type

Permit Type	Description	Total Issued in 2023/24 Financial Year
Staff Permits	Issued to council staff to enable them to carry out their duties	1,375
Annual Contract Permits	Issued for a vehicle to park in a specified car park for the financial year	271
Quarter Contract Permits	Issued for a vehicle to park in a specified car park for a three month period	97
Resident On-Street Permits	Available for residents living in an eligible property within a resident permit zone. Eligible properties are defined as those with only one private off-street parking space or no off-street parking spaces	452
Resident Off-Street Permits	Available for residents living in properties without private off-street parking in Knutsford, Macclesfield and Nantwich only	195
Business Permits	Issued to businesses in a residents' permit zone that need to park essential business vehicles and/ or where customers need to park near to the business.	21
Carer Permits	Residents who require at-home care on a temporary or permanent basis. This permit is free of charge.	8
Total		2,419

4.7.4.1 Revised Permit Scheme

Since the pandemic, the number of permits issued to members of the public or businesses has been falling. The main contributing factors are:

- Increased home working (i.e. a reduction in the number of people working in town and village centres five days per week);
- Cost of permits; and
- Permits not guaranteeing a space within the specified car park.

As part of implementing the wider parking charges, the council revised the existing scheme for contract permits. Under the revised scheme, users can purchase a quarter or annual permit at the lower, middle or higher tariff rate (see Table 4-28). As a result, the following scenarios would have occurred:

¹¹⁵ National parking platform, DfT (2021). URL: <https://www.gov.uk/service-standard-reports/national-parking-platform>. Last accessed 08/03/2024.

- A user who purchases a contract permit at the higher tariff rate is able to park in any council-operated car park in Cheshire East;
- A user who purchases a contract permit at the middle tariff rate will be able to park in any council-operated car park in the middle or lower tariff band in Cheshire East; and
- A user who purchases a contract permit at the lower tariff rate will be able to park in any council-operated car park on the lower tariff band only in Cheshire East.

The purpose of the revised scheme is to make permits more attractive and to overcome the existing issue of not being able to find a space within the specified car park.

4.7.4.2 Staff and Member Permits

As shown in Table 4-29, over half of the permits issued by the parking service were for council staff. There are also approximately 80 permits issued per year for council members.

The council has a target to be net zero in its operations by 2027 and to deliver a net zero borough by 2045. The council is currently undertaking a review of staff and member parking permits to develop an approach that better aligns with the Corporate Travel Plan, encourages travel by more active and sustainable modes of transport and reduces costs to the council. The development of a new approach to the provision of staff and member permits will be integrated into an updated Travel Plan, which will reflect imminent changes to the use of the corporate office estate. At all times, parking permits will be considered with reference to the needs to deliver services to clients whilst minimising costs and improving the sustainability of operations.

4.7.4.3 Digital Permits

Currently, the majority of permits are issued in paper form, which is time consuming and more costly (e.g. costs associated with postage, printing etc). As part of a wider modernisation of the parking service, there is an ambition to transition to digital permitting. This will make the application, monitoring and issuing processes more efficient, improve the user experience and represent better value for money. With a new back office system, this will be implemented in 2024/25 - 2025/26.

4.7.5 Modernising the Car Park Estate

The council wants to ensure that car parks meet the highest safety standards and incorporate the latest technology to improve the experience of users. To maximise investment from revenue received through parking charges, permits and PCNs, the number of council-operated car parks is likely to reduce during the LTP period. This will include, but is not limited to, disposing of car parks that are under-utilised or are suitable for development and regeneration of town and village centres.

Reducing the number of car parks operated by the council will help to reduce the overall cost of running the service, which will allow greater investment in creating better and safer car parks (e.g. better lighting, resurfacing etc), implementing new technologies (e.g. pay on exit) and rolling out more EV charging points.

In some areas where car parks may be disposed, there may be a requirement to ensure no net loss of parking spaces due to demand. In addition, there may be schemes that require road space reallocation and the potential removal of on-street parking. In these cases, there may be a viable business case to increase the capacity of an existing car park(s) to accommodate displaced demand. These factors will be considered by the council before any decisions are taken on car park disposal.

4.7.5.1 Crewe Town Centre Multi-Storey Car Park

As part of the wider Royal Arcade development in Crewe, a new multi-storey car park (hereafter referred to as 'Crewe Town Centre MSCP') has opened alongside a new bus station. Crewe Town Centre MSCP has 388 spaces and operates between 7am and midnight, Monday to Saturday. 'Demand responsive parking charges' is being trialled, which means tariffs will be higher during peak periods and lower during off-peak periods. If this trial is successful, other car parks will be considered for demand responsive parking charges.

Crewe Town Centre MSCP opened in July 2024 and is part of a longer term strategy to reduce the number of car parks around Crewe town centre to facilitate regeneration and new developments (both public and private sector led schemes). Crewe Town Centre MSCP can accommodate displaced traffic from these car parks while still being convenient for Crewe town centre.

4.7.6 Influence on Travel Choices

Parking is integral to the overall vitality of towns and villages across the borough. It facilitates access to services in each location for car users. Well managed parking can contribute to decreased car dominance in town and village centres, which helps to:

- Create a more pleasant environment to dwell, resulting in more spending per visitor;
- Improve environmental conditions (e.g. lower noise pollution and improve air quality); and
- Provide more regeneration and development opportunities.

Car parks can take significant areas of land to provide the capacity required to support town and villages in the borough. Parking charges generally encourage turnover of traffic, which provides greater potential for car parks to be used more efficiently (i.e. fewer spaces are required to facilitate the same number of trips). Where this is achieved, it may be possible for the council to consider regeneration opportunities for some of this land, which would yield higher rates of return and be a more productive use. They can also be used to manage the competing demands of short and long stay users.

For short journeys, the wider roll out of parking charges across car parks in Cheshire East presents an opportunity to encourage modal shift, particularly for walking and cycling trips. This also has associated health benefits, as increased physical activity often improves the health of individuals and communities. In the short term, the impact of parking charges on trips with longer distances is less likely to have a significant impact on modal shift due to relatively limited alternative travel choices (e.g. not all areas of Cheshire East are served by convenient/ frequent bus or rail services).

The wider roll out of parking charges will also make public transport (particularly bus services) more competitive against the use of a private car. The bus network in Cheshire East has contracted significantly over the last 15 years and one of the contributing factors alongside cuts in funding and subsidies has been the availability of free parking in key and local service centres. New/ improved/ more frequent bus services may become more commercially viable in some areas with parking charges in place. The opportunities to expand the bus network and increase frequency will be monitored and delivered through the council's Bus Service Improvement Plan (BSIP).

4.7.7 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below

Section	Key findings	Implications for the LTP
4.7.2	In the majority of cases, the most utilised parking was in towns and villages where there is a small number of car parks. This shows a need to manage the demand and encourage turnover of spaces to ensure there is sufficient parking supply to support town and village economies.	This will need to be reviewed once the proposals agreed at highways and transport committee in January 2024 are rolled out. The council will be monitoring the impact of the proposals on utilisation and ticket sales throughout the first year.
4.7.3	Three car parks will start charging at 9am during school term time to accommodate the morning school run. These car parks are also proposed as free after 3pm car parks to mitigate issues associated with the afternoon school run.	In these instances, there is still an incentive to drive children to school as there is free parking until 9am in the morning, and parking is free after 3pm. This may make delivering school travel plans and the Sustainable Modes of Travel to School Strategy (SMOTS) more challenging in these areas.
4.7.3	Tariffs for each car park vary depending on their proximity to key services, which are most often in the centre of towns and villages. This means that car parks located further away from key services will be cheaper than more central and conveniently located car parks.	This may: <ul style="list-style-type: none"> ▪ Encourage more parking in peripheral car parking sites, with the aim of increasing walking activity and decreasing the number of miles that vehicles drive; ▪ Encourage modal shift by make public transport more competitive and attractive when compared to private vehicles; and ▪ Decrease the number of vehicles in the town and village centres, to: <ul style="list-style-type: none"> - Provide a safer environment for non-motorised users; - Provide more pleasant places to dwell and shop; - Improve noise and air pollution; - Potentially facilitate more regeneration opportunities and improvements to the public realm (council or private sector led).
4.7.3	The council consulted on proposals to introduce parking charges on Sundays and during the evening. The statutory consultation took place in 2024 and the responses from the consultation have been carefully considered - these will help inform any final set of proposals.	Expanding the parking charges to cover Sundays and late evenings will potentially encourage more sustainable and active travel across the whole week. It also means that public transport would be competitive on Sundays and may help to increase patronage during periods that are traditionally quieter.
4.7.4	As part of implementing the wider parking charges, the council is revising the existing scheme for contract permits. Under the revised scheme, users can purchase a quarter or annual permit at the lower, middle or higher tariff rate.	This will provide greater flexibility for drivers to park in the borough and may decrease the volume of traffic parking on-street. Currently, if the specified car park on the permit is full, drivers cannot park in another car park and would likely park on-street.
4.7.5	To maximise investment from revenue received through parking charges, permits and PCNs, the number of council-operated car parks is likely to reduce during the LTP period	Reducing the number of car parks may provide regeneration and development opportunities. This could also improve walking/ cycling connections.
4.7.5	There may be a viable business case to increase the capacity of an existing car park(s) to accommodate displaced demand from road space reallocation and/ or rationalisation of car parks in an area.	As above, the rationalisation of car parks may provide regeneration and development opportunities. Increasing the capacity of existing car parks to allow for road space reallocation would create a better use of land and could enable better walking, cycling or public transport infrastructure to be implemented. This could increase the number of short trips made by active modes, as well as public transport trips.

4.8 Freight

4.8.1 Facilities for drivers in the borough

CEC public car parks are purposed for cars and light goods vehicles; however, the council offer contract lorry parking at Shaw Heath Lorry Park on Mobberley Road in Knutsford¹¹⁶. Table 4-30 below shows the costs associated with the Lorry Park.

Table 4-30: Shaw Heath Lane Park costs

Type	Cost
Annual Contract	£735 per space
Six Month contract	£447 per space
Three month contract	£231 per space
Key deposit	£30

Motorway services along the M6 also provide Heavy Goods Vehicle (HGV) parking, one of which is the Sandbach services located between junctions 16 and 17, this provides 24 hour parking for a capacity of 24 HGVs. There is also the Knutsford services between junctions 18 and 19, this also provides 24 hour parking for HGVs and shower and accommodation facilities.

4.8.2 Location

Figure 4-79 shows the A-Roads and Motorways within Cheshire East. This network is important for linking freight in Cheshire East to Manchester Airport, services and other areas such as ports. The M56 provides east/west movement, connecting to Manchester Airport at the eastern end and North Wales and Holyhead Ferry Port towards the western end. The M6 runs north-south from southern England to Scotland and provides access to West Midlands areas such as Birmingham and Birmingham International Airport, as well as further north areas such as Manchester and Liverpool, before linking further north to access Cumbria and finally Scotland.

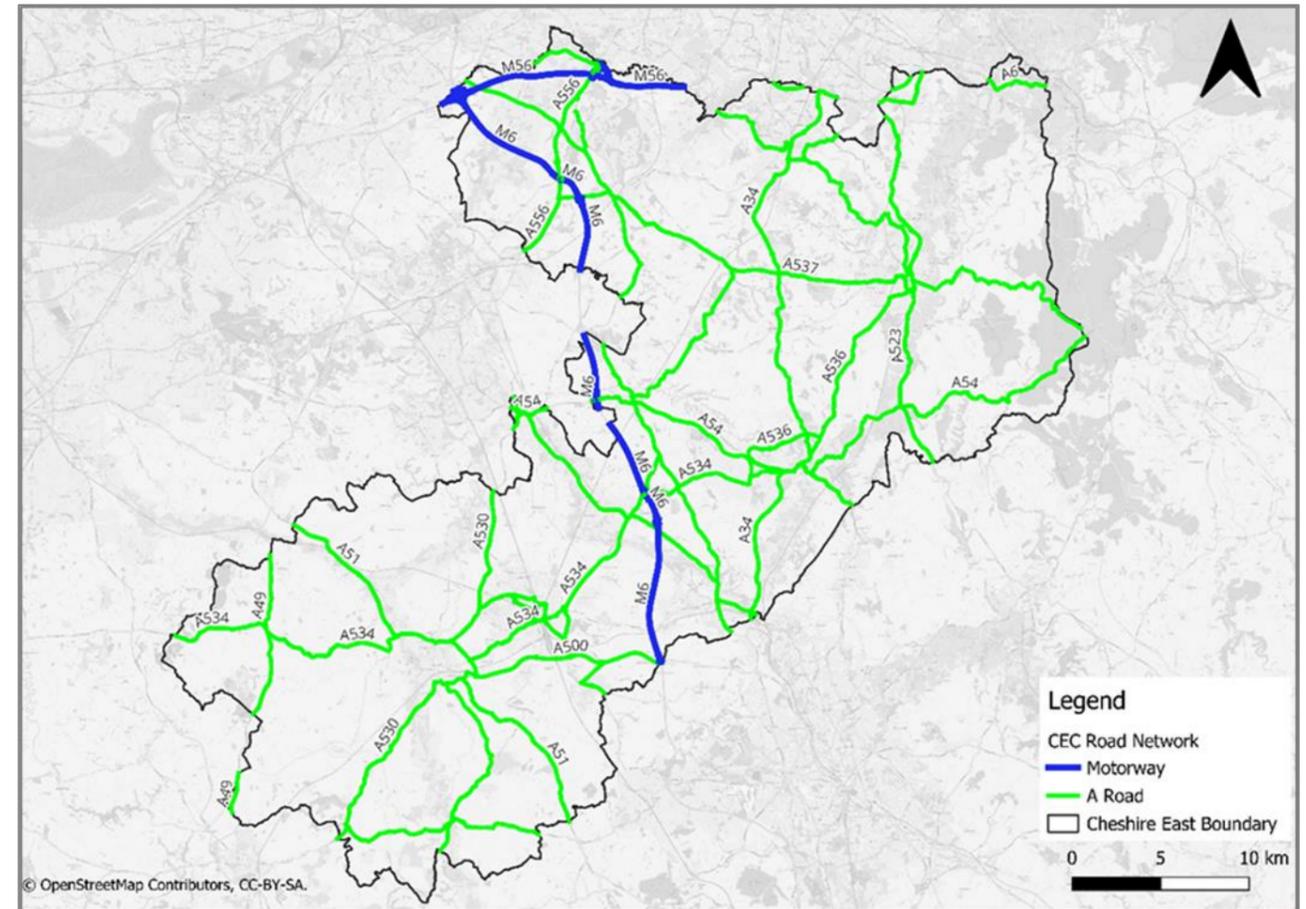


Figure 4-79: Cheshire East Motorways and A-Roads

Within Cheshire East, there are many development sites which generate freight traffic, these include industrial estates and logistic centres. The road network plays an important role in providing connectivity within Cheshire East, the neighbouring authorities and the UK. For example, the largest industrial estate in Cheshire East, Hurdsfield Industrial Estate in Macclesfield, connects directly to the A523 which provides access north towards Manchester. Crewe Green Industrial Estate, the largest industrial estate in Crewe is located next to Crewe Rail Station and connects to the A500.

4.8.3 Lorry Parking Demand

Provided by National Highways, the Lorry Parking Demand Assessment 2023¹¹⁷ provides an overview of where there is lorry parking demand and utilisation issues on a regional scale. National Highways devised a ranking system taking into account off-site and on-site parking issue to understand the demand for lorry parking in each Local Planning Authority and this provided a Lorry Parking Demand score out of 20, with a lower score being better. In Table 4-31 below the Lorry Parking Demand scores for Cheshire East and its neighbouring planning authorities are shown.

Table 4-31: Lorry Parking Demand Scores

Local Planning Authority	Lorry Parking Demand Score
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¹¹⁶ [Lorry parking CEC](#)

¹¹⁷ [Lorry Parking Demand Assessment 2023](#)

Cheshire East	8.248
Neighbouring Local Planning Authority	Lorry Parking Demand Score
Warrington	16.288
Cheshire West and Chester	6.050
Staffordshire Moorlands	1.208
Newcastle-Under-Lyme	16.818
Shropshire	10.662
High Peak	0.000
Stockport	0.580
Manchester	1.690
Trafford	0.338

According to the Lorry Parking Demand Assessment Report, Cheshire East does not score highly enough for the local authority to have a lorry parking demand issue. The neighbouring authorities Warrington and Newcastle-under-Lyme however do score highly and are in the national top 10 for Local Planning Authority Areas with unmet demand.

The report states that there are multiple limitations to the spatial approach used to score Lorry Parking Demand. Therefore, the report provides additional indicators of demand which are not included within the Lorry Parking Demand score. One of these is the number of critically utilised lorry parks. A critically utilised lorry park is counted as the lorry park being utilised above 85%. Cheshire East has three lorry parks which are utilised at a critical level, this places Cheshire East in the top eight nationally for the number of critically utilised lorry parks. The report states this is because of the local authorities' connections to the Port of Liverpool and the further warehousing and distribution industry in Warrington with which lorry drivers utilise parking in Cheshire East to access.

Critical utilisation is an important indicator of demand as critical utilisation may cause drivers to waste time and money travelling to sites which are full and may lead to drivers parking in locations that are not secure or do not provide adequate facilities as they may be going over their legally permitted driving time. This utilisation issue poses the question as to whether additional facilities are necessary to reduce the struggle for lorry drivers.

4.8.4 LGV/HGV data

Figure 4-80 shows the count of Large Goods Vehicles (LGVs) and HGVs on major and minor roads in Cheshire East for the 5-year period 2018-2022. This data has been taken from the DfT road traffic statistics of vehicle counts¹¹⁸. The locations of these count points can be found in the highways section in Figure 4-59 and Figure 4-61.

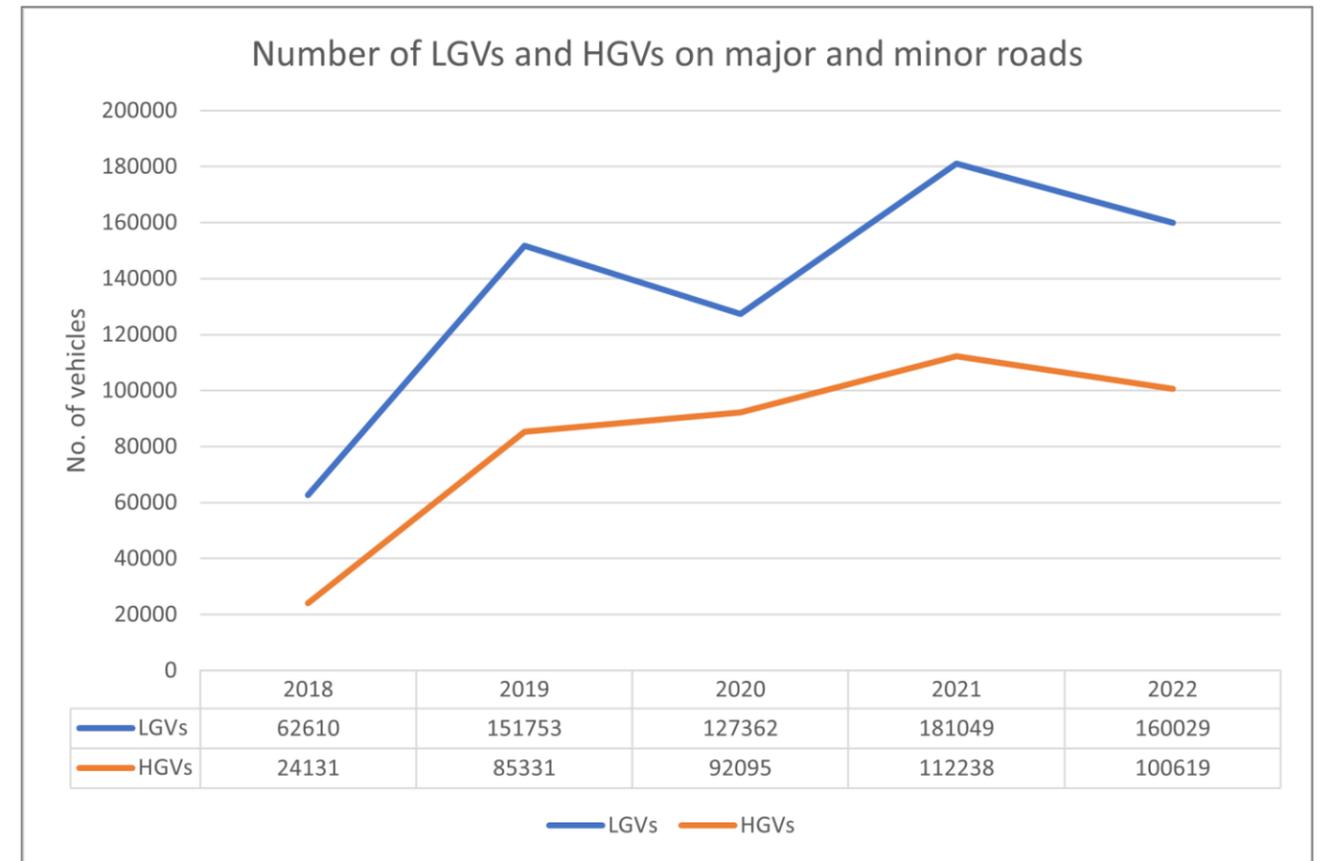


Figure 4-80: LGV and HGV counts on major and minor roads

The figure above shows that LGV numbers are higher than HGV numbers in Cheshire East and both counts have been increasing since 2018 until 2021 with a slight decline in 2022. Between 2018 and 2022 LGV numbers have increased by 156% and HGV numbers have increased by 317%. There was a reduction in LGV counts in 2020 due to the pandemic. HGVs did not reduce as there was still a need for HGVs during this time. One of the main reasons for the increase LGVs and HGVs traffic is due to the increase in e-commerce and home delivery services. According to Statista, in 2022 online sales accounted for 26.5% of overall retail sales in the UK, this was over double the amount from one decade prior. In 2020 alone internet retail sales grew by 47%; this is the fastest rate recorded in the previous ten years¹¹⁹. There are potential impacts on residential and neighbourhood streets from this increase in delivery traffic.

Figure 4-81 shows the forecasted miles for LGVs and HGVs in the North West, this data has been taken from the National Road Traffic Projections 2022¹²⁰. The forecast uses a core scenario which is based on the latest government projections of the main drivers of road traffic demand, for example population, GDP, employment, households, fuel prices and fuel efficiency.

¹¹⁸ Road Traffic Statistics CE

¹¹⁹ Statista e-commerce facts and statistics.

¹²⁰ National Road Traffic Projections 2022

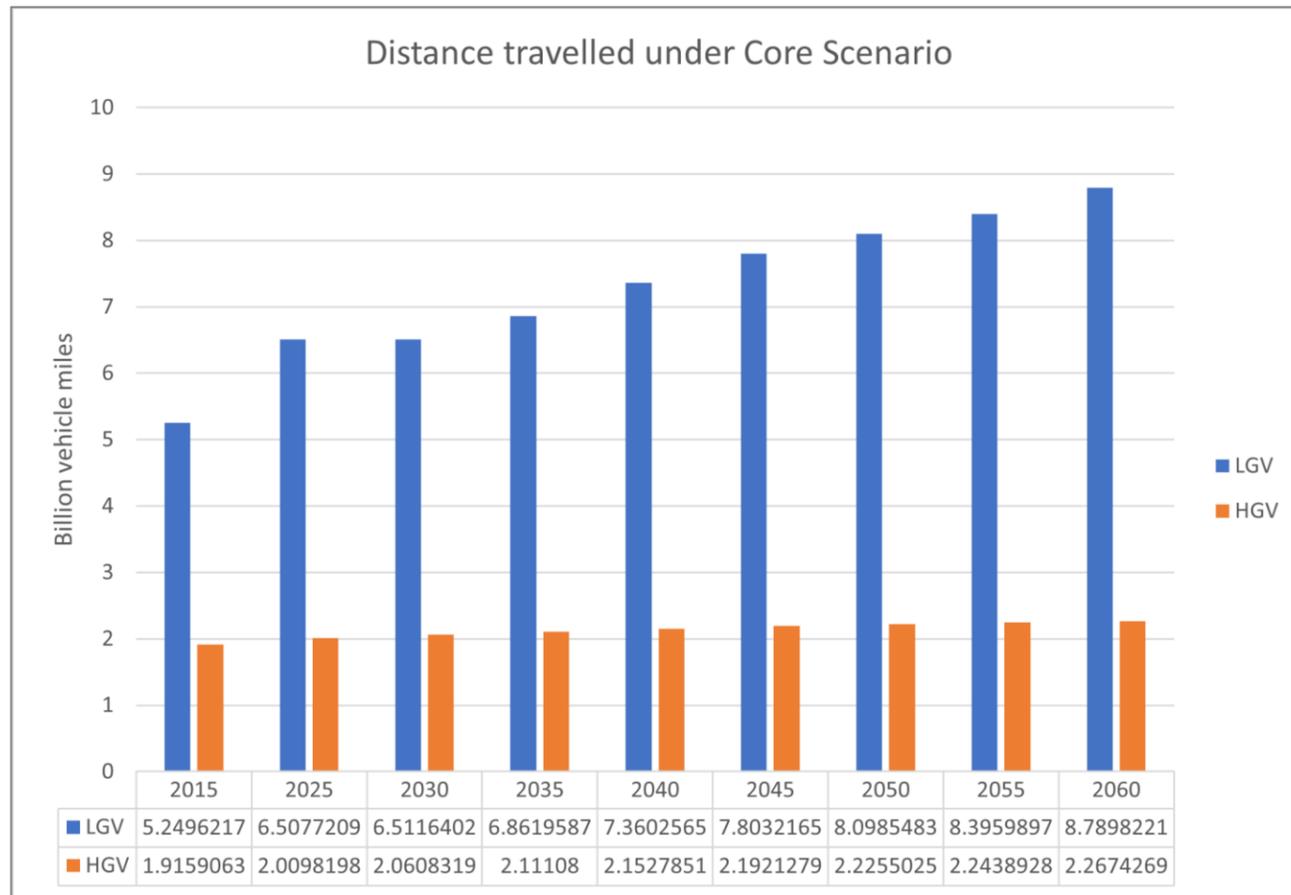


Figure 4-81: Forecasted LGV and HGV miles

As shown in Figure 4-81, in the North West LGV numbers are projected to carry on steadily increasing across the forecast period, reaching around 8.8 billion miles in by 2060 which is approximately 3.6 billion more than in 2015. HGV miles are forecasted to also increase however not as significantly as LGVs. They are forecasted to increase by around 0.4 billion. The increase in forecasted LGV miles may be due to the rise in e-commerce and home delivery services. This increase in miles will put additional strain on the Cheshire East Road network (including residential streets) and the facilities for lorry drivers without suitable mitigation. In addition, this will have implications for emissions as set out in Section 6.

4.8.5 Rail freight

The Office of Rail and Road provide a quarterly statistical release on the usage and performance of freight transported by rail in Great Britain¹²¹; the latest report covers the period 1st October 2023 to 31st December 2023. The findings are presented in Table 4-32.

Table 4-32: ORR report findings

Unit	2022	2023	Percentage change
Net tonne kilometres of freight moved	3.70 billion	3.85 billion	4%
Total freight lifted (tonnes)	7.2 million	7.2 million	0%
Freight train kilometres	7.35 million	7.66 million	4%

In terms of freight performance, the proportion of freight trains arriving within 15 minutes (measured by the Freight Delivery Metric) was 87.8%. this is the second worst level of freight performance between October and December since the time series began in 2013.

In June 2022, the DfT released the 'Future of Freight: a long term plan' document¹²² which sets out the governments vision for the freight sector. This includes modal shift to rail freight as part of the government's commitment to unlock "the economic and environmental benefits rail freight can deliver including supporting decarbonisation and reducing congestion on Britain's roads." Another document 'Rail Freight Growth Target'¹²³ published by the DfT in December 2023 details how the government is targeting a UK wide 75% growth in rail freight by 2050. Should this vision be realised, it is likely Cheshire East will see a year on year increase as the government look to shift freight onto rail.

¹²¹ Freight Rail Usage and Performance

¹²² Future of Freight

¹²³ Rail Freight Growth Target

4.8.6 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below:

Section	Key findings	Implications for the LTP
4.8.1	CEC provide contract lorry parking at Shaw Heath Lorry Park in Knutsford. Other 24 facilities for drivers include the Sandbach services located between Junction 16 and 17 on the M6 and Knutsford services between Junctions 18 and 19 on the M6. Both provide 24-hour parking.	There are facilities available for drivers in the borough which may attract freight and the associated businesses to the area, such as manufacturing.
4.8.2	Within Cheshire East the M56 provides east/west freight movement, and the M6 provides north/south freight movement. There are also many freight generating sites within the borough, for example the largest industrial estate in Cheshire East, Hurdsfield Industrial Estate in Macclesfield connects directly to the A523.	Cheshire East is well located and has good transport links to key airports, ferry ports and cities across the country. The borough's road network also serves freight generating development sites well enabling them to access the rest of the country.
4.8.3	Lorry Parking Demand in Cheshire East scores relatively low on the National Highways Lorry Parking Demand Assessment, however Cheshire East has three lorry parks which are utilised at a critical level which means Cheshire East is ranked in the top eight for the number of critically utilised car parks nationally.	CEC need to understand whether additional facilities are necessary to cater for lorry drivers to reduce the critical utilisation of their current facilities. This may be required to improve safety and security for lorry drivers.
4.8.4	LGV numbers are higher than HGV numbers in Cheshire East and both counts have been increasing since 2018 due to the increase in e-commerce and home delivery services. LGV miles are forecasted to continue steadily rising with 3.6 billion more miles forecasted to be travelled by LGVs in 2060 than 2015.	This increase in LGV and HGV vehicles and miles will put additional strain on the Cheshire East Road network (including residential streets) and the facilities for lorry drivers without suitable mitigation. This also has implications for emissions.

4.9 Journey Patterns

One element of the evidence base that is missing through desktop data collection is understanding journey patterns. For example, people's residence and place of work and the distance travelled between the two. This is largely as a result of the previous Census taking place during 2021 during COVID-19 restrictions. This understanding is crucial to the development of the LTP. Therefore, this gap is proposed to be filled by a Household Survey and StreetLight data collection which utilises mobile phone data. Once this work has been done and analysed, this section of the evidence base will be replaced with the information.

4.9.1 Household Travel Survey

Cheshire East Council are working on a sub-regional project with Enterprise Cheshire and Warrington, Warrington Council and Cheshire West and Chester Council to undertake a household survey. Across the sub-region, the survey is designed to achieve at least 1,100 completed surveys from households at the local authority level. This will help to understand how residents travel and move around the area. The results from a survey and travel diary will provide data that includes accurately reported travel movements by residents, and detailed information about household composition and status. The travel diary will collect detailed information about household member's travel movements for a single 'neutral' weekday. Analysis of this information will provide insight of movements within the borough.

4.9.2 StreetLight Data

StreetLight is a data integration platform to visualise transport network data. It is envisaged that both TomTom and BT mobile phone data for 2023 will be shown in the StreetLight platform which will be multi-modal. Streetlight will give insight to mobility through an interactive web application which will provide data on road volumes, speeds, travel times including the variability by time of day, day of week, and month of year for roads and between census geographies within Cheshire East. This dataset will allow additional analysis to be undertaken in the form of graphs and selections of individual/multiple road segments/geographies. For example, this could include summary statistics by town, or the top congested routes across the borough for example. The data will also help better understand travel to work flows and therefore where people want to travel to and from. This information will be able to be extracted for further analysis and reporting and due course will be added to this evidence base document.

4.10 Digital connectivity

4.10.1 Broadband connectivity

Digital connectivity refers specifically to connections to the internet. The UK Government has made an ambitious target for gigabit broadband to be available to 85% of the UK by 2025 and nationwide by 2030¹²⁴. Gigabit-capable broadband means download speeds of at least 1 gigabit-per-second (1 Gbps or 1,000 megabits per second, Mbps). Table 4-33 below shows the current availability of Superfast, gigabit and full fibre broadband across the regions of Cheshire East, the North-West and the UK. This data is taken from the Local Broadband Information website¹²⁵.

Table 4-33 Broadband Availability

	Cheshire East Availability (%)	North West Availability (%)	UK Availability (%)
Superfast (>=30 Mbps)	97.43	98.63	98.08
Gigabit (DOCSIS 3.1 or FTTP)	81.79	87.68	85.34
Full Fibre (FTTP or FTTH)	71.91	75.53	69.63

The data shows that the availability of all three broadband types is currently lower in Cheshire East than the rest of the North West and Superfast and Gigabit broadband availability is currently lower in Cheshire East than the UK as a whole. Full Fibre availability is only slightly higher in Cheshire East than the rest of the UK by around 2%. This shows that whilst the UK is currently meeting its gigabit targets, gigabit availability in Cheshire East is still below the target level of 85%. With Cheshire East also behind the North West it is important that broadband connectivity is improved. Internet connectivity plays a role in travel trends. For example, advances in technology and the internet can make working from home possible, and changes to the way people buy goods.

Cheshire East has produced a Digital Strategy¹²⁶ that looks at using digital innovation to provide innovative public services, creating sustainable digital infrastructure, a vibrant digital economy and improve health, wellbeing and inclusion. Cheshire East's Digital Investment Plan¹²⁷ also has a vision of striving for Cheshire wide Gigabit connectivity for all residents throughout the borough.

4.10.2 Digital accessibility and exclusion

Digital accessibility refers to the ability of everyone - no matter their age or disability - being able to access and use digital services. Without digital accessibility, barriers will be created, preventing individuals from accessing the internet. Under the UK Equality Act of 2010¹²⁸ it is legal requirement that websites and apps need to meet accessibility needs. Digital exclusion refers to individuals that have never used the internet or have not used the internet in the past three months¹²⁹. The Digital Exclusion Risk Index was developed in response to local authorities finding digital exclusion a significant challenge for residents and communities during the COVID-19 pandemic. The Digital Exclusion Risk Index (DERI) looks at the risk or likelihood of digital exclusion at MSOA level. A score of 0 represents a low risk of exclusion and a score of 10 represents a high risk of exclusion. Figure 4-82 overleaf shows the area to the south east of Macclesfield has a high score of digital exclusion which correlates to high levels of deprivation, with a decile score of 6. This higher DERI Score implies a higher chance of digital exclusion due to the lack of infrastructure from being situated in a more rural area, having a larger

proportion of the population who do not have access to the internet, or older generations that do not have the skills to use the internet. To ensure digital exclusion does not happen, this area needs to be a key focus area for improvement.

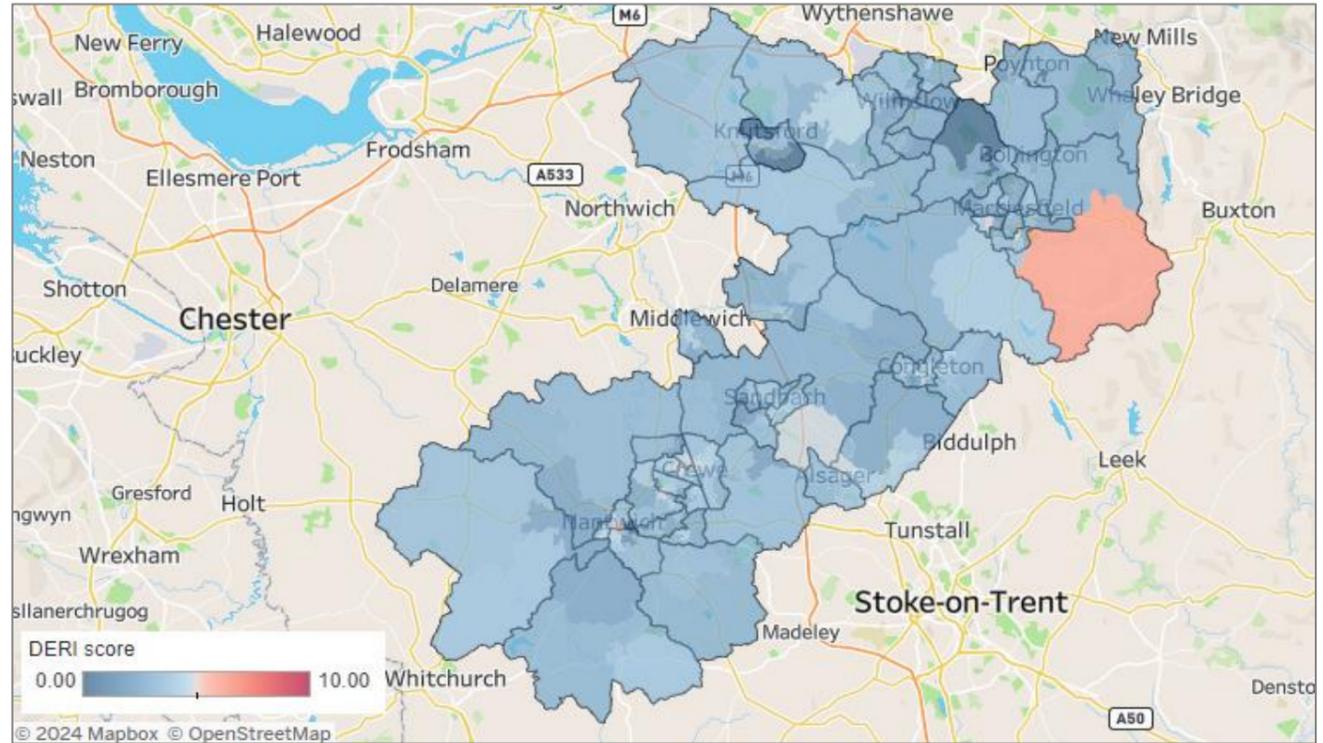


Figure 4-82 Cheshire East's Digital Exclusion Risk Index (Greater Manchester Office of Data Analytics)

4.10.3 Internet user classification

Figure 4-83 shows the internet user classifications of Cheshire East¹³⁰, utilising Consumer Data Research Centre data. Internet User Classification looks at the profile of the neighbourhoods across Great Britain according to how residents' access and engage with the internet. Neighbourhoods are classified into ten groups that describe typical resident internet use and engagement, which are:

- E-Cultural Creators – high levels of internet engagement regarding social networks and communications;
- E-Professionals – high levels of Internet engagement, and comprises young populations of urban professionals, typically aged between 25 and 34;
- E-Veterans – affluent families, usually located within low-density suburbs, with populations of mainly middle-aged and highly qualified professionals;
- Youthful Urban Fringe – edge of city centres and are often young and drawn from ethnic minorities;
- E-Rational Utilitarians – rural and semi-rural areas at the city fringe, high demand for Internet services by members of this Group is constrained by poor infrastructure;

¹²⁴ Gigabit broadband in the UK: Government targets, policy, and funding

¹²⁵ Local Broadband Information (accessed 28/08/2024)

¹²⁶ Cheshire East Digital Strategy

¹²⁷ Cheshire East Digital Investment Plan

¹²⁸ Equality Act 2010: guidance

¹²⁹ Exploring the UK's digital divide - ONS

¹³⁰ Internet User Classification | CDRC Data

- E-Mainstream – modal Internet user characteristics but are drawn from a wide range of social echelons as defined using conventional socioeconomic data;
- Passive and Uncommitted Users – limited or no interaction with the Internet.
- Digital Seniors – ageing and predominantly White British, retired and relatively affluent;
- Settled Offline Communities – elderly, White British and retired, and tend to reside in semi-rural areas; and
- E-Withdrawn – Areas associated with those more deprived neighbourhoods of urban regions.

As shown in Figure 4-83 around towns within Cheshire East there is a higher proportion of e-Mainstream, Digital Seniors and Passive and Uncommitted users – which is seen in Crewe, Congleton, Macclesfield, Middlewich and Sandbach. In more rural locations and areas surrounding towns within Cheshire East there is a large proportion of e-Rational Utilitarians and e-Veterans. These areas of Rational Utilitarians have high demand for internet services but due to poor infrastructure demands cannot be met. Internet infrastructure needs to be improved in these areas to maximise digital connectivity and support transport mobility.

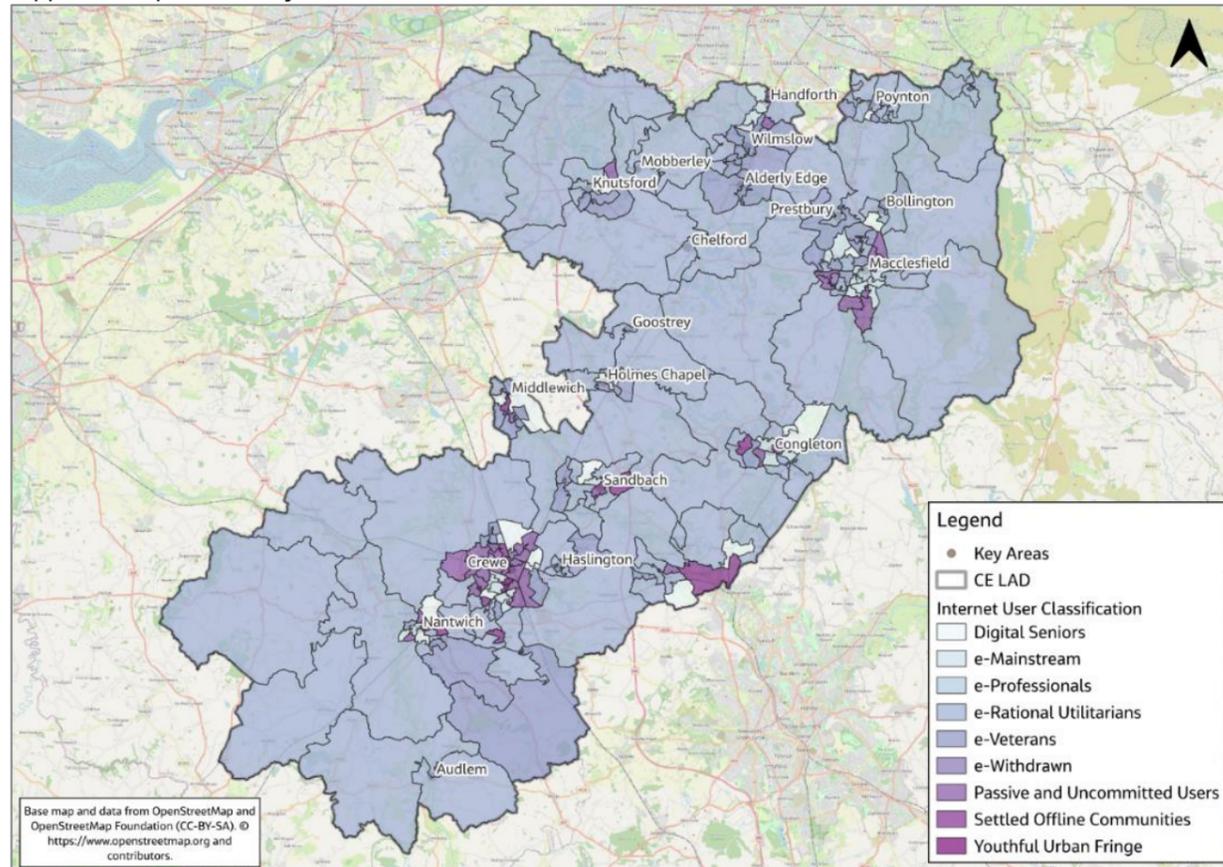


Figure 4-83 Internet user classification in Cheshire East (CDRC)

4.10.4 4G and 5G connectivity

According to Ofcom, 99.35% of Cheshire East has 4G coverage by at least one service provider. This shows that the majority of the borough has good 4G connectivity, with the remaining 0.65% potentially being more rural areas where there may

not be the infrastructure to provide 4G connectivity. At time of reporting, Ofcom have not published a network-wide 5G coverage dataset; however, 5G coverage data is available from three different internet providers in Figure 4-84, Figure 4-85 and Figure 4-86 show the distribution of 5G for Vodafone, EE and O2 throughout the borough of Cheshire East¹³¹.

There is no 5G connectivity throughout Cheshire East on the O2 network. However, there is good coverage of Vodafone 5G concentrated to the south of Crewe, north of Sandbach and around Knutsford, Macclesfield and Wilmslow, but little to no 5G coverage around Crewe and west of Macclesfield. There is here is high concentrations of EE 5G around Crewe, Knutsford, Sandbach and Congleton. However, there is little to no coverage around Bollington, Macclesfield or Alderley Edge.

4G and 5G connectivity are becoming increasingly important given its ability to provide excellent access to the internet on the go and through apps. This is particularly important regarding transport and the potential to access live information across all modes, but also plan and book journeys in advance for certain services. With advanced 4G/5G connectivity, digital accessibility will be improved for residents in line with the principles of Triple Access Planning – these principles facilitate resident’s access key services, job opportunities and other amenities through an integrated system of transport planning, land-use and digital connectivity.

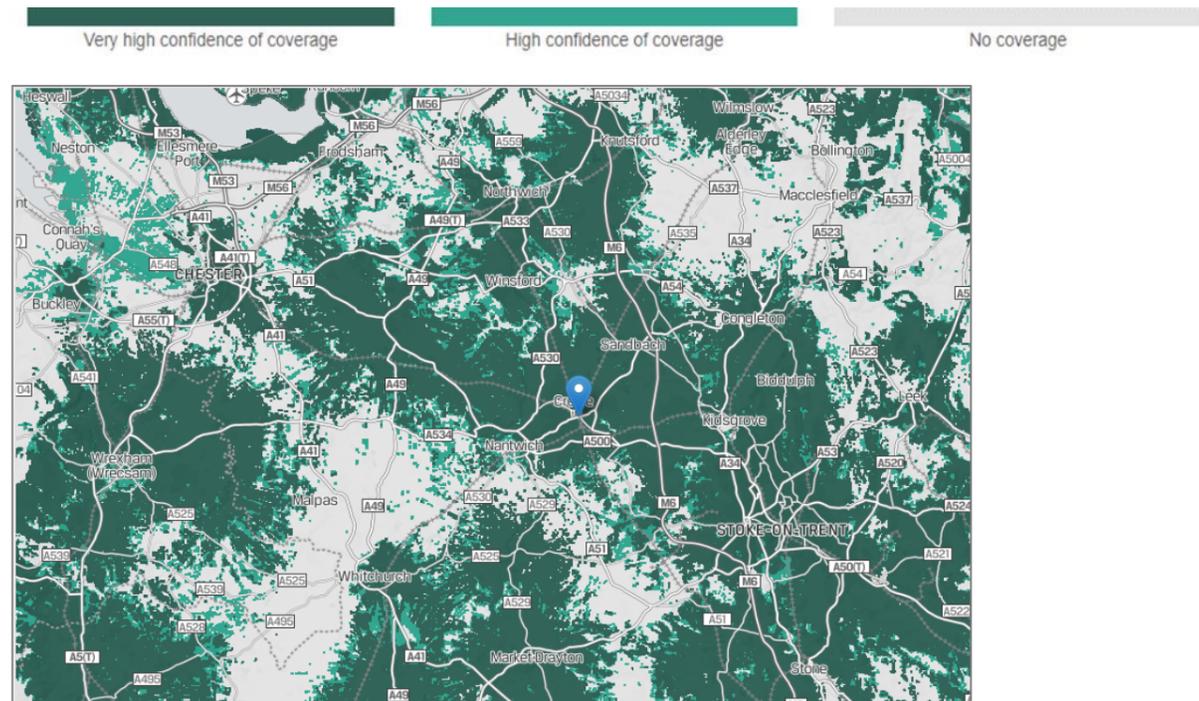


Figure 4-84 Availability of EE 5G connectivity throughout Cheshire East

¹³¹ [View mobile availability - Ofcom Checker](#)

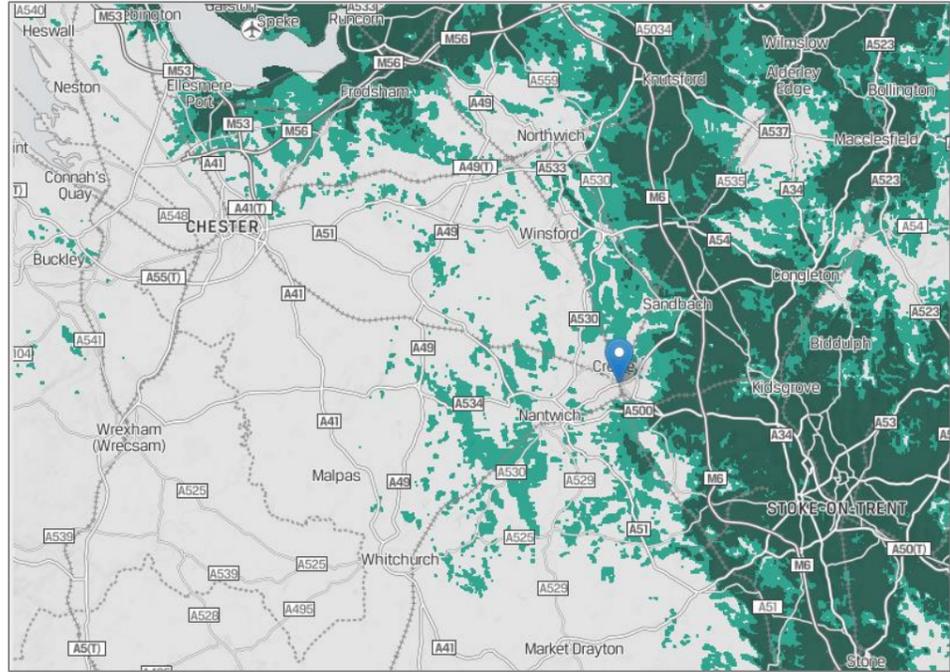


Figure 4-85 Availability of Vodafone 5G connectivity throughout Cheshire East

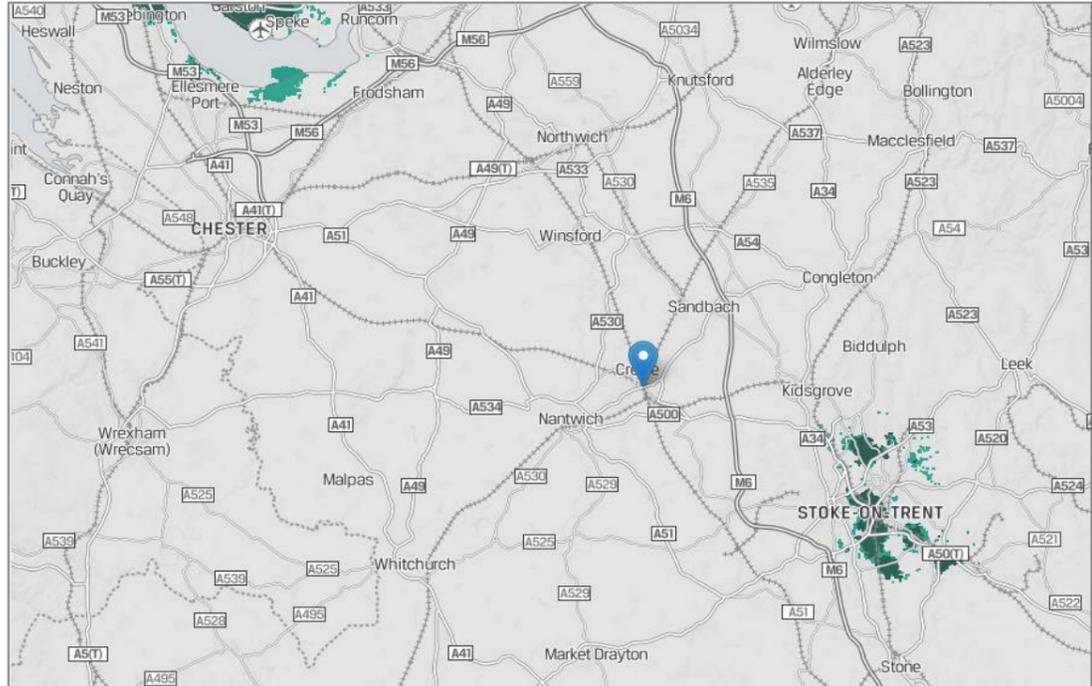


Figure 4-86 Availability of O2 5G connectivity throughout Cheshire East

4.10.5 Summary

A summary of the findings in this chapter and implications for the LTP are described in the table below.

Section	Key findings	Implications for the LTP
4.10.1	The availability of all three broadband types is currently lower in Cheshire East than the rest of the North West and Superfast and Gigabit broadband availability is currently lower in Cheshire East than the UK as a whole. Full Fibre availability is only slightly higher in Cheshire East than the rest of the UK by around 2%.	It is essential Cheshire East improves digital connectivity in line with the North West and UK to allow businesses to thrive and allow individuals to benefit from the access and opportunities digital connections offer. Digital connectivity impacts travel patterns, for example, increased working from home.
4.10.2	Overall Cheshire East does not face significant issues of digital exclusion; however, there are high levels of digital exclusion in the south east of Macclesfield, which correlates to a low level of deprivation.	Factors such as an ageing population, low incomes/affordability of high-speed internet services and skills shortage in deprived areas contribute to digital exclusion. To bridge this gap, more investment needs to be made to ensure better access to social and economic opportunities online.
4.10.4	Lack of 5G connectivity - nearly all the borough has 4G coverage, but 5G connectivity varies depending on the service provider	Around 50% of the Borough has access to 5G on Vodaphone and EE, however O2 and Three do not provide 5G connectivity. It is essential that there is sufficient provision of 4G and 5G across the borough, to ensure individuals can benefit from digital connectivity when away from broadband internet access.

5. Grow the Economy

5.1 Cheshire East's Economy

Cheshire East has a strong economy which consistently exceeds regional and national averages for metrics such as GVA per capita or percentage of population in employment. Despite this relative success, Cheshire East should not be complacent. An accessible, convenient, and resilient transport network is an enabler of economic growth by providing access to employment and training. This increases opportunity, and in turn can reduce deprivation which is still an issue in some areas of Cheshire East. Cheshire East is home to successful multinational companies such as Bentley, Astra Zeneca, Barclays, Royal London, Mornflake as well as a buoyant range of small and medium size enterprises. Furthermore, the borough has a rich cultural, heritage and visitor economy which contributes significantly to the overall economic output of the borough.

The proximity of Manchester Airport gives considerable economic benefits to the borough by providing access to national and international markets, as well as supporting a substantial number of jobs, both directly and indirectly.

The extensive road network in Cheshire East includes the M6 motorway, which runs north to south through the centre of the borough, and the M56 running east to west to the north. The rail network is accessible from 22 Railway Stations across the borough. Crewe and Macclesfield are on separate branches of the West Coast Main Line giving access to Greater Manchester and London Euston.

A key element of Cheshire East's economy is the dynamic and expanding tourism sector. Transport plays a key role in supporting this through providing accessibility into and around the borough. Additionally, active travel plays a key role in itself by providing leisure activities drawing on the attractive Cheshire natural landscape and visitor destination assets.

The vibrancy of town centres and villages is key to supporting the retail and leisure economy. The way streets and public spaces are designed and used is a key determinant on the vibrancy of these areas. Additionally, accessibility to these centres by various modes of travel is key to bringing residents and visitors into these centres.

5.2 Employment

In the 2021 Census, despite the impact of the COVID-19 pandemic, around 192,500 residents of Cheshire East were employed, a 6.3% rise from 181,100 in 2011. This increase is slightly higher than the 4.9% growth in England's employment numbers from 2011 to 2021. This discrepancy can be partly explained by population growth and the inclusion of individuals aged 75 and above in the 2021 data.

As displayed in Figure 5-1¹³², in 2021 within Cheshire East, 60.8% of the population aged 16 and over were economically active, either being employed (58.4%) or unemployed (2.4%), almost identical to the England average of 60.9%. The rate of economic activity was higher in urban areas (61.7%) of the Borough compared to rural areas (59.5%). Economic activity rates differed across the borough, with Prestbury having the lowest rate (50.7%) and Shavington the highest (64.3%). These geographical differences can be attributed to variations in age structure, socioeconomic factors, and the effect of recent house building on the demographic composition of different settlements. It is important however to ensure that rural areas are well connected to employment opportunities to ensure accessibility is not a barrier to economic activity.

The unemployment rate in the 2021 Census for the borough's economically active population was 3.9%, lower than England's 5.7%. Unemployment was higher in Cheshire East's urban areas (4.4%) compared to rural areas (3.0%). At the settlement level, the rate exceeded 4% in Crewe (5.2%), Handforth (4.6%), and Macclesfield (4.6%), and was lowest in Chelford (2.1%), though all areas of Cheshire East have unemployment rates lower than the national average. This analysis is consistent with the 2011 Census which showed the same pattern.

In the 2021 Census, just over a sixth (16.8%) of Cheshire East's employed residents were self-employed – a proportion very similar to the England average (16.9%). This self-employment rate was substantially greater (20.8%) in Cheshire East's rural areas than in its urban areas (14.4%). This rate was higher in Prestbury (28.6%) and Audlem (27.0%) than in any other settlements. At the other end of the spectrum, Crewe (10.9%) was the only settlement where this rate was below 12.5%.

Between 2011 and 2021 Census, the number of employed Cheshire East residents working in manufacturing sectors generally contracted, while the numbers working in service sectors generally increased. There are industries which make a particular contribution to the employment of residents. For example, the Manufacturing of chemicals, chemical products, rubber, and plastic accounted for 2.3% of all jobs in 2021, compared to only 1.0% across England. This likely reflects the concentration of pharmaceuticals and vehicle manufacturing at sites within Cheshire East and the dependence of these sites on local residents for much of their workforce.

In the 2021 Census, managerial and professional occupations accounted for a larger share of the jobs held by Cheshire East residents than in England as a whole. Conversely, other occupational groups accounted for a smaller share of the employed residents in Cheshire East than in England generally. These differences may reflect the rural/urban



Source: Office for National Statistics - Census 2021

Figure 5-1 Economic activity status

¹³² Build a custom area profile - Census 2021, ONS

composition of Cheshire East and the fact that professional and managerial jobs are more prevalent among the borough's rural residents than among its urban population. For professional, scientific and technical activities, the local employment share was 8.2%, compared to an England figure of only 6.7%. This no doubt reflects the concentration of pharmaceuticals and vehicle manufacturing at sites within Cheshire East (most obviously AstraZeneca in Macclesfield, Bepak in Holmes Chapel and Bentley in Crewe), and the dependence of these sites on local residents for much of their workforce. These findings also reflect the attractiveness of parts of Cheshire East as a residential location for highly qualified working-age people with the skills and experience required for professional, science-based and other technical jobs. It is therefore essential that the transport network is in place to continue to support these businesses and workers enable them to travel to work sustainably. There has however been anecdotal feedback from these employers that a lack of access to these sites by sustainable modes of travel is a limiting factor on their business. This is likely due to the recruitment pool from which employees are drawn being limited geographically, and the fact that residents of some areas of Greater Manchester who prefer to travel by non-car means having limited travel options to these employment locations in Cheshire East.

The proportion of employed residents working as Managers, directors and senior officials was highest in Prestbury (34.9%), Alderley Edge (31%), Goostrey (27.1%), Mobberley (25.5%), Chelford (24.3%), and Wilmslow (23.7%). These settlements all have relatively high median house prices and good transport connections, making them attractive to workers who are willing and able to commute significant distances to their workplace. Conversely, only 8.7% of Crewe's employed residents were in this occupational group, with Macclesfield, Middlewich, and Shavington having the next smallest share.

5.2.1 Home working

Whilst in the midst of COVID-19, the 2021 Census gives an indication of working from home at the time, and patterns associated with this. Homeworking was much more prevalent among those Cheshire East employed residents living in rural areas (42.2% of them worked from home) than among their urban counterparts (30.9%). The proportion working from home varied from over 50% in Prestbury (55.9%), Goostrey (52.5%) and Alderley Edge (51.1%) to only 20.6% in Crewe (more than 10 percentage points below any other settlement). These geographical variations are likely to reflect the differences in the occupations held by residents of each settlement, as well as the varying degrees to which the COVID-19 lockdown affected available travel options in each location.

More recent analysis from Ofcom in April 2022¹³³ at a national level suggests that the pandemic has accelerated a shift towards hybrid work from small and medium SMEs. This suggests that there is an enhanced importance of digital connectivity and digital accessibility for the workforce. If these trends continue, this will also have an impact on transport networks and how the workforce utilise various modes, and the frequency of utilisation. Section 4.10 presents analysis of digital connectivity in Cheshire East and notes particular issues in some rural areas.

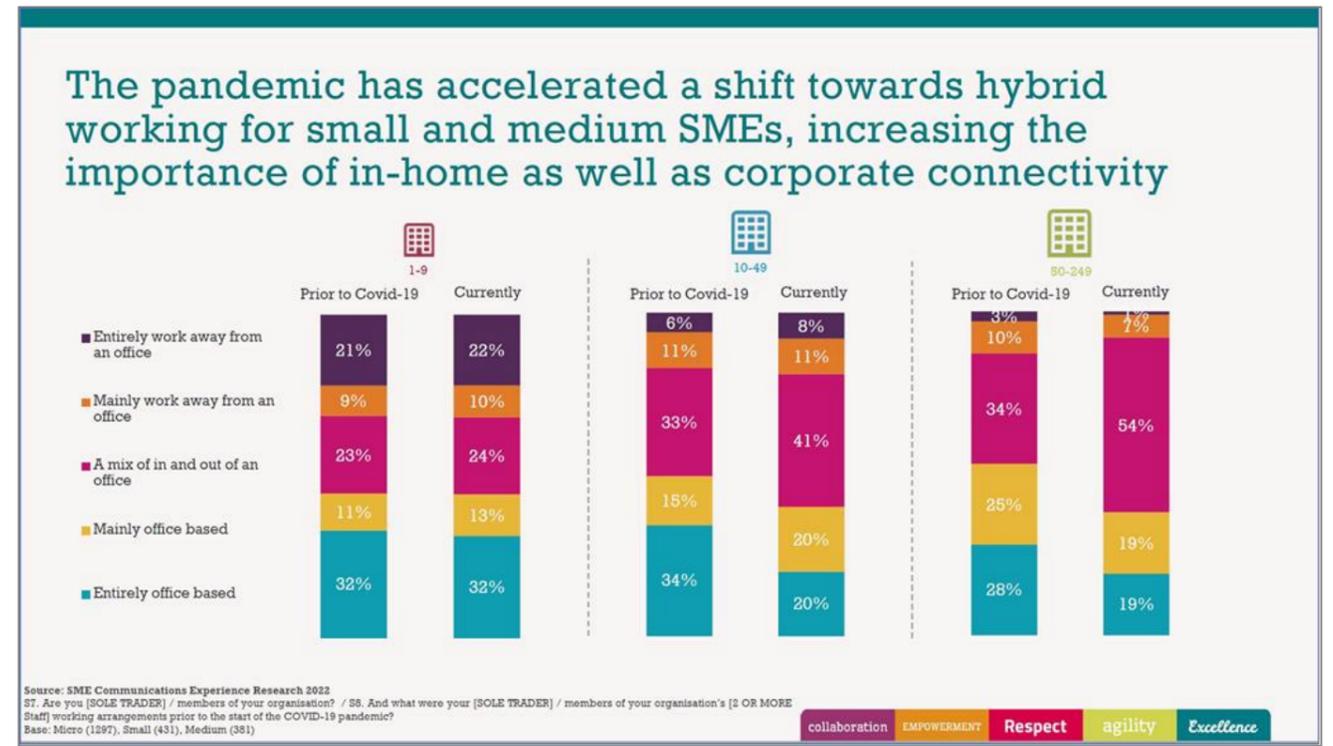


Figure 5-2 Work from home percentages based on SME size

5.3 Skills and education

Table 5-1 shows the working age population highest qualification. The percentage of the working age population in Cheshire East (45.5%) whose highest qualification is NVQ Level 4 and above is (as of 2021) higher than that in the North West (38.6%) or the UK (43.5%). The Cheshire East proportion is higher than in 2020, though this change is not statistically significant. This demonstrates Cheshire East has a more qualified and higher skilled population compared to the North West and the rest of the UK. The percentage of the working age population with no qualifications (4.4%) is lower than those in the North West and UK.¹³⁴ It is important that transport connectivity links residents to educational opportunities both inside and outside of the borough to ensure that the borough's residents remain highly skilled.

¹³³ SME consumer experience in the communications market (ofcom.org.uk)

¹³⁴ Annual Population Survey (residence-based dataset), Jan-Dec 2020 to Jan-Dec 2021, ONS, NOMIS. ONS Crown Copyright <https://www.nomisweb.co.uk/>.

Table 5-1 Percentage of working age population whose highest qualification is NVQ level 1/2/3/4 or higher/other/none

	Cheshire East (2021)	North West (2021)	UK (2021)	Cheshire East (2020)
NVQ4+	45.5%	38.6%	43.5%	41.3%
NVQ3	17.9%	17.9%	16.5%	23.2%
Trade Apprenticeship	2.2%	3.3%	2.8%	2.4%
NVQ2	16.5%	17.4%	15.2%	17.7%
NVQ1	9.9%	10.0%	9.3%	8.6%
Other	3.5%	5.2%	5.8%	2.4%
None	4.4%	7.5%	6.8%	4.4%

5.4 Productivity

Cheshire East, with Cheshire West and Warrington continues to be a strong economy, worth £32bn, with high productivity of £36.00 per hour (in 2019, compared to an England average of £35.50) and GVA growth of 9% in the past five years relative to the England average of 6.6%.¹³⁵ Given the relatively high GVA, number of jobs and increasing productivity in the information and communication sector, this could potentially be an emerging opportunity for the sub-region. However, this output growth has been achieved in the absence of productivity growth. GVA per hour has fluctuated around 2008 levels, and in 2019 (the latest year for which data is available) was actually slightly lower on 2008 levels. There is a highly productive manufacturing sector, which is over twice as productive as the Great Britain average, but most other sectors are underperforming compared to national averages.

5.5 Town centres

Town centres and high street retailing are facing challenges due to changing trends and behaviours. Cheshire East has a lower vacancy rate (10.0%) than the national average (13.8%), but three town centres exceed this average¹³⁶. Crewe's town centre continues to face challenges in terms of retail vacancy rates. A number of investments have been delivered to improve the town centre including a new bus station and multistorey car park with EV chargepoints. Several other projects are underway, aiming to diversify the town centre's uses and attract more visitors. In Congleton, despite high vacancy figures (19.8%), the overall vacancy rates have reduced due to redevelopment efforts. The Congleton Market Quarter is seeing significant investment, which should reduce vacancy levels and boost town centre vitality.

In 2023, Town Centre Vitality Plans (TCVPs)¹³⁷ were developed for several towns within Cheshire East. These plans aim to support the vitality and viability of town centres, especially in the face of challenges posed by changing shopping habits and the impact of the COVID-19 pandemic. A summary of the transport and economic characteristics for each town is provided in the below sub-sections.

More recently, in relation to supporting Cheshire East's town centres, recent information has been gathered for twelve towns in Cheshire East regarding footfall within the town centres as set out within monthly Visitor Insights Baseline Reports. The towns are: Alsager, Congleton, Crewe, Handforth, Knutsford, Macclesfield, Nantwich Road, Poynton, Sandbach, Wilmslow, Middlewich and Nantwich. Data for July 2024 showed that the highest footfall for town centres within Cheshire East was experienced in Macclesfield, and Crewe was the second highest. The lowest footfall in July

2024 was experienced in Alsager. Comparing this data to pre-pandemic footfall in July 2019, all of the towns except for Alsager have experienced an increase in footfall. Handforth experienced the most significant increase at nearly 200%. Alsager experienced a decrease in footfall of around 20%.

It is vital that transport in Cheshire East can support its principal towns and key service centres and businesses within them to enable a thriving economy. Without good accessibility, there is a risk of residents and employers moving outside of the borough, where it may be easier to travel to work or for businesses to attract talent. There is also a need for streets and public spaces to be welcoming and attractive to support retail activity and the overall vitality of town and village centres.

5.5.1 Alsager

Alsager is situated in the southern part of Cheshire East, seven miles to the east of Crewe and 10 miles north of Stoke-on-Trent. Its closeness to the M6 offers outstanding strategic road links to Manchester, Manchester Airport, Birmingham, and further afield. The Alsager Train Station, which is just a brief stroll from the Town Centre, provides a consistent daily service to Crewe, Stoke-on-Trent, and Birmingham, enabling connections to London via the West Coast Main Line. Consequently, Alsager boasts superb connectivity on a local, regional, and national level.

The primary employment and industrial activities are located on the town's southwestern edge, where BAE Systems and Radway Green Business Park are based. Despite the loss of some major employers, including Twyfords and MMU, Alsager's location next to the M6 makes it an appealing site for future investments. The anticipated expansion of Radway Green is expected to strengthen the town's role in employment, stimulate economic growth, and decrease the high incidence of commuting out of town.

Most of Alsager falls within the top 20% of the least deprived areas nationally. Only 16% of Alsager's residents lack access to a car. A quarter of the residents have to travel more than 40km for work, with public transport accounting for just 4% of commuting trips and 75% by car.

5.5.2 Congleton

Congleton is located in the southeastern part of Cheshire, at the base of the Pennines. The town is enveloped by rural landscapes yet is a ten-minute drive from the M6 motorway. It is approximately equidistant from Crewe, Stoke, and Macclesfield, each of which is within a 10-mile radius of the Town Centre. Congleton Railway Station, situated approximately 20-minute walk to the east of the Town Centre, offers hourly train services to Manchester and Stoke-on-Trent.

Congleton has the capacity to significantly boost the economic development and future wealth of Cheshire East. It is proposed that an area north of the Town Centre will house more than 4,000 new dwellings and 24 hectares of land for employment. The North Congleton Masterplan outlines how this will be achieved. The realisation of this residential and employment expansion is predicated on completion of the Congleton Link Road (linking A534 to A536), which opened in April 2021.

Unlike many of the other towns in Cheshire East, a substantial proportion of residents in Congleton (32%) travel less than 5km to work and active modes accounts for 13% of travel to work trips.

¹³⁵ <https://cheshireandwarrington.com/media/0asodop1/c-w-economic-evidence-report-final-draft-261022.pdf>

¹³⁶ <https://moderngov.cheshireeast.gov.uk/ecminutes/documents/s115646/Appendix%20G%20Town%20centres%20and%20retail%20topic%20paper.pdf>

¹³⁷ https://www.cheshireeast.gov.uk/business/major_regeneration_projects/town-centre-vitality-plans.aspx

5.5.3 Handforth

Handforth is centrally located in one of the region's most desirable residential areas, nestled between Wilmslow, Heald Green, and Styal. It is well-connected by road and rail, being just nine miles south of Manchester City Centre and connected to Manchester Airport via the A555. Besides Manchester, Handforth is within an hour's drive of other major cities like Liverpool and Chester via the M56. The Handforth rail station, a six-minute walk from the Centre, offers two trains per hour in each direction, connecting to Crewe, Alderley Edge, Manchester Piccadilly, and Southport.

There are a range of job opportunities at Airport City, the Cheshire Science Corridor, and the Greater Manchester City Region. Local employment is available at the Deanway Business Park on Wilmslow Road, the Brooke Park industrial estate, Stanley Green Industrial Estate and Handforth Dean. The Strategic Leisure/Tourism Asset Plan positions Handforth in relation to blue and green assets and tourist attractions. It highlights Handforth's links to local tourist spots like Quarry Bank Mill, Tatton Park, and Dunham Massey, as well as beautiful countryside areas like Alderley Edge and Styal Country Park.

Recognizing these assets, the Local Plan acknowledges Handforth's strategic growth potential and has earmarked several strategic sites for future residential and employment expansion. This includes the Handforth Garden Village (Phase 1 could accommodate 1,500 new homes and up to 12 ha of employment land). This development will significantly boost the resident population within the centre's catchment area and should encourage investment in local facilities. These allocations could support an additional 5,000 residents in the area by 2030.

Most of Handforth falls within the top 10% of the least deprived areas nationally. 75% of Handforth residents commute to work outside of the centre, primarily to other towns across Cheshire East like Wilmslow and Alderley Edge, and towards Manchester. Approximately 21% of households lack car access, the highest percentage among all nine areas with a TCVP.

5.5.4 Knutsford

Knutsford is one of the larger centres within Cheshire East. It is a popular destination for both residents and tourists. Knutsford is strategically well located, connected by road (M6) and rail to the conurbations of Manchester and Liverpool, and close to Manchester Airport.

Knutsford has a strong retail offer with a wide range of convenience and food retail. It also has a strong leisure and evening economy with a mix of independent and chain bars and restaurants. It also has a vibrant leisure and nightlife scene with a variety of independent and chain bars and restaurants. The town hosts several offices within the centre, primarily in the property and financial sectors. Knutsford also houses several employment sites around its periphery, offering a variety of office and industrial spaces, including Parkgate Industrial Estate, Knutsford Business Park, and Booths Park. While these may not necessarily house global brands, they do include a number of tenants with strong regional reputations in key sectors such as finance, ICT, and property.

Knutsford is also strategically well-placed, connected by road (M6) and rail to Manchester and Liverpool's urban areas, and near Manchester Airport. Knutsford falls within the top 20% of the least deprived areas nationally. However, it should be noted that there is a local pocket of deprivation that falls within the top 30% of the most deprived neighbourhoods. 74% of Knutsford's residents commute to work outside of the town, mainly to other towns across Cheshire East like Macclesfield and Wilmslow, and areas towards Manchester.

5.5.5 Middlewich

Middlewich is centrally located on the northern boundary of the Cheshire East, eight miles north of Crewe and 17 miles west of Macclesfield. The town's proximity to the M6 provides excellent strategic road connectivity to Manchester, Manchester Airport, Birmingham and beyond. A key employment site in Middlewich is Ma6nitide, this site is home to some of the country's major distribution companies such as Swizzels Matlow Ltd, B&M Retail, Wincanton and Kuehne + Nagel. The town also enjoys close linkages to the towns of Winsford and Northwich in adjoining Cheshire West and

Chester through its local road. As such, Middlewich benefits from good local and regional connectivity. Middlewich is the largest town in Cheshire without a centrally located rail station. With more than 80% of people travelling to work outside of Middlewich, there is a heavy reliance on car travel in and out of the area for commuting purposes contributing towards lower levels of air quality. Car travel accounts for 77% of travel to work trips. The Middlewich Eastern Bypass will include a new two-way single carriageway road that will connect a new roundabout junction off Pochin Way in the north to a new roundabout junction to the south, connecting with the A533 Booth Lane. The plans also include a combined cycleway and footway, as part of the council's continued commitment to encourage active travel and greener transport.

The majority of Middlewich is within the 20% least deprived areas of deprivation nationally.

5.5.6 Nantwich

Situated in the southern part of Cheshire East, Nantwich is five miles southwest of Crewe and 11 miles north of Whitchurch in the neighbouring borough. Its connection to the M6 via the A500 offers excellent road links to Manchester, Manchester Airport, Birmingham, and further afield. The Nantwich Train Station, located on the town centre's southern edge, provides daily services to Crewe, Manchester Piccadilly, and Carmarthen, enabling connections to London via the West Coast Main Line. This gives the town superb local, regional, and national connectivity.

Nantwich, due to its nearness to Crewe and easy access to the M6, is primarily a commuter town. It lacks a significant industrial estate or business park employment cluster within its urban area, except for a relatively small employment park. There are several offices scattered across the town centre, and Reaseheath College, situated on the northern outskirts, offers agricultural, academic, and light industrial uses. Approximately half of Nantwich is among the top 20% least deprived areas nationally.

Walking and cycling account for 16% of commuter journeys made by Nantwich residents, and 29% of the town's inhabitants work within the area (travelling less than 5km to work). Approximately 20% of households lack a car, and the percentage of residents who drive to work is relatively low at 66%.

5.5.7 Poynton

Poynton is situated in the northeastern part of Cheshire East, five miles to the south of Stockport and 13 miles to the south of Manchester City Centre, just beyond the Greater Manchester boundary. Manchester Airport is six miles east of Poynton, which boasts excellent road links to the M56 via the A555 and the A523 that runs through the town, connecting it to Macclesfield, Stockport, and Manchester. Poynton's train station offers hourly local services heading north to Manchester and south to Stoke-on-Trent.

Its location on the fringe of Greater Manchester provides Poynton with easy access to a broad array of job opportunities. Consequently, Poynton is primarily a commuter town with a limited internal job market. However, it does have a vibrant retail sector and nightlife. Most of Poynton falls within the top 10% of the least deprived areas in the country.

Car ownership in Poynton is notably high, with only 13% of households not owning a car. 36% of households have two or more cars, but 24% of residents travel less than 5km to work.

5.5.8 Sandbach

Sandbach is positioned in the centre of Cheshire East, seven miles to the north of Crewe and 15 miles to the south of Macclesfield. Its close proximity to the M6 offers superior road links to Manchester, Manchester Airport, Birmingham, and further afield. Located a mile away from the town centre in Elworth village, Sandbach Railway Station provides a regular daily service between Crewe and Manchester, via Manchester Airport. This allows for connections to London via the West Coast Main Line at Crewe, ensuring excellent local, regional, and national connectivity.

The primary source of employment is currently located on the town's western edge at the Springvale Industrial Estate in Ettiley village. Smaller employment areas are found in Wheelock village and business units in Elworth. A significant

mixed-use development is in progress at the Capricorn Business Park, located adjacent to J17 of the M6 motorway. This development will offer 29 hectares of employment opportunities, including a new business park, industrial, storage and distribution facilities, as well as amenities supporting food, beverage, and hospitality sectors, a sports facility, and a local centre. This scheme is expected to enhance Sandbach's role as an employment hub, stimulate economic growth, and decrease the high incidence of out-commuting.

A majority of Sandbach residents (65%) commute to work outside the area, primarily towards Crewe. Given the high rate of car ownership in the area (85% of residents have access to a car) and a 25-minute walk to the nearest train station, private car use is likely to dominate travel in, out, and around Sandbach. This is particularly true for commuting residents, with car travel accounting for 74% of work-related journeys.

Most of Sandbach falls within the top 20% of the least deprived areas nationally.

5.5.9 Wilmslow

Wilmslow is situated in the northern part of Cheshire East, 14 miles to the south of Manchester City Centre and a mere three miles from Manchester Airport and the M56. This highway links it to the M6 and M60, and the town is also well-connected to Manchester, Handforth, Macclesfield, and Congleton via the A34. Wilmslow Station, which is on the West Coast Main Line, offers both local and long-distance services, ensuring the town has superb local, national, and international connectivity. The town is also ideally positioned to access a broad spectrum of job opportunities, both within the Centre itself and its surrounding area (Airport City, Alderley Park, and Waters Corporation), as well as those in the wider Manchester City Region and Cheshire.

Most of Wilmslow falls within the top 10% of the least deprived areas nationally. The area also boasts high car ownership, with 90% of residents having access to a car and 40% having access to two or more vehicles. Consequently, 69% of residents commute to work by car.

5.6 Rural Economy

The rural aspect of Cheshire East is significant in terms of its contribution to the economy but bring both the constraints and opportunities that are peculiar to rural areas. 148,400 people, nearly two fifths of Cheshire East's total population (386,700), live in rural areas. The quality of its natural environment, combined with factors such as high educational attainment and employment opportunities, ensure that Cheshire East is a place offering a high quality of life to its residents and is an attractive place to do business; a place where people want to live, work and visit.¹³⁸

Cheshire East was traditionally, and remains in many places, a rural area, with agriculture (particularly dairy) and land-based industries, with a network of villages and mid-sized market towns serving as important service and functional

centres. Alongside their roles as retail, commercial, educational and leisure focal points, these places historically developed specialisms, including extractive industries, chemicals and silk. Business counts data from the Office for National Statistics¹³⁹ indicate that, of the 19,540 businesses located in Cheshire East as of 2022 (an increase from the 19,510 businesses there were in 2021), 10,300 (52.7%) were based in Middle Layer Super Outputs (MSOAs) that were part rural and part urban, 4,455 (22.8%) were in completely rural MSOAs and 4,785 (24.5% were in completely urban MSOAs.¹⁴⁰ It is therefore vital that our transport network supports businesses in rural areas, in addition to urban areas so the economy can continue to grow and thrive.

5.7 Visitor Economy

Cheshire East is home to a dynamic and expanding tourism sector. The UNESCO World Heritage Site, Jodrell Bank, unveiled its 'First Light' visitor centre in 2022, and Tatton Park is among England's most frequented attractions. The region boasts accessible natural landscapes, and attractive market towns such as Congleton, Knutsford, and Nantwich. Coupled with top-tier accommodation, heritage sites, historic gardens, world-class events, farm accommodation, and health clubs/spas, it provides a wide-ranging offer for both day trippers and overnight guests. Cheshire East's location near to Manchester, Liverpool, and Chester, as well as Staffordshire, Derbyshire, and Shropshire, enhances its appeal. It also encompasses a portion of the Peak District National Park and provides easy access to both local and international markets, thanks to two nearby international airports and excellent road and rail connections. The hospitality sector, which includes restaurants, bars, cafes, theatres, museums, tourist spots, and shopping destinations, significantly contributes to the leisure experience for locals, tourists, and businesses. The revenue generated by visitors is a vital boost to the borough's economy. However, research has confirmed an acute staff shortage in various roles within the hospitality sector, particularly front of house and chef roles. In many Cheshire East businesses this is preventing sites opening or forcing businesses to restrict their trading hours or the menu and service they can offer.

Cheshire East's visitor economy was projected to exceed £1bn in value by 2020, after reaching £994m in 2019. However, the pandemic severely affected the sector, especially the rural areas where much of the tourism infrastructure is located¹⁴¹. As a direct result of the pandemic and the ensuing restrictions, the visitor economy's value dropped to £548m in 2020. According to STEAM (Scarborough Tourism Economic Analysis Monitor) data, the sector has begun to rebound, growing by 34% and hitting £735m in 2021 and increasing by a further 20% in 2022, reaching £879m.

With tourism contributing significantly to the Borough's economy, it is important that the transport network is in place to support tourism, and that it is attractive and easy to use. This is both applicable for those travelling within the borough and those travelling from outside of the borough into Cheshire East.

¹³⁸ <https://modern.gov.cheshireeast.gov.uk/ecMinutes/documents/s97674/Rural%20Action%20Plan%202022.pdf>

¹³⁹ 'UK Business Counts - Enterprises' data, ONS, NOMIS. ONS Crown Copyright. Note: Figures relate to enterprises, not local units. Hence an enterprise with 2 sites in Cheshire East (and none elsewhere) would be counted only once (under the location of its main site or HQ). Figures include public as well as private sector organisations.

¹⁴⁰ These statistics are based on Cheshire East Council's 2015 Rural-Urban Classification developed by the council's corporate research team. This classification system assigned each of Cheshire East's 234 LSOAs to one of six narrow rural-urban categories and one of two broad rural-urban

categories. The statistics presented here are based on the two-category classification. However, the business count data are available only at and above MSA level. Therefore, the resulting statistics are split into three categories: "rural only" MSAs (those containing only rural LSOAs); "mixed" MSAs (those containing both rural and urban LSOAs); and "urban only" MSAs (those containing only urban LSOAs).

¹⁴¹ [CE Visitor Economy Strategy](#)

5.8 Summary

Table 5-2: Summary of grow the economy

Section	Key Findings	Implications for the LTP
5.1	Cheshire East has a strong economy which consistently exceeds regional and national averages for metrics such as GVA per capita or percentage of population in employment. However, there has been absence of productivity growth with GVA per hour fluctuating around 2008 levels, and in 2019 (the latest year for which data is available) was actually slightly lower on 2008 levels.	An accessible, convenient, and resilient transport network is an enabler of economic growth by providing access to employment and training and therefore this is essential in order to maintain Cheshire East's strong position and enable future economic growth.
5.2	The rate of economic activity is higher in urban areas of the Borough compared to rural areas.	It is important to ensure that rural areas are well connected to employment opportunities and other destinations to ensure accessibility is not a barrier to economic activity.
5.2	Professional and managerial jobs are more prevalent among the Borough's rural residents than among its urban population. This no doubt reflects the concentration of pharmaceuticals and vehicle manufacturing at sites within Cheshire East, and the dependence of these sites on local residents for much of their workforce. These findings also reflect the attractiveness of parts of Cheshire East as a residential location for highly qualified working-age people with the skills and experience required for professional, science-based and other technical jobs.	It is essential that the transport network is in place to support these businesses and workers enable them to travel to work sustainably, including rural areas. There has been anecdotal feedback from these employers that a lack of access to these sites by sustainable modes of travel is a limiting factor on their business. This is likely due to the recruitment pool from which employees are drawn being limited geographically, and the fact that residents of some areas of Greater Manchester who prefer to travel by non-car means having limited travel options to these employment locations in Cheshire East.
5.2.1	In the 2021 Census, homeworking was much more prevalent among those Cheshire East employed residents living in rural areas than among their urban counterparts. Geographical variations are likely to reflect the differences in the occupations held by residents of each settlement, as well as the varying degrees to which the COVID-19 lockdown affected available travel options in each location.	Working from home is a key element of triple access planning which brings environmental benefits and reduces pressure on the transport network, however reduced demand on public transport may pose challenges for the commerciality of services in some areas. There are also challenges for digital connectivity in rural areas of the borough which may limit the ability to work from home.
5.3	Cheshire East has a more qualified and higher skilled population compared to the North West and the rest of the UK.	It is important that transport connectivity links residents to educational opportunities both inside and outside of the Borough to ensure that the Borough's residents remain highly skilled.
5.5	Town centres across the country are facing challenges and whilst Cheshire East on the whole has lower vacancy rates than average, some towns are higher.	It is vital that transport in Cheshire East can support its principal towns and key service centres and businesses within them to enable a thriving economy. Without good accessibility, there is a risk of residents and employers moving outside of the borough, where it may be easier to travel to work or for businesses to attract talent. Likewise, it is important that streets and public spaces in town and village centres support vibrancy in these areas.
5.5	Cheshire East was traditionally, and remains in many places, a rural area, with agriculture and land-based industries, with a network of villages and mid-sized market towns serving as important service and functional centres. The rural economy remains crucial to the borough with three quarters of businesses located in a rural or part-rural area.	It is therefore vital that our transport network supports businesses in rural areas, in addition to urban areas so the economy can continue to grow and thrive.
5.7	Cheshire East is home to a dynamic and expanding tourism sector. The visitor economy is recovering following COVID-19 but is still facing challenges. Notwithstanding it is a crucial part of Cheshire East's economy, with many attractions being located in the rural parts of the borough.	It is important that the transport network is in place to support tourism, and that it is attractive and easy to use. This is both applicable for those travelling within the borough and those travelling from outside of the borough into Cheshire East. It is particularly important to have a transport network in place to access rural parts of the borough as this is where many of the attractions are located. Additionally, active travel in its own right provides a leisure attraction drawing on natural and cultural assets, and there is scope to further develop this offer.

6. Reduce Environmental Impacts

6.1 Introduction

In May 2019, the council declared an environment and climate emergency. The council has targets to become a carbon neutral council by 2027, and for the borough to be carbon neutral borough by 2045. Cheshire East has an environment that should be protected including:

- 385 English Heritage sites (Cheshire East and Cheshire West)¹⁴²;
- 33 nationally important Sites of Special Scientific Interest (SSSI's)¹⁴³;
- Over 420 sites in Cheshire East are classified as being of local importance as Local Wildlife Sites formally known as Sites of Biological Importance (SBI)¹⁴³; and
- A number of sites in the borough have also been declared Ramsar sites by Natural England. This designation recognises these areas as wetlands of international importance for waterfowl habitats and migratory birds¹⁴³.

Transport and the environment are closely related, and therefore transport has a key role to play in protecting and enhancing the environment through interventions to help reduce emissions. This section provides the evidence base in relation to the environment including carbon, climate change and air quality.

6.2 Carbon Emissions and Climate Change

6.2.1 Global and National context

On a global scale, the United Nations Environment Programme (UNEP) says the science is clear, the world is facing a climate emergency. Burning of fossil fuels has emitted enough greenhouse gases (GHGs) to significantly alter the composition of the atmosphere and average world temperature is rising. According to the Met Office, the global average temperature for 2023 was 1.46°C above the pre-industrial base line and it was the 10th year in succession that has equalled or exceeded 1.0°C above the pre-industrial period (1850 – 1900)¹⁴⁴.

The world is now warming faster than at any point in recorded history and if global warming continues it will have an increasingly severe impact on the planet, causing hunger, drought, flooding, wildfires and extreme weather. To avoid the worst of those effects, humanity must limit temperature rise to below 1.5°C. This requires the world to cut greenhouse gas emissions by 30 gigatonnes annually by 2030. UNEP has identified six sectors with the potential to reduce emissions enough to keep the world below the 1.5°C mark.

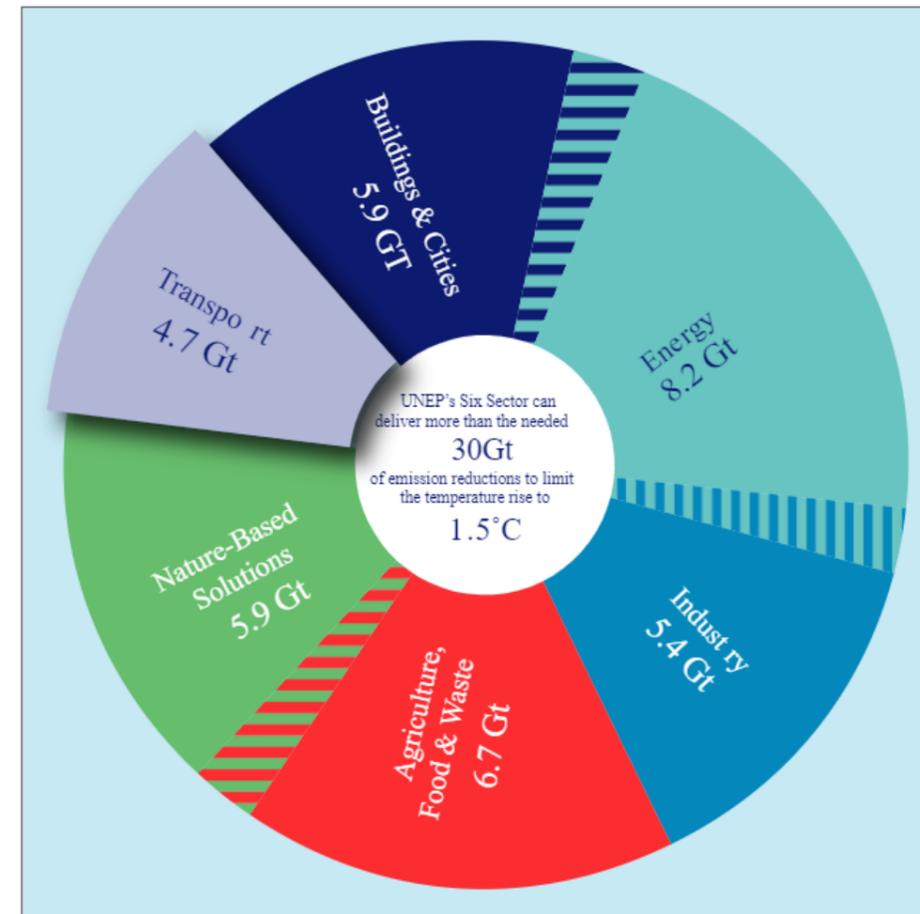


Figure 6-1 UNEP Global Greenhouse Gas Emissions Reduction by Industry Sector¹⁴⁵

Transport is responsible for about one-sixth of all greenhouse gas emissions globally and without mitigation this is set to double by 2050. The impact of the carbon footprint of transport can be reduced by up to 4.7Gt by switching to electric vehicles in private commercial and public transport, and encouraging people to walk, wheel and cycle and use other forms of non-motorised transport¹⁴⁵. Reducing demand for transport is also recognised as a key opportunity for reducing emissions.

On the 27th of June 2024, the Department for Energy Security and Net Zero published its latest annual estimates of greenhouse gas emissions for local authorities and regions, which cover the period 2005-22¹⁴⁶. On a national level the report details that in the UK as a whole, estimated total greenhouse gas emissions decreased by around 43% between 2005 and 2022. All UK local authorities saw their total emissions fall between 2005 and 2022, with reduced emissions from power stations and industrial combustion being the main reason for that trend.

To address greenhouse gas emissions on a national and regional scale, numerous documents have been released with decarbonisation at the forefront including DfT's Decarbonising Transport - A Better, Greener Britain (last updated January 2023) and TfN's Transport Decarbonisation Strategy (December 2021). Both documents have been produced

¹⁴² [Places to Visit in England | English Heritage \(english-heritage.org.uk\)](https://www.english-heritage.org.uk/places-to-visit-in-england/)

¹⁴³ [Nature Conservation \(cheshireeast.gov.uk\)](https://www.cheshireeast.gov.uk/nature-conservation/)

¹⁴⁴ [2023: The warmest year on record globally - Met Office](https://www.metoffice.com/en-uk/weather/interest/2023-the-warmest-year-on-record-globally)

¹⁴⁵ [The six-sector solution to the climate crisis \(unep.org\)](https://www.unep.org/six-sector-solution-to-climate-crisis)

¹⁴⁶ [UK local authority greenhouse gas emissions estimates 2022](https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/118114/uk-local-authority-greenhouse-gas-emissions-estimates-2022)

in recognition of the significant and crucial contribution the decarbonisation of transport can have towards meeting greenhouse gas emissions targets. According to the policy document 'Decarbonising Transport. A Better, Greener Britain¹⁴⁷', the transport sector has not matched the substantial emissions reductions seen in other sectors, with a 36% increase in the contribution transport has made to overall emissions since 2005 nationally. The large majority of emissions are directly generated by road-based trips, particularly private cars. Figure 6-2 indicates that transport is the largest emitter of UK greenhouse gas emissions, accounting for nearly a third of all emissions.

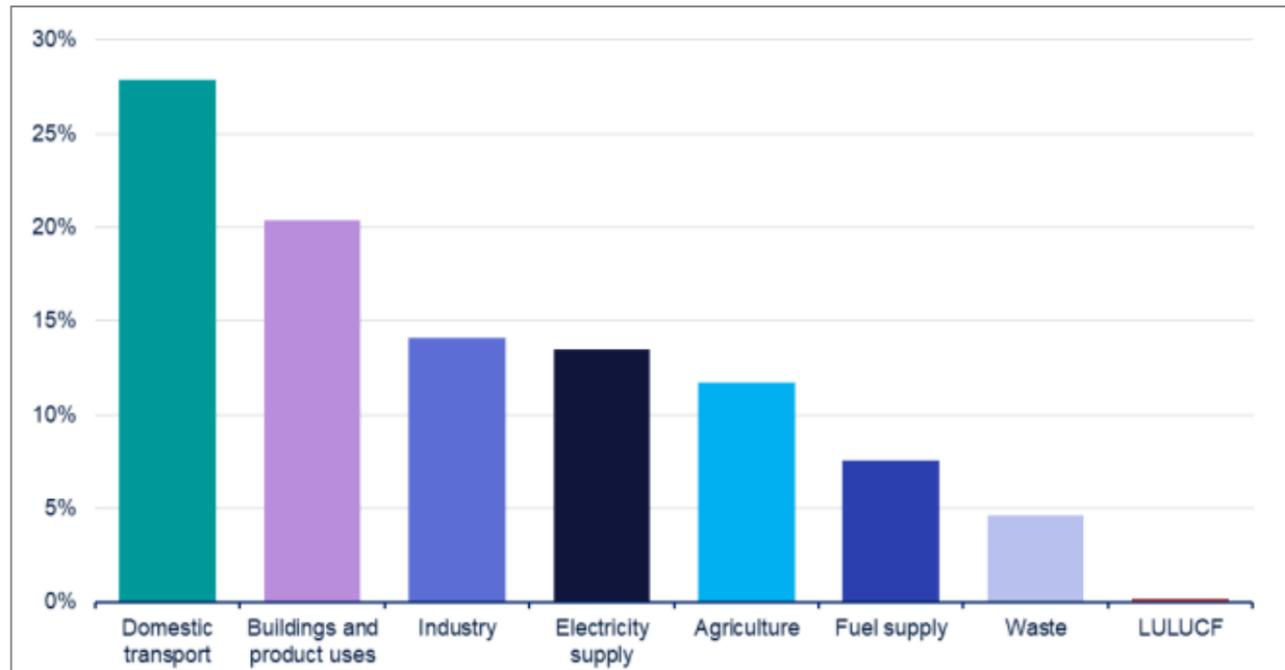


Figure 6-2 Net UK Green House Gas Emissions by Industry Sector 2022¹⁴⁸

As shown above, in 2022, 28% of net greenhouse gas emissions in the UK were estimated to be from the domestic transport sector, 20% from buildings and product uses, 14% from industry, 14% from electricity supply and 12% from agriculture. The other 12% was attributable to the remaining sectors: fuel supply, waste and the land use, land use change and forestry (LULUCF) sector. The LULUCF sector includes both sinks and sources of emissions.

Historically, the electricity supply sector had the highest greenhouse gas emissions, but the large reductions over the last decade in emissions from power stations mean that since the mid 1990s the domestic transport sector has been one of the highest sources of greenhouse gas emissions. This is illustrated in Figure 6-3.

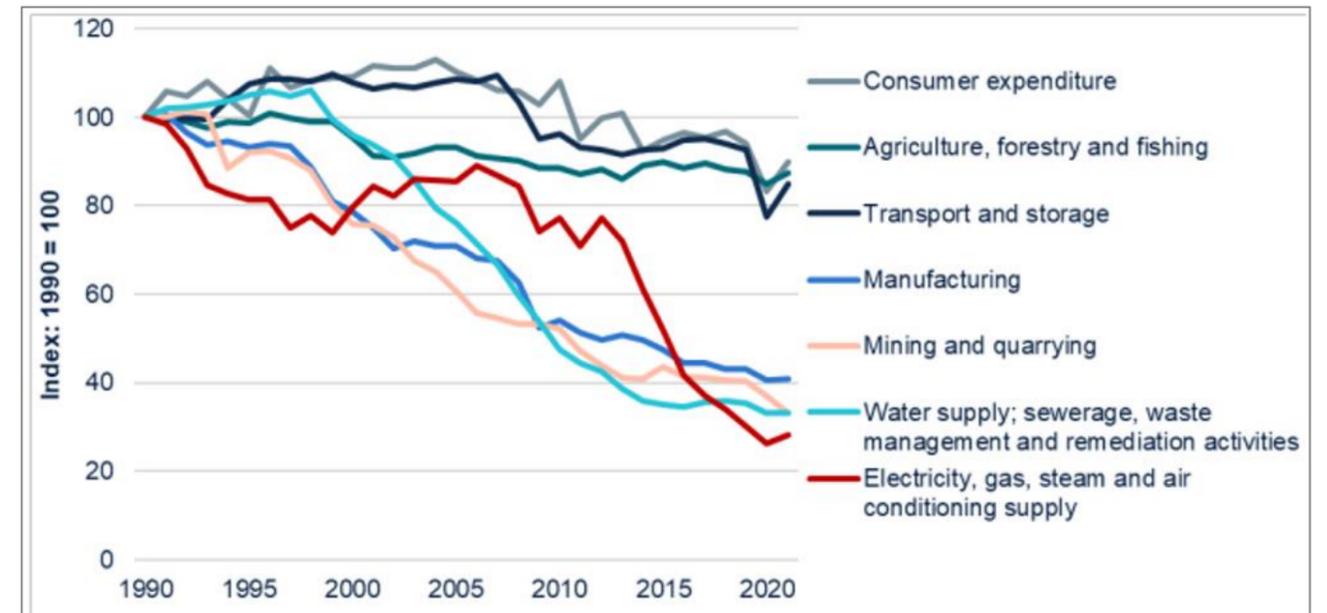


Figure 6-3 Trend in territorial greenhouse gas emissions for selected Standard Industrial Classification sections, UK 1990 to 2021¹⁴⁹

6.2.2 Carbon Emissions

In May 2019, the council declared an environment and climate emergency, and committed to becoming a carbon neutral council by 2025. This target has since been pushed back to 2027¹⁵⁰ due to the financial landscape the council is in. In January 2022, a further pledge was made to make Cheshire East a carbon neutral borough by 2045, which is five years ahead of the UK Government's national 2050 target.

6.2.2.1 The council's Carbon Emissions

CEC's ambition to be a carbon neutral council by 2027 is based on the council's carbon emissions during 2018-2019. The council's Carbon Neutrality Action Plan 2020-2025 (January 2020) estimates that the carbon footprint of the council in 2018-2019 was just under 15,500 tonnes of greenhouse gas emissions and is based on the activities the council has direct control of as shown in Figure 6-4.

¹⁴⁷ Decarbonising Transport, A Better, Greener Britain

¹⁴⁸ 2020 UK Greenhouse Gas Emissions, Final Figures (publishing.service.gov.uk)

¹⁴⁹ Annex 2: 2021 UK Greenhouse Gas Emissions, by Standard Industrial Classification (publishing.service.gov.uk)

¹⁵⁰ Carbon Neutral Council (cheshireeast.gov.uk)

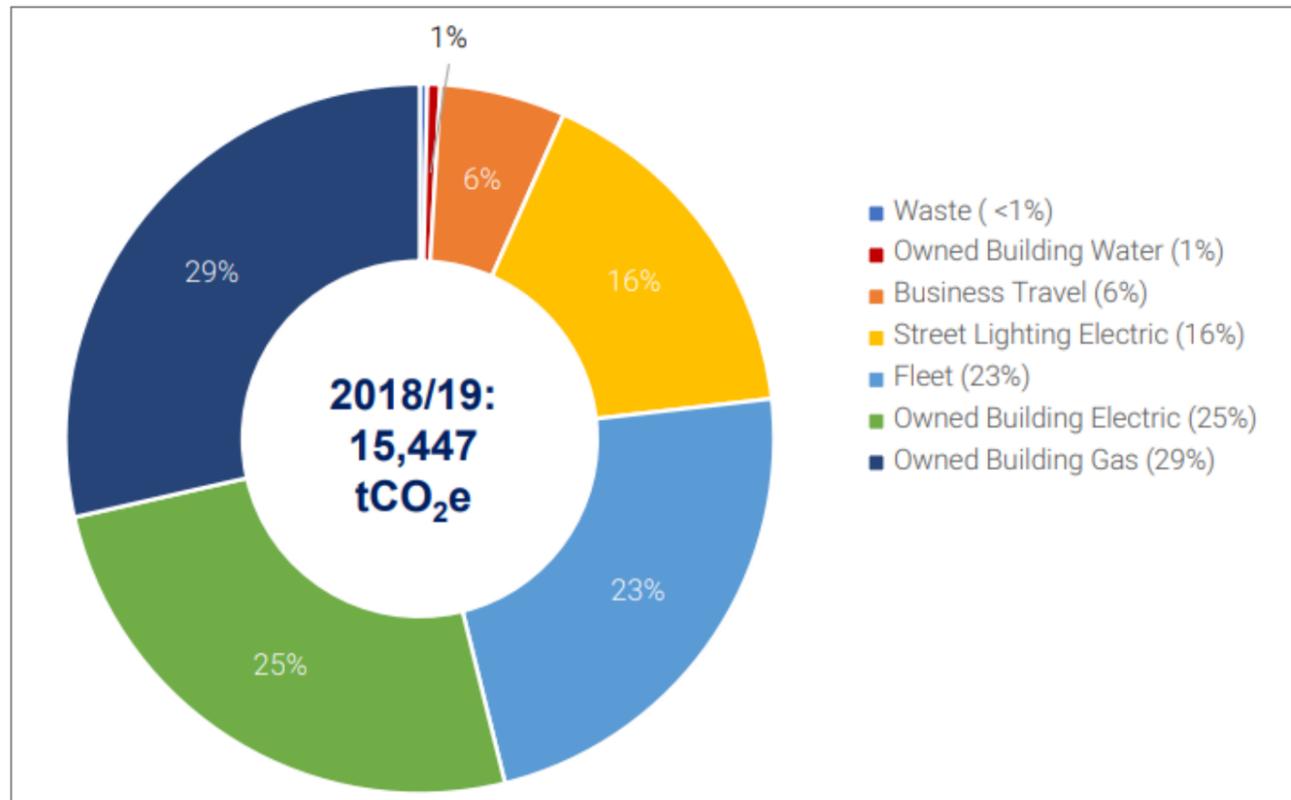


Figure 6-4 CEC Carbon Emissions by Activity ¹⁵¹

In terms of Transport (Fleet), the figure indicates it is responsible for 23% of all the council's carbon emissions; therefore, there is scope for transport to play an important role in reducing the council's carbon emissions.

6.2.2.2 Boroughwide Carbon Emissions

In terms of borough-wide greenhouse gas emissions, in 2019, the borough's energy system was responsible for net emissions totalling 2,85 million tonnes. The majority resulted from buildings and facilities (48%) and transport (34%). The emissions profile for the area administered by Cheshire East Council is shown in Figure 6-5¹⁵²

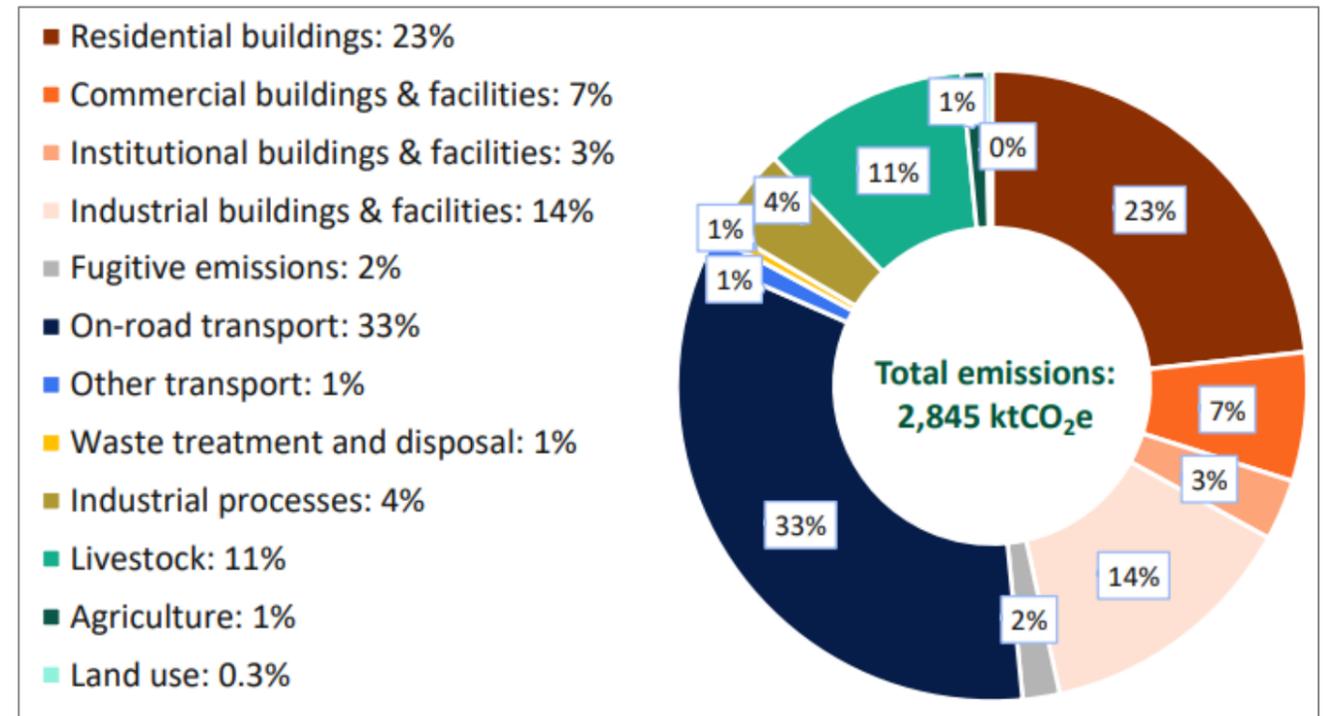


Figure 6-5 2019 Cheshire East Borough Wide Emissions by Sector¹⁵³

Therefore, it is clear that decarbonising transport is crucial to meet the council's goals of being a carbon neutral council by 2027 and making Cheshire East a carbon neutral borough by 2045. As a result, major change is required in terms of how people travel in and around the borough, moving away from private vehicles to public transport, active travel options and electric vehicles (EVs). Reductions in the demand for transport is also important. As set out within section 4.6.9, 74% of residents travelled to work by car or van in the 2011 Census, and over 85% of households own at least one car. In contrast, in the 2011 Census just 5% of journeys took place on public transport and 13% by walk or cycle.

In order to reduce emissions from on-road transport, the council have set targets as part of the Carbon Neutrality Action Plan 2020-2025 (January 2020) in relation to borough-wide emissions from cars and HGVs:

- 15% reduction in emissions from HGV fleet by 2025;
- 6% reduction in car transport share in 2025 against 2015 levels;
- 64% of cars are EV, PHEV or FCV by 2025;
- Modal share of active transport to 6% by 2025;
- 88% of buses are EV, PHEV or FCV and rail is 100% electrified by 2025; and
- By 2025, improve the efficiency of road transport through smart technology.

The LTP should provide a framework to enable these changes to occur to reduce emissions across the borough.

¹⁵¹ Cheshire East Council Carbon Neutrality Action Plan 2020-2025 (January 2020)

¹⁵² Cheshire East Council Borough-wide Baseline & Carbon Reduction Options (November 2022)

¹⁵³ Cheshire East Council Borough-wide Baseline & Carbon Reduction Options (November 2022)

Table 6-1: Neighbouring Local Authority emission numbers

Local Authority	Cheshire West and Chester	Derbyshire	Cheshire East
Report Year	2020	2018	2019
Net Greenhouse Gas Emissions	4 million tonnes	10.5 million tonnes	2.85 million tonnes
Largest sources of emissions	Buildings and facilities (79%), Transport (19%)	Industrial (68%), Transport (19%)	Buildings and facilities (48%), Transport (34%)

As shown in Table 6-1, Cheshire East has a lower share of buildings and facilities related emissions but has a higher share transport related emissions in comparison to Cheshire West and Chester. However, it must be noted that the Cheshire East data is from one year previous to the Cheshire West and Chester data. In comparison to Derbyshire, Cheshire East release around 8 million tonnes of emissions less, however transport emissions account for 15% more of Cheshire East's emissions than they do in Derbyshire. It must also be noted that this data is taken from 2018, whereas the Cheshire East data is from 2019.

The Department for Energy Security and Net Zero's latest annual estimates of greenhouse gas emissions for Cheshire East¹⁵⁴ show that in 2022 the Borough's total domestic emissions were 604,600 tonnes, down 44.5% on 2005 (and 12.8% lower than in 2021). This percentage fall was slightly less than that achieved by the UK as a whole (47.1%).

With the exception of one year (2007), emissions from transport followed a downward trend from 2005 (1,245,400 tonnes) to 2013 (1,121,100), but then increased in four successive years (to 1,186,000 by 2017). In 2018 and 2019, emissions levels in this sector changed marginally (by less than 0.5% in each year), but then dropped by 16.2% in 2020 alone, to reach 991,900 (probably in large part a consequence of the COVID-19 restrictions in place for much of the year). Transport emissions then grew by 6.4% in 2021 and rose more modestly (by 1.7%) in 2022. UK transport emissions are now 18.2% below their 2005 level.

With the exception of short-term increases in 2010 (2.5%), 2012 (3.7%) and 2021 (4.7%), total emissions from all sectors have fallen every year from 2006 to 2022. Total emissions in 2022 (2,962,300 tonnes) were 34.1% below their 2005 level. For the UK as a whole, the trend was similar: steadily downward, apart from temporary increases in overall emissions in 2010, 2012 and 2021. By 2022, total emissions across the UK were 42.7% lower than in 2005. By 2022, Cheshire East's total emissions per capita were 7.3 tonnes, down from 12.5 tonnes in 2005 (and from 7.7 in 2021). Over the same 17-year period, per capita emissions also fell in the UK as a whole (from 10.9 tonnes to 5.6), but Cheshire East is still above the national average.

6.2.3 Becoming a carbon neutral council by 2027

A pathway to achieving the council's goal of being a carbon neutral council by 2027 is illustrated in Figure 6-6, which identifies an opportunity to reduce the council's transport (business travel and fleet) carbon emissions by 5% or 767 tonnes by:

- Reducing the need for business travel through technology;
- Encouraging a modal shift in travel methods; and
- Switching the council's fleet to 100% electric, which on average reduces emissions from vehicles by 66% with a target of 15% for HGVs.

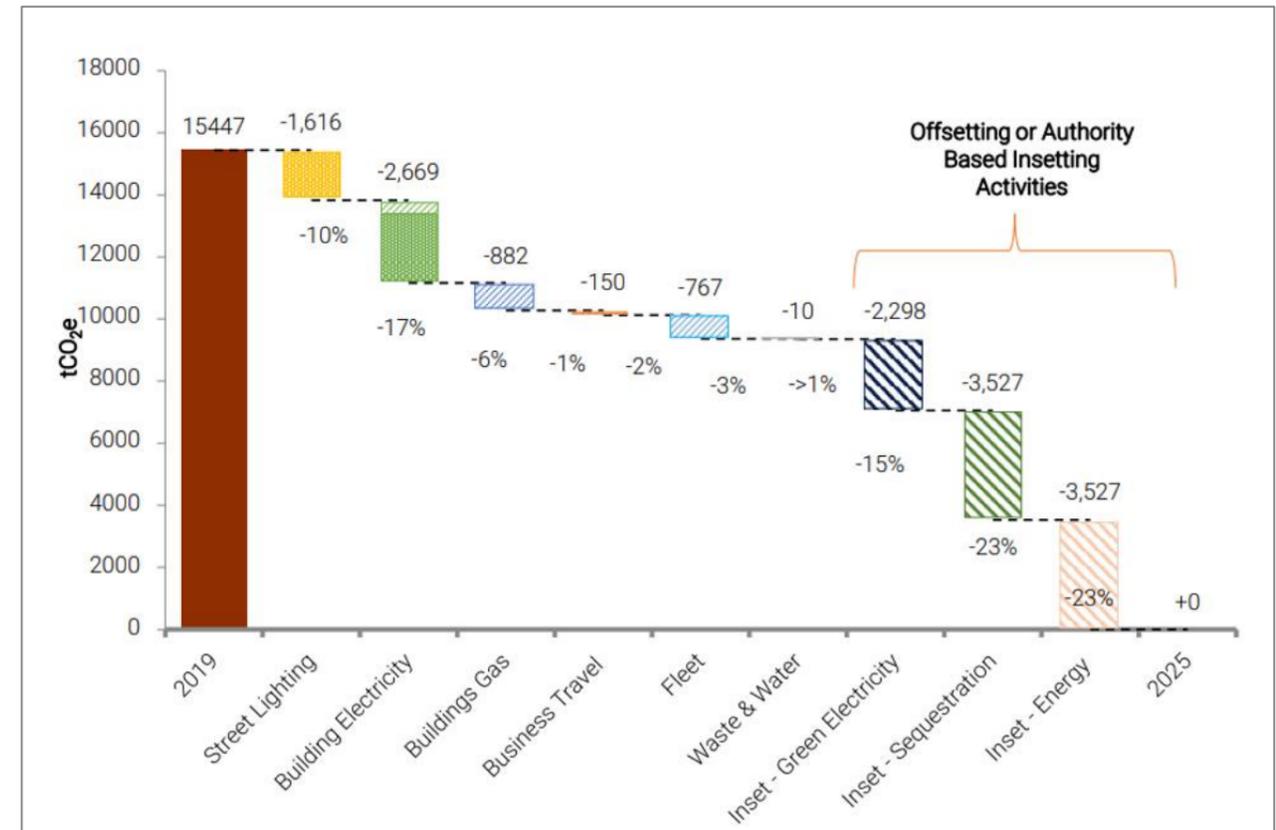


Figure 6-6 2025 Emissions Reduction 'Waterfall' Chart for CEC Direct Emissions¹⁵⁵

As set out within the council's Carbon Neutral Progress Update Report 2023¹⁵⁶, progress towards reducing emissions from the council's business travel and fleet has been made from a 2019 baseline. This is set out in Table 6-2, which indicates that between 2019 and 2027, the council set a CO₂ reduction target of 25% for business travel and 30% for fleet. The current reduction achieved for business travel is ahead of target at 55% and broadly on target to meet the 2027 goal for fleet at 14% making progress towards the 30% target.

Table 6-2 CO₂ reductions from council business travel and fleet between 2019 and 2023¹⁵⁶

	Business Travel	Fleet
2019 Baseline CO ₂	100%	100%
2027 Target CO ₂ reduction	25%	30%
Current reduction achieved	55%	14%

¹⁵⁴ UK local authority greenhouse gas emissions estimates 2022

¹⁵⁵ Cheshire East Council Carbon Neutrality Action Plan 2020-2025 (January 2020)

¹⁵⁶ Cheshire East Council Carbon Neutral Progress Update (February 2023)

6.2.4 Becoming a carbon neutral borough by 2045

In terms of making Cheshire East a carbon neutral borough by 2045, the council's borough-wide Baseline and Carbon Reduction Options report (November 2022), explains that this would not be achievable solely by the council, and that a high degree of partnership approach utilising existing and new regional and local sector groups will be required. The council will need to mobilise a significant coalition of partners to achieve the scale of behavioural change and project delivery for Cheshire East to reach its target as set out in Table 6-3 which is a non-exhaustive list of the different stakeholders required to mobilise to achieve the ambitious action required to meet the borough's 2045 target.

Table 6-3 Stakeholders required to meet targets

Stakeholder group	Networks within Cheshire East
Local government	Cheshire East Council, town and parish councils
Businesses	Chamber of Commerce, Local Enterprise Partnership, Cheshire Leaders Forum, NFU, transport operators, vehicle manufacturers, transport infrastructure providers and operators (e.g. EV chargepoints)
Third Sector	Housing providers, public health, education sector
Residents	Community action groups, local branches of environmental organisations
National government	Members of Parliament

However, the council can begin to reduce emissions from transport by:

Reducing the demand for energy:

- Using the planning and development process to reduce travel distances and incentivise active travel;
- Encouraging and actively supporting modal shift away from private vehicle use by improving public transport and active travel; and
- Promoting initiatives such as Liftshare – A vehicle sharing scheme which connects passengers and drivers travelling similar routes into a single vehicle splitting the cost and environmental implications.

Encouraging low carbon fuels:

- Encouraging the switch to electric vehicles by improving the charging network; and
- Reducing emissions from freight.

It is crucial that these elements are considered in the forthcoming LTP strategy.

6.2.5 Network resilience

Climate change is already creating risks for transport infrastructure. Extreme weather events such as major storms, heavy precipitation, flooding, and heatwaves can cause damage and disruption and are likely become more frequent. Thus, there is a need to ensure the borough's transport infrastructure is adapted to be resilient to climate change to reduce the impacts of extreme weather events on the transport network.

The Climate Change Adaptation and Transport Infrastructure report (2022) commissioned by the Department for Transport (DfT) identifies several ways in which the weather can cause damage and disruption to transport infrastructure:

- Drainage systems can be overwhelmed, which can lead to roads being inundated;
- When road surfaces are waterlogged for a prolonged time, asphalt can become weakened, leading to potholes and faults;
- Scour – the erosion of soil or rock at the foundation of a structure – is the main cause of bridge failure in the UK;
- Earthworks, such as slopes and embankments, can fail when the ground is saturated by water;
- High temperatures can result in expansion (which can lead to cracking), bleeding (when a thin film of asphalt appears on the road surface making it slippery) and rutting (when vehicles create depressions or grooves in the softer road surface);
- High temperatures may increase the frequency of droughts, which can cause drying of soil and plants, leading to earthwork problems;
- Extreme heat can lead to rail track bucking possibly resulting in derailment, speed restrictions and delays;
- High temperatures can also lead to point failures on the railway;
- High winds can also cause damage and danger by blowing trees or branches onto roads and railway lines; and
- Rising temperatures can expose public transport users waiting at bus stops and railway stations to unsafe thermal conditions which can lead to heat-related illness.

It should also be noted that extreme and adverse weather events cause disruption to people travelling and using the transport network. This impacts on day to day lives and the economy.

The highways network in Cheshire East is an asset with a replacement cost of over £5.5 billion¹⁵⁷, Cheshire East Highways maintain:

- 2,700 kilometres (km) of highway;
- 1,900km of pedestrian footways;
- 1,700 bridges and structures; and
- 600km of cycle routes.

Given the significance of flooding on UK roads it will be important to review drainage capacity and the use of vegetation to absorb water runoff. The frequency of road surface inspections for heat and water damage will also need to be reviewed and also the identification of 'hotspots' and critical routes that would cause disproportionate disruption if they were flooded or otherwise made impassable.

Furthermore, the 2014 Transport Resilience Review recommended that local highway authorities identify roads that are a priority in terms of ensuring resilience to extreme weather events. These roads would constitute the "resilient network". To create this network, key businesses, interest groups and the community should be engaged to help identify crucial routes. A record of repeat events, such as flooding, would be kept informing action and for future reference.

¹⁵⁷ Local Transport Plan (cheshireeast.gov.uk)

6.2.6 Extreme Weather Events

Figure 6-7 shows the number of residential properties in Cheshire East that are located in Flood Zone 3, which is the number of properties at risk from the one in 100-year fluvial flood event. In Cheshire East, 1,800 residential properties have been identified to be within Flood Risk Zone 3, with the most properties being located in Congleton (223 properties), Crewe (176 properties) and Alsager (173 properties).

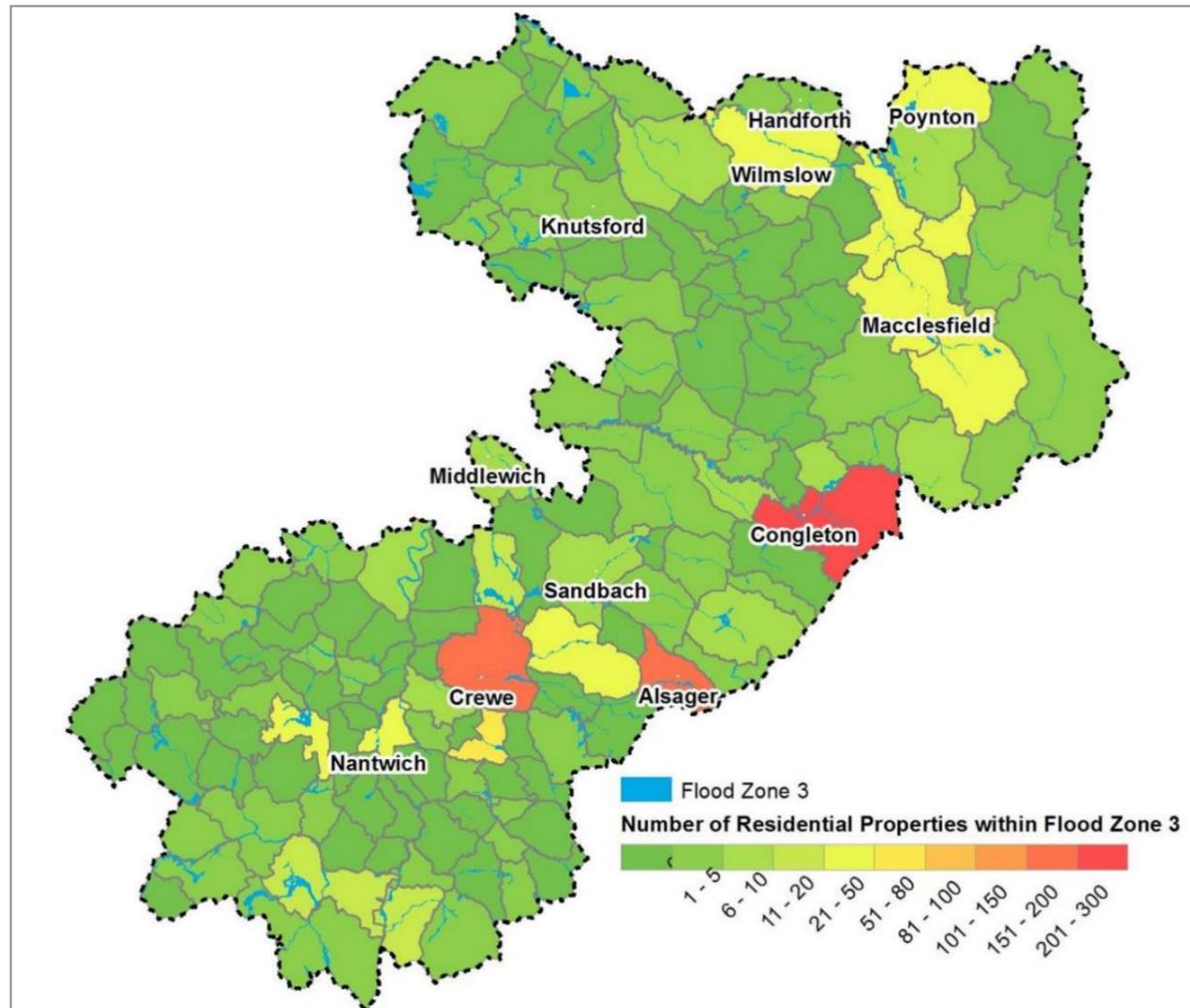


Figure 6-7 Residential properties within Flood Risk Zone 3¹⁵⁸

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A Preliminary flood risk assessment was created in 2011 by Cheshire East Council¹⁵⁹ and an addendum by was carried out in 2017 to update this report¹⁶⁰. Between 2011 and 2017, there have been 264 internal flood incidents recorded across the lead local flood authority (LLFA). Table 6-5 shows that Macclesfield and Crewe both have the highest number of flood incidents, with 47 in Macclesfield and 34 in Crewe. Out of all of the locations in Table 6-5, Scholar

Green and High Legh have the lowest numbers of flood incidents between 2011 and 2017. In 2024, CEC completed the latest Level 1 Strategic Flood Risk Assessment, this highlights the main areas at risk of flooding from rivers and associated watercourses¹⁶¹, these are shown in Table 6-4.

Table 6-4: Main areas at risk of flooding from rivers and associated watercourses

Priority Area	Watercourse
Congleton	River Dane
Little Bollington	River Bollin; Birkin Brook
Poynton	Poynton Brook
Bollington	River Dean
Crewe	River Wheelock
Church Minshull	River Weaver
Nantwich	River Weaver
Wybunbury	Wybunbury Brook

Table 6-5 Number of internal flood incidents post 2011 by town (CEC Preliminary Flood Risk Assessment, 2017)

Location	Number of flood incidents post 2011
Macclesfield	47
Crewe	34
Nantwich	34
Poynton	26
Wilmslow	25
Knutsford	17
Congleton	12
Bollington	11
Sandbach	10
Middlewich	9
Handforth	6
Disley	5
Alsager	4
Alderley Edge	4
Mere	4
Prestbury	4
Audlem	3
Wildboarclough	2
Mow Cop	2

¹⁵⁸ Figures subject to change following NAFRA2 in 2025

¹⁵⁹ CEC Preliminary Flood Risk Assessment 2011

¹⁶⁰ CEC Preliminary Flood Risk Assessment 2017

¹⁶¹ Cheshire East Level 1 Strategic Flood Risk Assessment

Location	Number of flood incidents post 2011
Aston	1
Brereton	1
Road Heath	1
Scholar Green	1
High Legh	1

Since 2011, there have been 5 flooding events resulting in a section 19 investigation these are as listed in the above table, these events were caused by prolonged rainfall, however the details for each of these can be found within their section 19 reports published on the CEC website,¹⁶² with the exception of Storm Henk which will be made available as soon as possible. One of the flooding events occurred in Poynton, and it took place between the 11th and 13th June 2016. This event was caused by prolonged and heavy rainfall which exceeded the capacity of the surface water drainage system and high-water levels in the local watercourses. This resulted in 117 residential properties being affected and many businesses affected. As a result of the flood, nine road closures were recorded and landslides resulting from heavy rain closed the railway line in Poynton.

As a result of different flooding affects, there can be multiple impacts created to the transport system within Cheshire East:

- Flood water can cause damage to roads and railways as they may become submerged, closed or unsafe for travel due to floodwaters;
- During flooding events, travel for passengers, goods and services can be disrupted. This may mean individuals daily lives and journeys are impacted meaning they cannot access work or school;
- Due to a reduction in productivity as a result of goods and services being delayed, businesses may suffer financial losses due to transportation disruptions caused by floods.

As a result of climate change, flooding events are becoming increasingly more frequent and extreme, due to more intense precipitation. As a result, the impacts listed above are to become more significant, therefore transportation in Cheshire East needs to be resilient to withstand flood impacts and ensure that infrastructure can recover quickly after floods to maintain connectivity and minimise economic losses for the borough.

Furthermore, as described by the Met Office¹⁶³, extreme weather events such as heavy precipitation, flooding and heatwaves and are likely to become more frequent and intense due to climate change. UK winters are projected to become warmer and wetter, and summers are to become hotter and more likely drier. By 2050, heatwaves like that seen in 2018 are expected to happen every other year. However, this is likely to cause little change to the risk of drought in the country. Most studies by the Met Office point to a general increase in the frequency and length of meteorological droughts in the UK which is based on the degree of dryness or rainfall deficit and the length of the dry period. Despite the warming climate, severely cold winters are still likely to occur just on a less often frequency. In Cheshire east specifically, the region experienced an estimated 49% increase in rainfall between April 2023 and March 2024. This has led to a 73% increase in service requests and gullies becoming full more often which will inevitably have more of an impact on the network¹⁶⁴.

These changes are likely to impact transport considerably, for example the heatwave in 2022, which led to temperatures above 40 degrees Celsius caused many rail services across the country to stop running and speed restrictions were imposed to avoid track buckling¹⁶⁵. Roads across the country also began to melt, which caused closures¹⁶⁶.

6.3 Quantified Carbon Reduction (QCR)

As set out within the Government's Transport Decarbonisation Plan, making quantifiable carbon reductions is fundamental to LTPs that should explain how carbon reductions will be delivered in the local area.

TfN have developed a Quantified Carbon Reduction (QCR) tool to help partners integrate quantified carbon reduction into LTPs. TfN's QCR dashboard "provides every local authority within the Transport for the North area, with a carbon baseline from cars, LGVs and HGVs which can be disaggregated to understand where those emissions come from (e.g. by vehicle type, fuel type or time of day). It also provides future user emission forecasts up to 2050". This tool enables an understanding of where baseline emissions are from, and therefore the LTP can target those areas within policy.

The QCR tool outlines six scenarios as shown in Table 6-6 below.

Table 6-6: QCR Scenarios (Source: TfN QCR Tool)

		Fleet Scenario	
		BAU Vehicle Uptake	Accelerated EV Vehicle Uptake
Demand Scenario	CAS Core	SC01 - BAU	SC04 - Accelerated EV
	CAS High	SC02 - BAU High	SC05 - Accelerated EV High
	CAS Low	SC03 - BAU Low	SC06 - Accelerated EV Low

6.3.1 Emissions – all scenarios

Figure 6-8 shows Cheshire East's total emissions by scenario and how this is estimated to change over five yearly increments. These total emissions reflect emissions from car, HGV and LGVs for all fuel types and all trip types. The data behind this graph is shown in Table 6-7. The table and graph show that emissions are expected to decrease under all scenarios which is positive. The emissions decrease at a much faster pace and are substantially lower by 2050 in the accelerated EV scenarios (SC04, SC05 and SC06). This shows that an uptake of EVs can be important in reducing emissions related to cars. However prioritising investment in active travel and other low emission modes of travel is also impact to further lower emissions.

¹⁶² [Flood investigations](#)

¹⁶³ [Met Office Climate Change](#)

¹⁶⁴ [Hydrology Data Explorer Worleston](#)

¹⁶⁵ [Network Rail Red Weather Warning](#)

¹⁶⁶ [BBC News A14 closures](#)

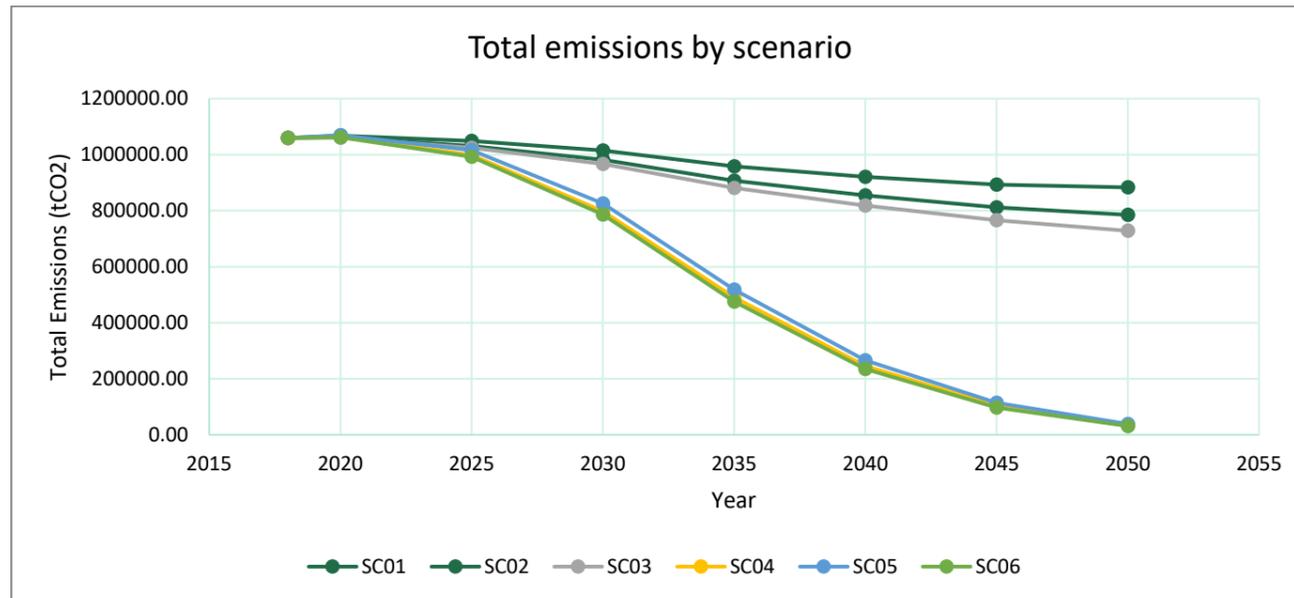


Figure 6-8: Total emissions by scenario (Cheshire East, all trip types, within LAD, all fuel types) (Source: TfN QCR Tool)

Table 6-7: Total emissions by scenario (Cheshire East, all trip types, within LAD, all fuel types) (Source: TfN QCR Tool)

Year	SC01	SC02	SC03	SC04	SC05	SC06
2018	1059963.37	1059963.37	1059963.37	1059963.37	1059963.37	1059963.37
2020	1062873.20	1068134.57	1060693.92	1064356.17	1069617.6	1062177.72
2025	1031711.95	1049161.83	1024680.23	999279.75	1016181.16	992506.41
2030	982166.63	1015428.01	967332.85	798501.89	825748.74	786518.40
2035	906794.11	958827.40	881145.49	490164.70	518860.38	476064.68
2040	854420.34	921499.16	818951.17	246194.07	266039.56	235759.03
2045	811968.96	893608.12	765949.74	103454.42	114330.60	97295.17
2050	785333.12	883428.98	728437.98	34286.28	38863.90	31553.74

Figure 6-9 below shows the cumulative emissions by scenario for Cheshire East. This adds the yearly incremental emissions to show how cumulative emissions compare against a total carbon budget. The data behind this graph is shown in Table 6-8. The table and graph show that the cumulative emissions are higher for the BAU scenarios (SC01, SC02 and SC03) in the region of 7 million. For the accelerated EV scenarios, this is much lower in the region of 5 million. This again shows the importance of EV uptake in relation to reducing emissions.

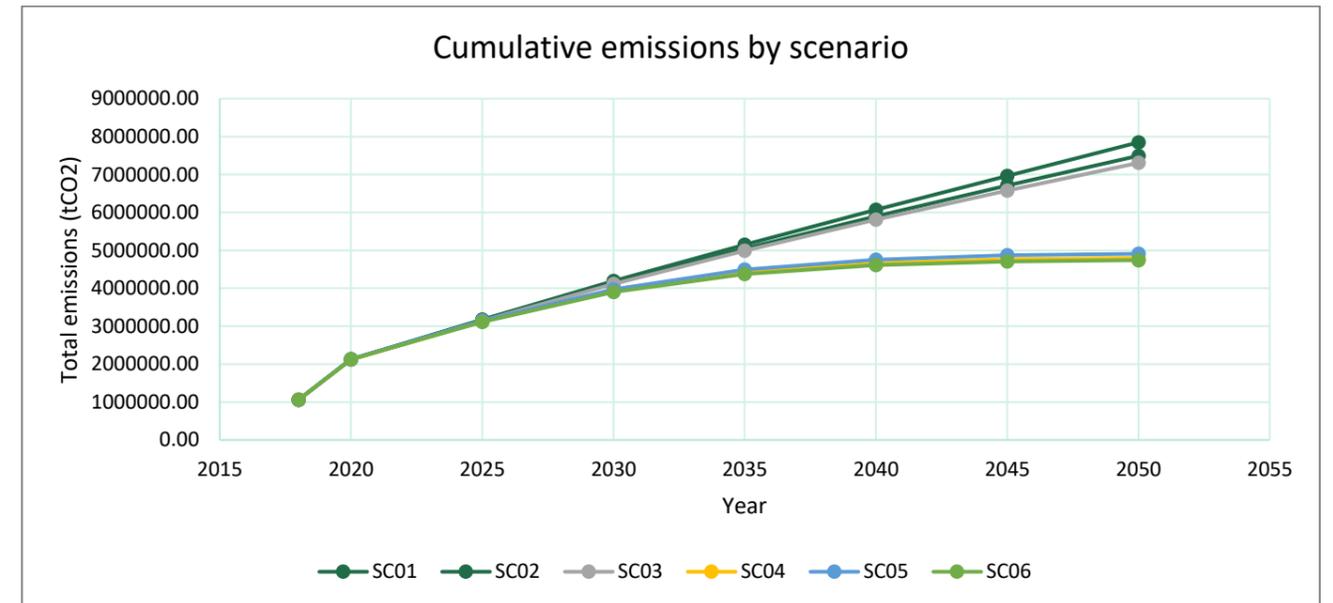


Figure 6-9: Cumulative emissions scenario (CE, all trip types, within LAD, all fuel types, within LAD) (Source: TfN QCR Tool)

Table 6-8: Cumulative emissions scenario (CE, all trip types, within LAD, all fuel types, within LAD) (Source: TfN QCR Tool)

Year	SC01	SC02	SC03	SC04	SC05	SC06
2018	1059963.37	1059963.37	1059963.37	1059963.37	1059963.37	1059963.37
2020	2122836.58	2128097.94	2120657.29	2124319.55	2129580.97	2122141.09
2025	3154548.53	3177259.77	3145337.52	3123599.29	3145762.13	3114647.50
2030	4136715.16	4192687.78	4112670.37	3922101.18	3971510.88	3901165.90
2035	5043509.27	5151515.18	4993815.86	4412265.88	4490371.25	4377230.58
2040	5897929.61	6073014.34	5812767.03	4658459.94	4756410.81	4612989.61
2045	6709898.57	6966622.46	6578716.77	4761914.36	4870741.41	4710284.78
2050	7495231.68	7850051.45	7307154.75	4796200.64	4909604.90	4741838.52

Figure 6-10 shows the average yearly tCO2 emissions per scenario which shows the annual emissions averaged across all years from 2018 to 2050 for each scenario. This figure shows that the average annual emissions are much lower for the accelerated EV scenarios (SC04, SC05 and SC06).

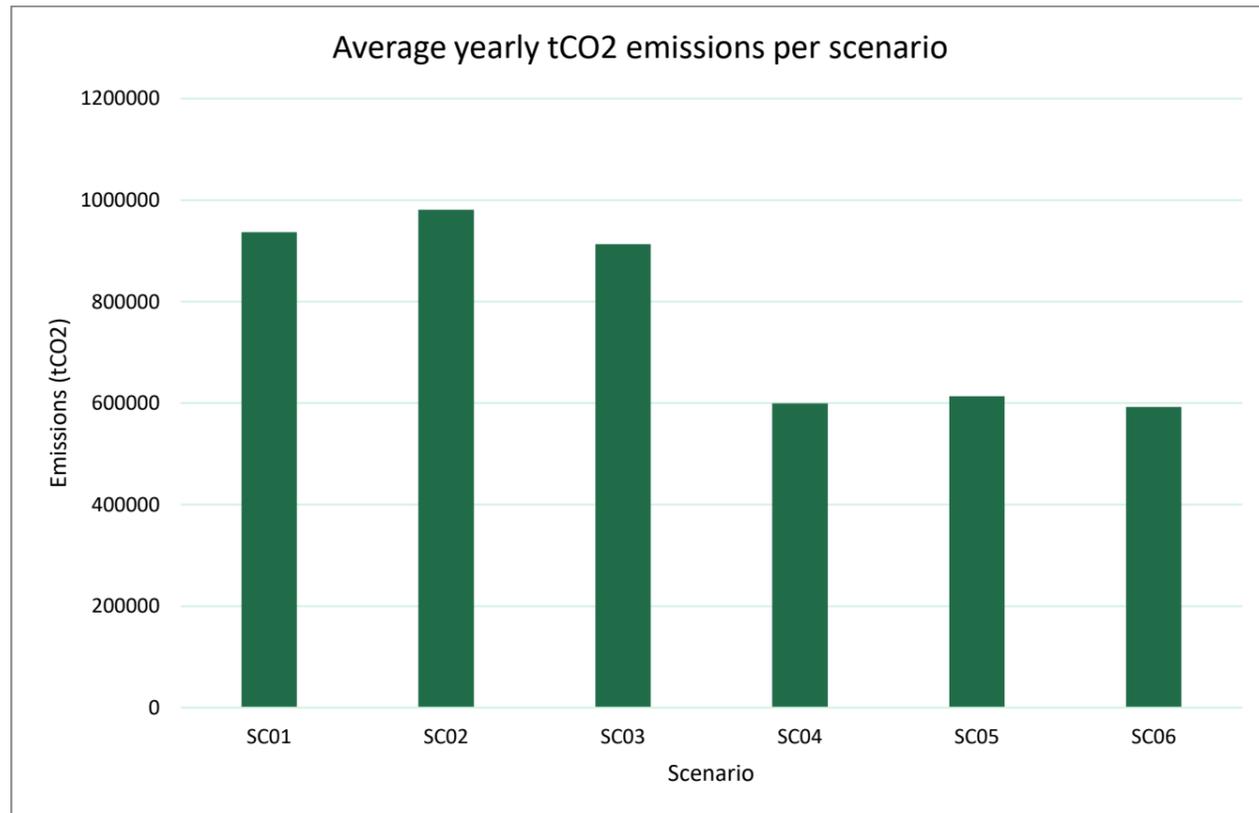


Figure 6-10: Average yearly tCO2 emissions per scenario (CE, all trip types, within LAD, all fuel types) (Source: TfN QCR Tool)

6.3.2 Emissions - by scenario

This element of the QCR tool allows a scenario to be selected to understand the data in more detail. Outputs are presented in terms of actual tCO2 emissions.

6.3.2.1 SC01 - BAU

Figure 6-11 below shows emissions by vehicle type and how these emissions change over time for the BAU scenario SC01. The data behind this graph is shown in Table 6-9. The table and graph show that in this scenario, both car and LGV emissions are expected to decrease. HGV emissions however are expected to increase. The predicted increase of HGV emissions suggests that more should be done to investigate alternative modes such as rail for freight to reduce the carbon footprint of HGVs within the borough, given that there are limited alternatives for ICE HGVs at present.

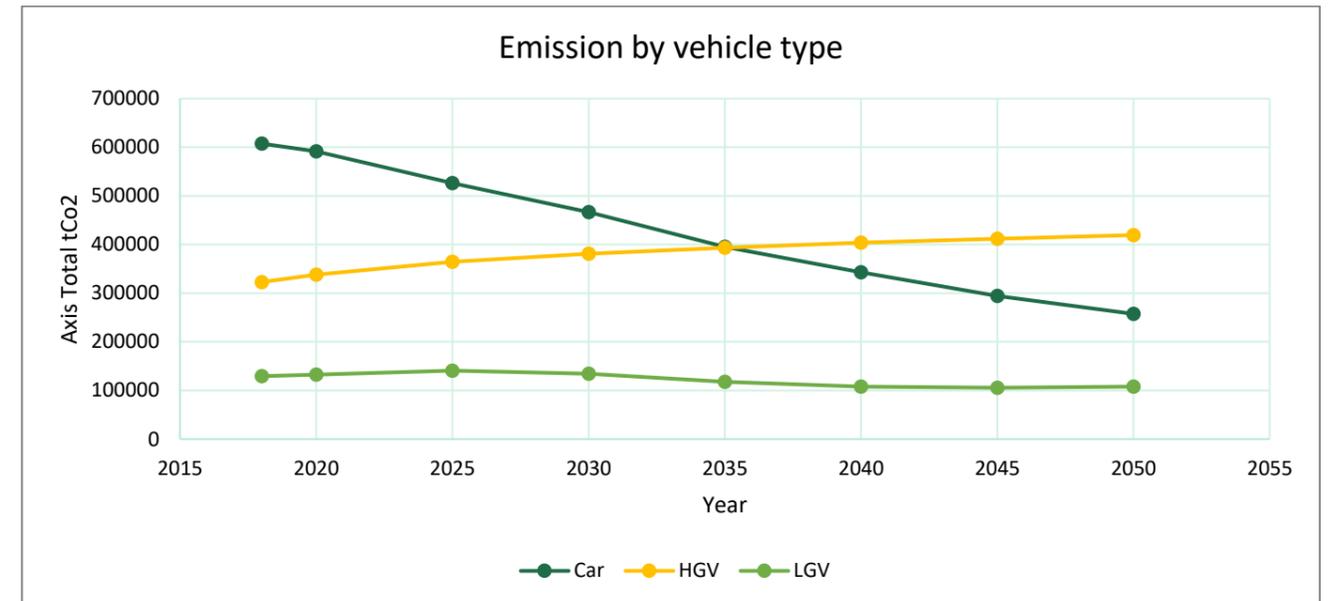


Figure 6-11: Emissions by vehicle type (CE, all fuel types, SC01 BAU, all time periods, all vehicle types, within LAD) (Source: TfN QCR Tool)

Table 6-9: Emissions by vehicle type (CE, all fuel types, SC01 BAU, all time periods, all vehicle types, within LAD) (Source: TfN QCR Tool)

Year	Car	HGV	LGV
2018	607685.52	323032.24	129254.6
2020	591982.59	338271.1	132619.52
2025	526426.11	364468.4	140817.44
2030	466714.47	381205.07	134247.09
2035	395254.37	393680.93	117858.81
2040	342789.06	403919.08	107712.19
2045	294115.37	412176.7	105676.89
2050	257525.67	419607.69	108199.75

Figure 6-12 shows the total number of licensed vehicles by fuel type over time for the BAU scenario SC01. This is useful for understanding the fleet mix across the borough. The table and graph show that a change is anticipated between now and 2050 with hybrid and BEV expecting to increase significantly by 2050. However, it is not expected that BEV will outnumber petrol and diesel vehicles until 2035 and 2045, respectively.

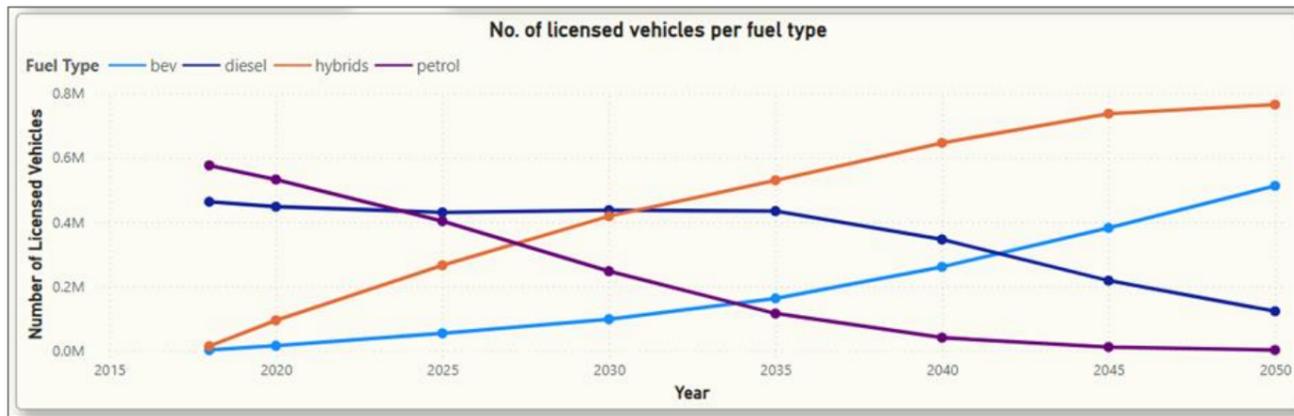


Figure 6-12: No. of licensed vehicles per fuel type (CE, all fuel types, SC01 BAU, all time periods, all vehicle types, within LAD) (Source: TfN QCR Tool)

6.3.2.2 SC04 – Accelerated EV

Figure 6-13 below shows emissions by vehicle type and how these emissions change over time for the accelerated EV scenario SC04. The data behind this graph is shown in Table 6-10. The table and graph above show that in this scenario, all vehicle type emissions are expected to decrease significantly by 2050, suggesting that this accelerated EV uptake scenario will significantly reduce vehicle emissions across the borough. Emissions are expected to be lower than in the BAU scenario SC01 as set out in Figure 6-11.

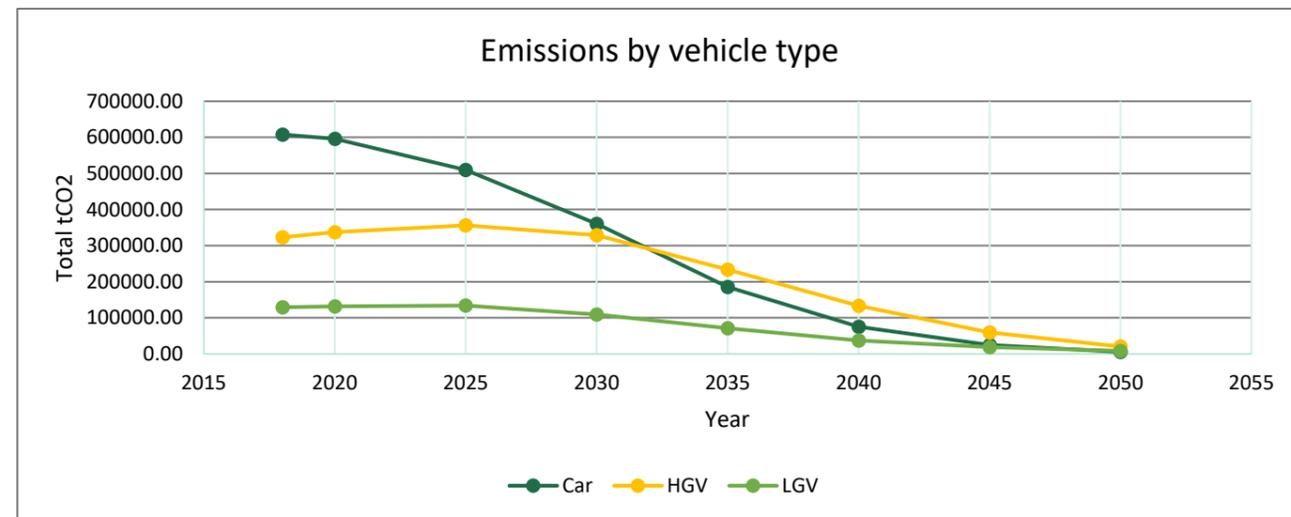


Figure 6-13: Emissions by vehicle type (CE, all fuel types, SC04 accelerated EV, all time periods, all vehicle types, within LAD) (Source: TfN QCR Tool)

Table 6-10: Emissions by vehicle type (CE, all fuel types, SC04 accelerated EV, all time periods, all vehicle types, within LAD) (Source: TfN QCR Tool)

Year	Car	HGV	LGV
2018	607685.52	323032.24	129245.60
2020	595896.46	337133.04	131326.68
2025	509325.74	356051.33	133902.68
2030	360743.42	328642.21	109116.26

Year	Car	HGV	LGV
2035	185222.55	233715.90	71266.25
2040	75463.73	133460.16	37270.18
2045	24773.61	59497.72	19183.09
2050	5569.34	20220.39	8496.55

Figure 6-14 shows the total number of licensed vehicles by fuel type over time for the accelerated EV scenario SC04. This is useful for understanding the fleet mix across the borough. The table and graph show that a change is anticipated between now and 2050 with BEV expecting to increase significantly by 2050. It is expected that BEV will outnumber all other fuel types by 2030. In comparison to the BAU scenario as shown in Figure 6-12, BEV has a much higher number of licensed vehicles.

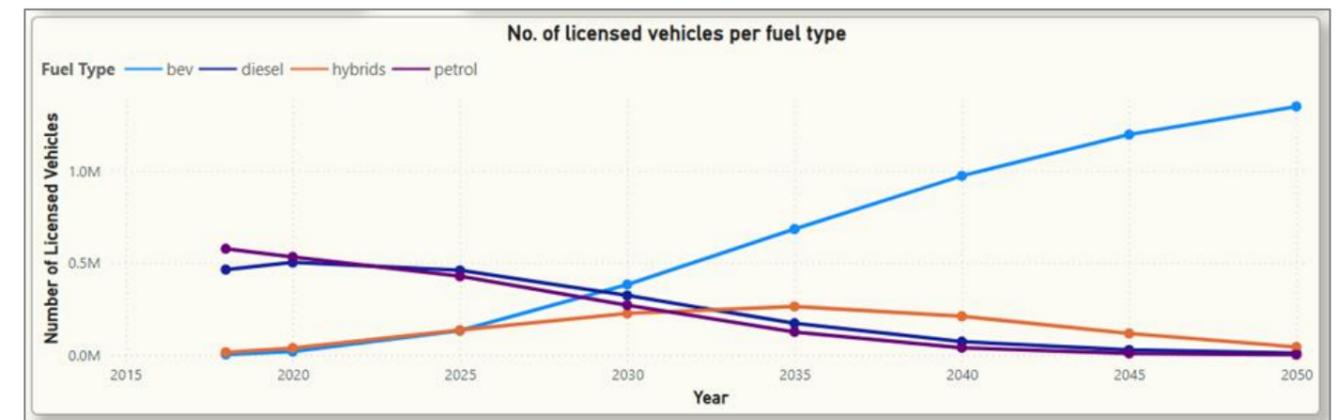


Figure 6-14: No. of licensed vehicles per fuel type (CE, all fuel types, SC04 accelerated EV, all time periods, all vehicle types, within LAD) (Source: TfN QCR Tool)

6.3.3 Vehicle kilometres – all scenarios

Figure 6-15 below shows the total vehicle kilometres travelled within Cheshire East for BEVs for each of the six scenarios (as set out in Table 6-6) until 2050. The figure shows that vehicle kilometres increase for BEVs for all scenarios. The largest increases occur until scenarios SC04, SC05 and SC06.

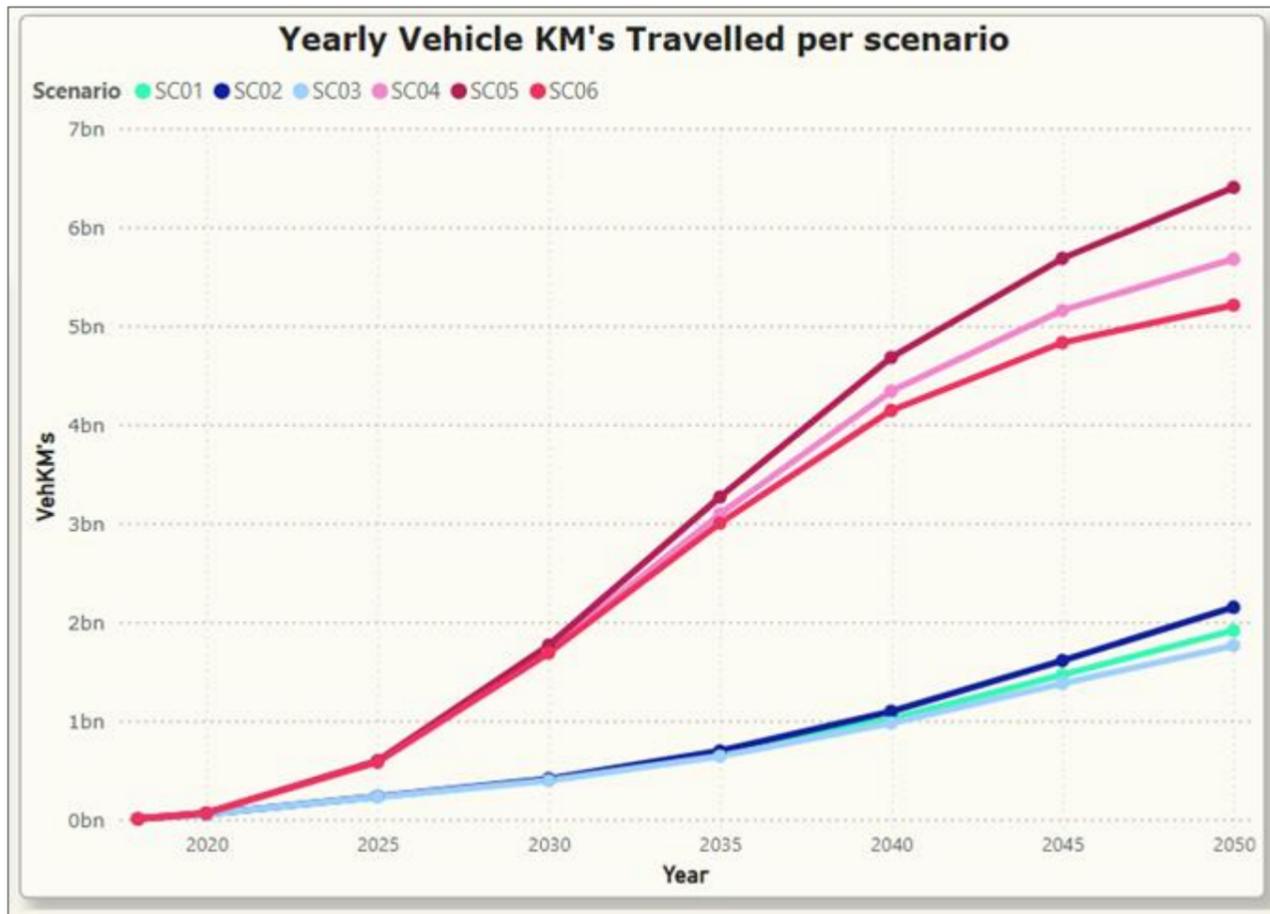


Figure 6-15: Yearly Vehicle KM's by Scenario (CE, BEV, all trip types, within LAD) (Source: TfN QCR Tool)

Figure 6-16 below shows the total vehicle kilometres travelled within Cheshire East for hybrid vehicles for each of the six scenarios (as set out in Table 6-6) over time. The figure shows that vehicle kilometres increase under scenarios SC01, SC02 and SC03. Under scenarios SC04, SC05 and SC06 hybrids increase and peak in 2035, before decreasing towards 2050.

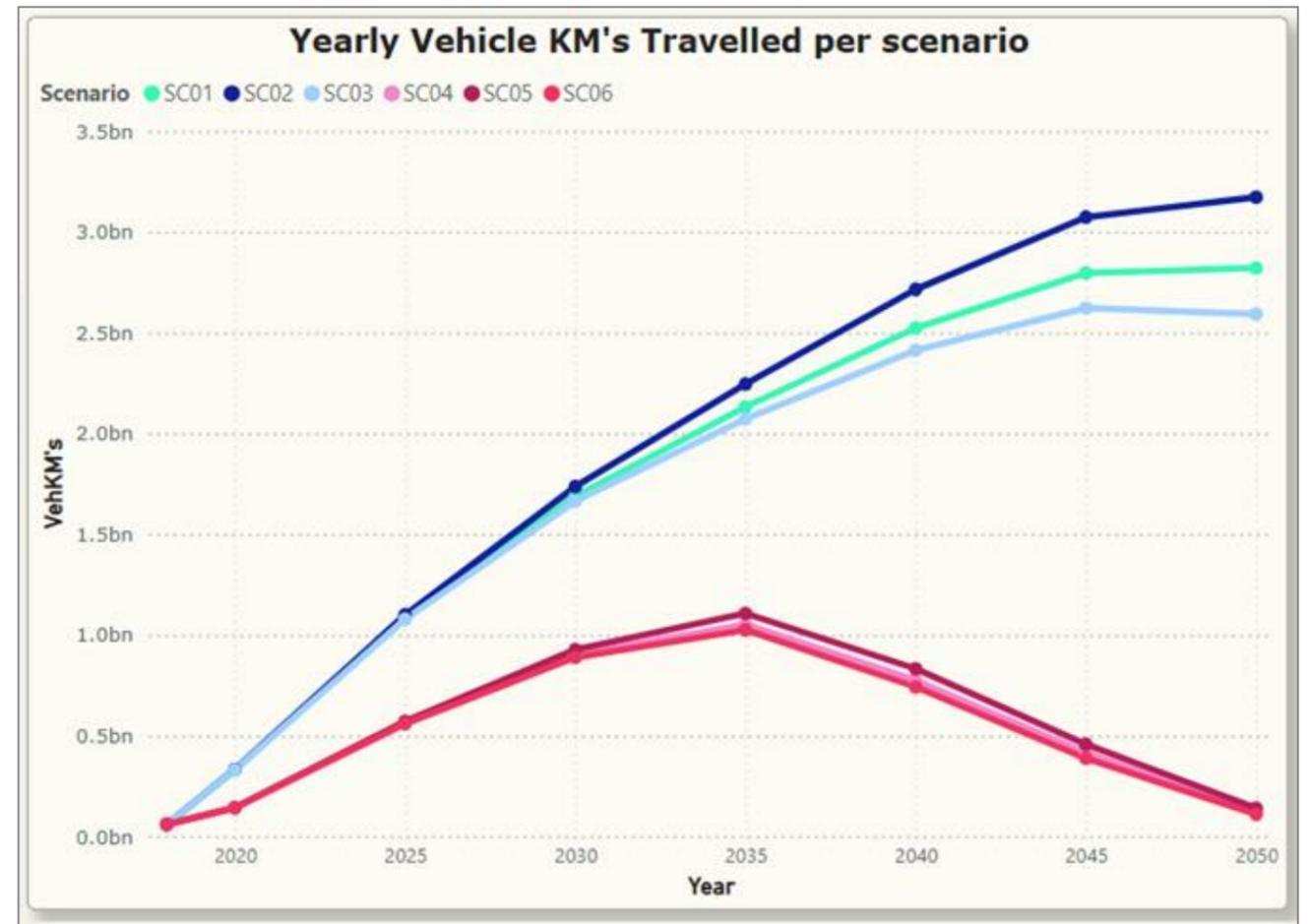


Figure 6-16: Yearly Vehicle KM's by Scenario (CE, hybrid, all trip types, within LAD) (Source: TfN QCR Tool)

Figure 6-17 shows the total vehicle kilometres travelled within Cheshire East for diesel vehicles for each of the six scenarios (as set out in Table 6-6) over time. The figure shows that vehicle kilometres decrease in the long term across all scenarios as time progresses. Diesel vehicle kilometres decrease at a faster rate under scenarios SC04, SC05 and SC06 (accelerated EV scenarios).

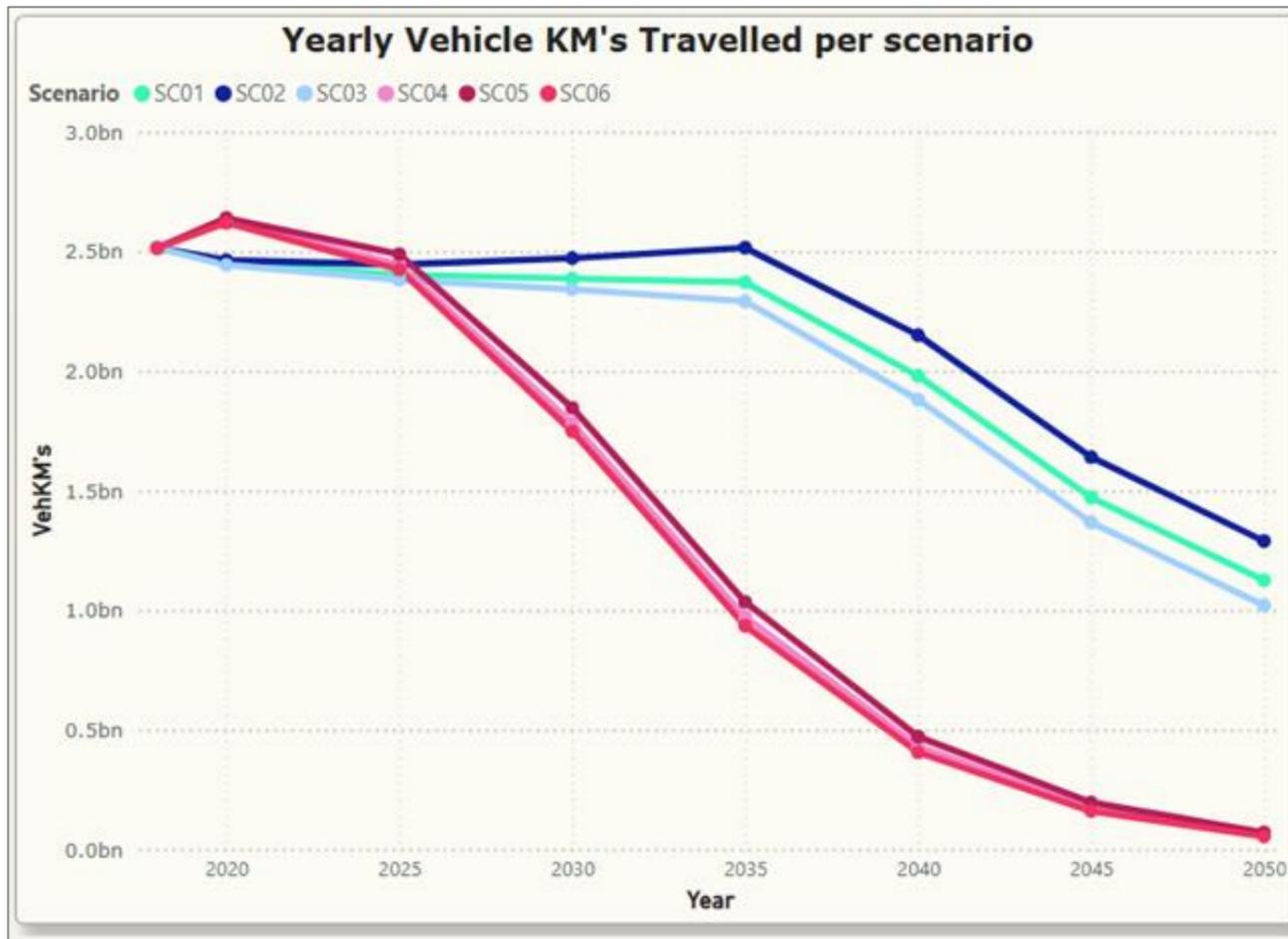


Figure 6-17: Yearly Vehicle KM's by Scenario (CE, diesel, all trip types, within LAD) (Source: TfN QCR Tool)

Figure 6-18 below shows the total vehicle kilometres travelled within Cheshire East for petrol vehicles for each of the six scenarios (as set out in Table 6-6) over time. The figure shows that vehicle kilometres decline in all scenarios over time. The decline is more gradual in comparison with diesel vehicles as shown in Figure 6-17.

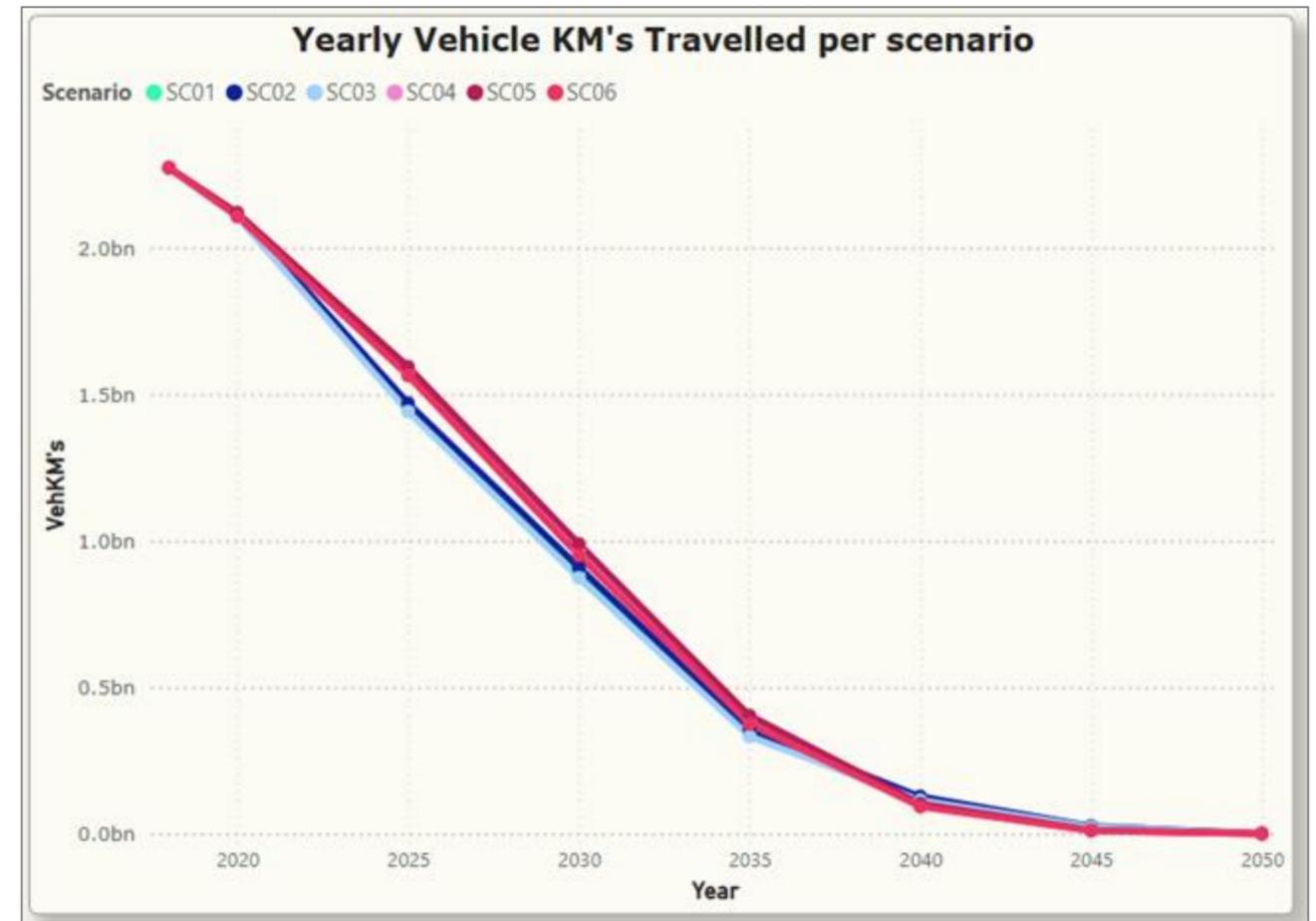


Figure 6-18: Yearly Vehicle KM's by Scenario (CE, petrol, all trip types, within LAD) (Source: TfN QCR Tool)

The figures above suggest that there is a range of realities that could occur in terms of the make-up of fuel types across the borough to 2050, which will impact emissions within the borough.

6.3.4 Vehicle kilometres – by scenario

This element of the QCR dashboard allows selection of a scenario and to analyse the vehicle mileage data in more detail. It also gives the total Veh-kms.

Table 6-11 below shows the total vehicle kilometres travelled across the SC01 (BAU) and SC04 (accelerated EV) scenarios, across various time periods.

Table 6-11: Total Veh-kms (All fuel types, all time periods, all vehicle types) (Source: TfN QCR Tool)

Scenario	Year	Total Veh Kms
SC01-BAU / SC04-Acc. EV	2020	10.20bn
SC01-BAU / SC04-Acc. EV	2030	11.05bn
SC01-BAU / SC04-Acc. EV	2040	11.62bn
SC01-BAU / SC04-Acc. EV	2050	12.07bn

Table 6-11 shows that the total vehicle kilometres travelled in the borough is expected to increase going forward. However, this is not anticipated to be different across the two scenarios shown. This increase in vehicle kilometres travelled places an importance on ensuring a shift to EVs which are a cleaner way of travelling by car in addition to promoting alternative modes of travel such as public transport and walking, wheeling and cycling.

The Vehicle KM's Travelled by Vehicle Type chart both in Figure 6-19 and Figure 6-20 shows the total vehicle kilometres travelled by different vehicle types for years 2020 and 2050 respectively.

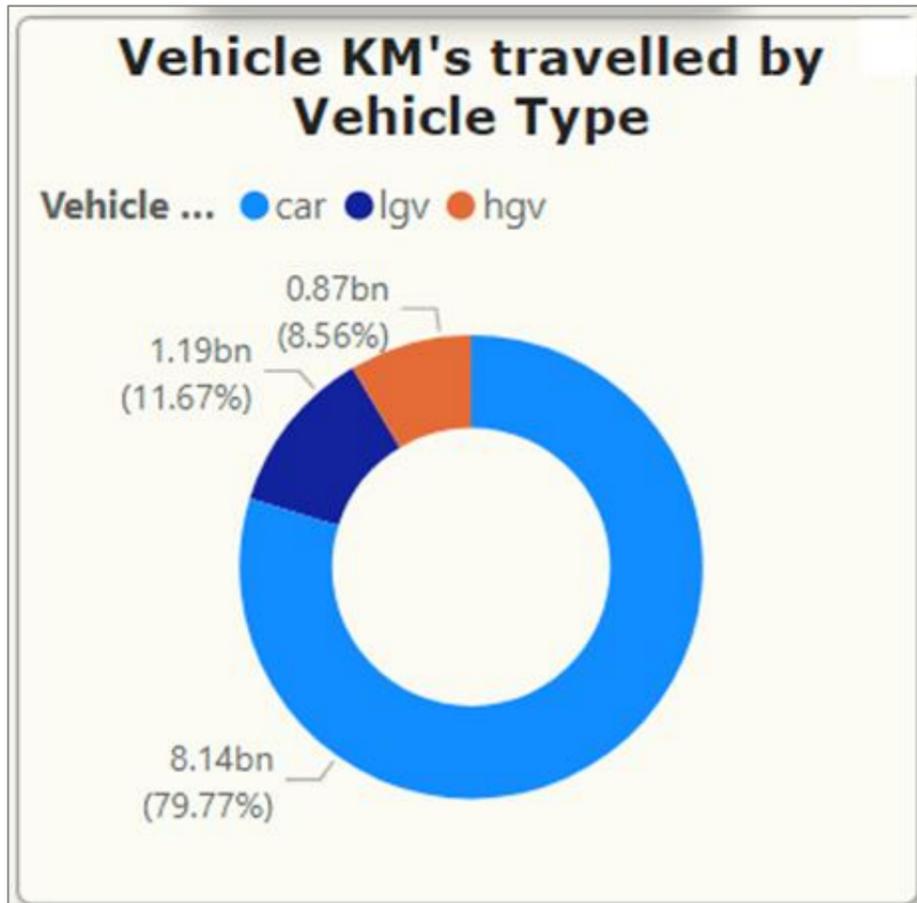


Figure 6-19: BAU & Acc EV, 2020 (Source: TfN QCR Tool)

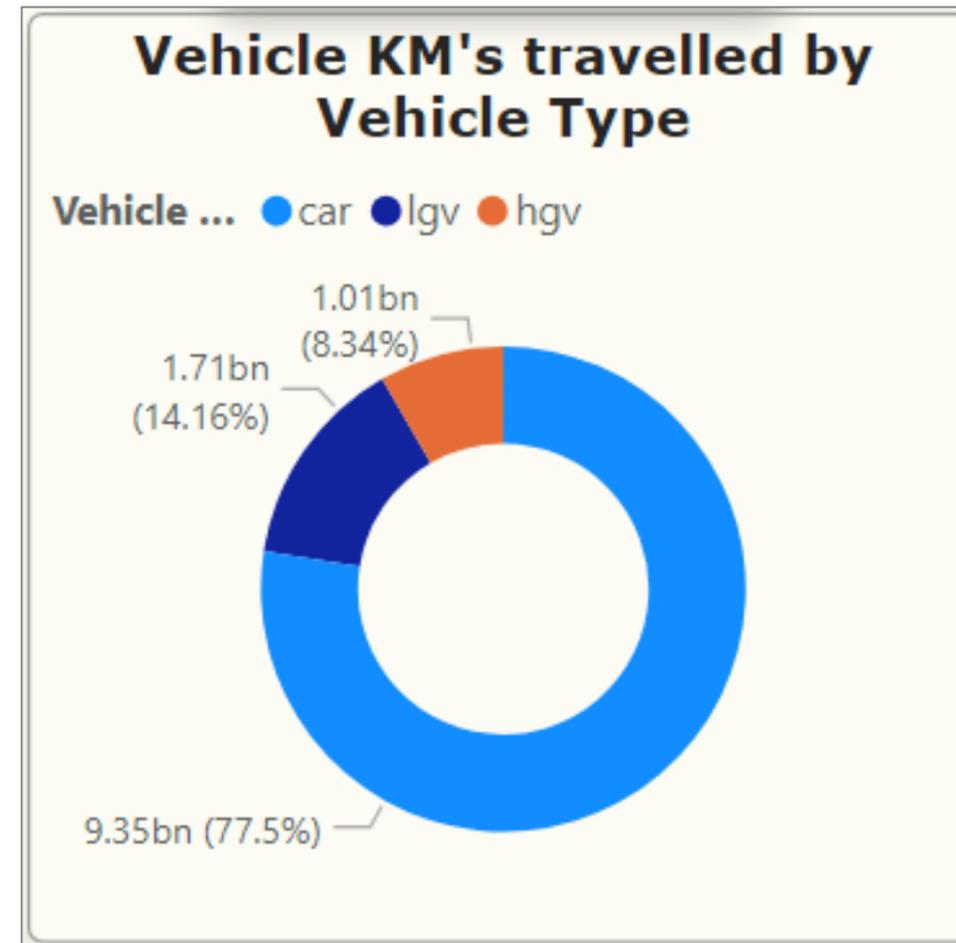


Figure 6-20: BAU & Acc EV, 2050 (Source: TfN QCR Tool)

Figure 6-19 and Figure 6-20 above shows that across both years, the vehicle type is similar as a percentage of vehicle kilometres travelled. Car makes up a large proportion of vehicle kilometres travelled (almost 80%), HGV (approximately 8.5%) and LGV which has the most change between 2020 and 2050 increasing from 11.5% to 14%. With LGV and HGV accounting for approximately 20% of vehicle kilometres travelled, there is a need to encourage these trips to be made by cleaner vehicles or alternative means.

The Vehicle KM's Travelled by Fuel Type line chart in Figure 6-21 and Figure 6-22 shows the total vehicle kilometres travelled, broken down by vehicles utilising different fuel types for SC01 (BAU) and SC04 (accelerated EV).

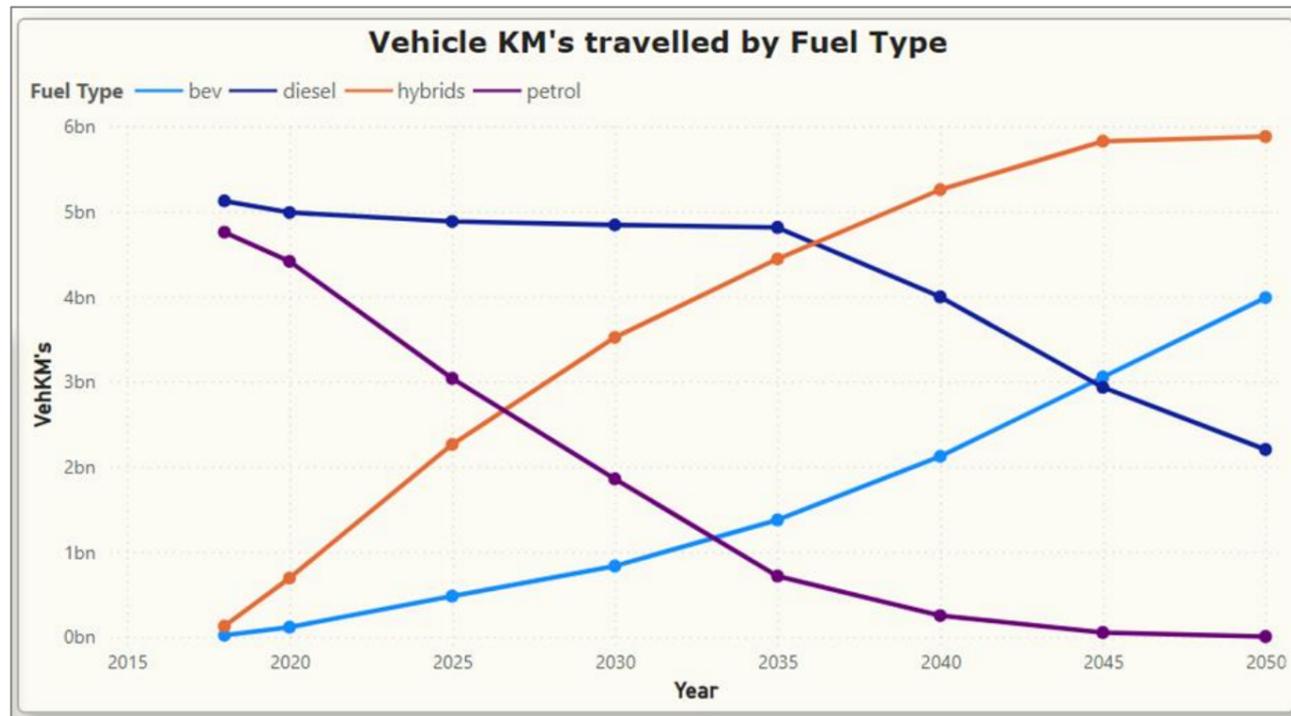


Figure 6-21: Cheshire East,, all fuel types, SC01, all time periods, all vehicle types (Source: TfN QCR Tool)

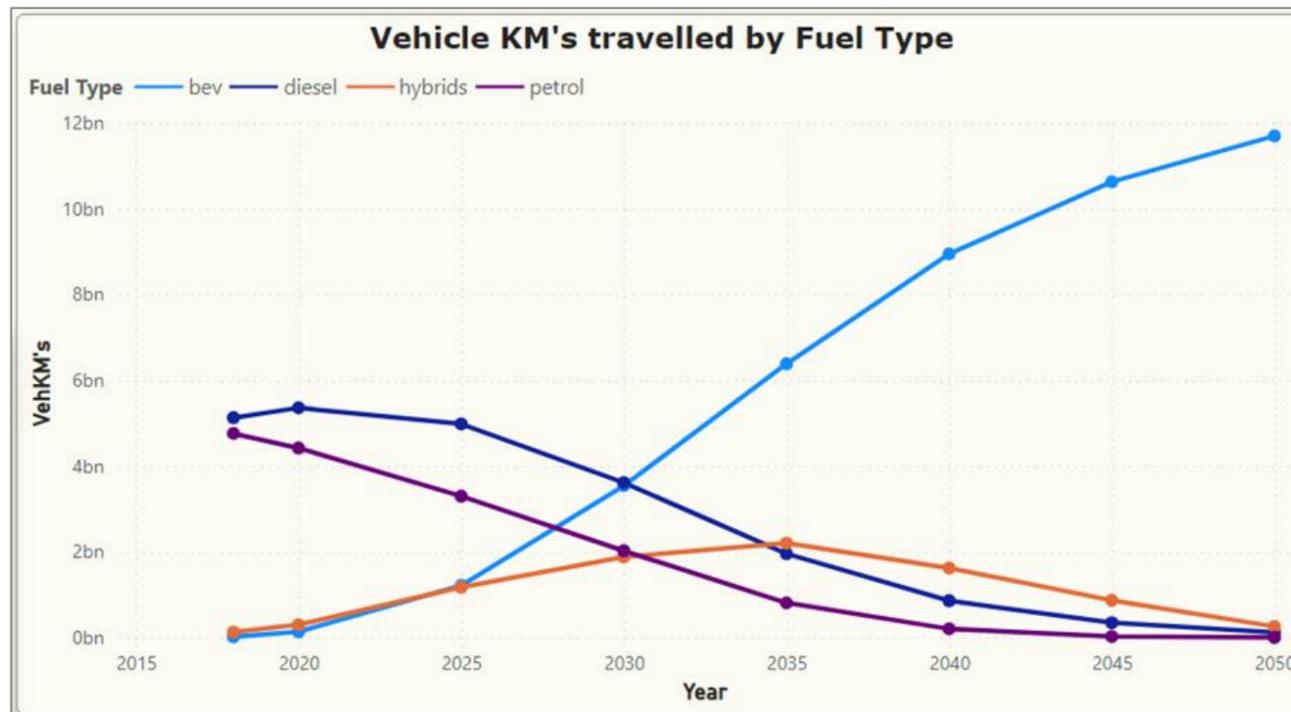


Figure 6-22: Cheshire East, all fuel types, SC04, all time periods, all vehicle types (Source: TfN QCR Tool)

The above figures can help us to understand the mix of mileage by different fuel types over time. For SC01 (BAU) this shows that both diesel and petrol vehicle kilometres are forecast to fall less than half of 2018 levels by 2050 for diesel and for petrol to close to zero. Both BEV and hybrids are anticipated to increase significantly, with hybrids totalling

almost 6 billion vehicle kilometres by 2050 and BEV around 4 billion. Both BEV and hybrid are not expected to be higher than both petrol and diesel vehicles until 2045. For SC04 (accelerated EV), this shows a different picture to SC01 (BAU). Under this scenario, whilst both diesel and petrol are expected to fall to close to zero by 2050, BEV is expected to increase significantly, rising exponentially around 2025 and to makeup a vast majority of vehicle kilometres by 2050 at almost 12 billion. Under this scenario, hybrid vehicles increase and peak by 2035 before decreasing to similar levels to petrol and diesel by 2050. These two scenarios present a very different picture for the make-up of vehicle kilometres travelled across future years, which will significantly impact carbon emissions across the borough.

6.3.5 Total KMs by demand scenario

This data enables an understanding of the breakdown of trip distance for those trips originating from and ending in Cheshire East.

Figure 6-23 shows the number of trips within Cheshire East split by origin and destination, by distance band. The core demand scenario 'SC01/SC04' has been selected for the year 2028 for this graph.

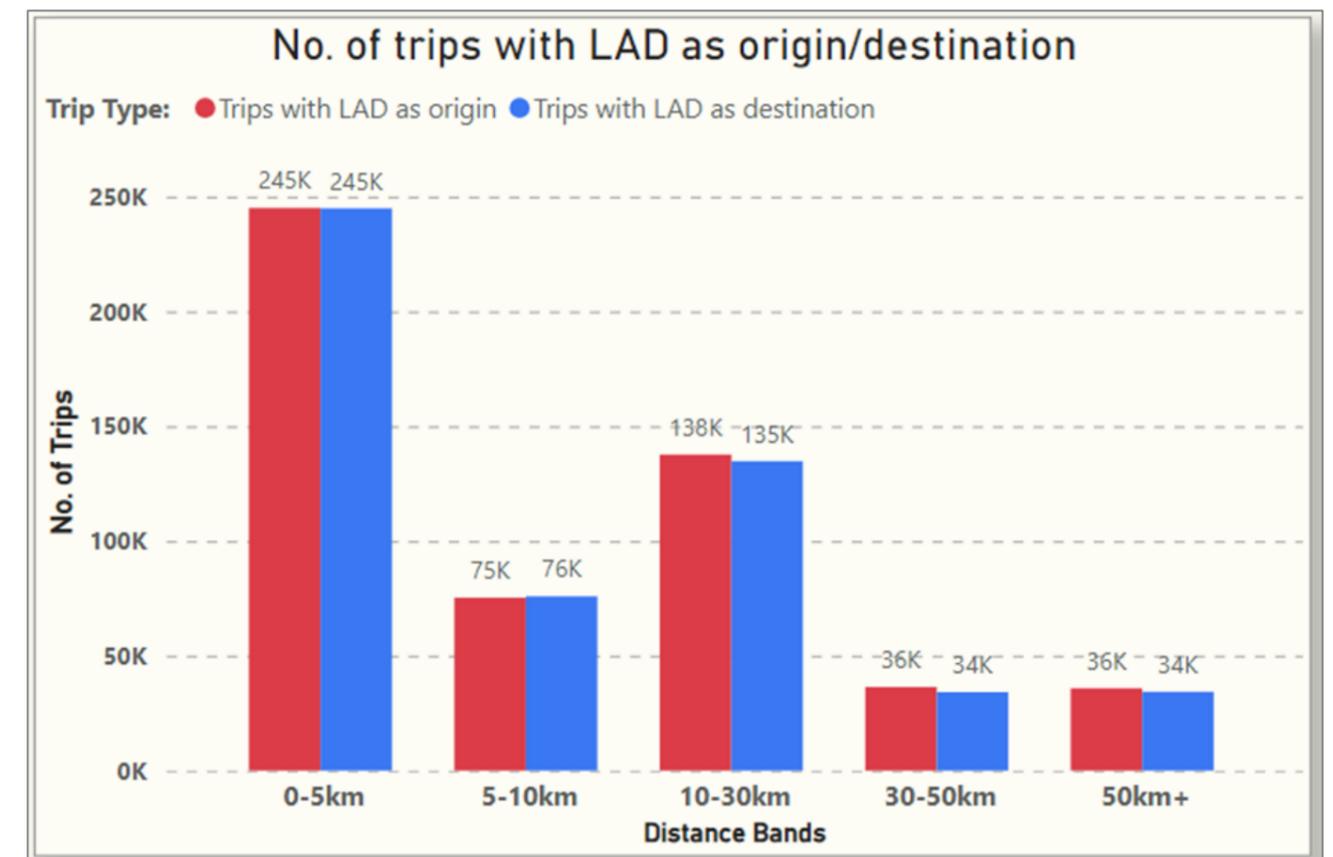


Figure 6-23: Cheshire East, core demand scenario, 2028, all time period and vehicle types (Source: TfN QCR Tool)

Figure 6-23 shows that most trips (both origin and destination) are within the 0-5km category. As this trip length is within a reasonable walk or cycle distance, this suggests that enhancements to the walk and cycle network could be effective in encouraging modal shift to these modes.

6.3.6 Summary and Implications for Policy

As set out in section 6.3, a range of scenarios have very different outcomes for in terms of EV proportions and emissions. It is clear that EV uptake is important to reduce emissions, in particular given vehicle kms travelled is expected to

increase going forward. The transition to EV is very positive and will lead to significant carbon reductions however this in itself will not be sufficient.

In addition to the transition to EV, there is also a need to reduce demand for transport and achieve modal shift to public transport and active travel to further lower emissions, especially in the short-medium term while there are still a high number of ICE vehicles ahead of a full transition to EV. A high proportion of trips to/from Cheshire East are within the 0-5km bracket which suggests that enhancements to the walk and cycle network could be effective in encouraging modal shift to these modes. Modal shift to active travel modes will help to decarbonise and reduce the emissions within Cheshire East further. This could be more applicable to the key service centres and principal towns where populations are concentrated and amenities and job opportunities for example are nearby, whereas this shift could be more difficult in the rural areas.

In addition, as HGV emissions are expected to increase, more should be done to investigate alternative modes such as rail for freight to reduce the carbon footprint of HGVs within the borough.

6.4 Air Quality

6.4.1 Air Quality Management Areas (AQMAs)

The following reports have been produced to understand and address air quality issues and discharge the council's duty under the Environment Act 1995 to review and assess local air quality within the borough, against a set of health-based objectives for a number of specific air pollutants.

- Cheshire East Council Low Emission Strategy March 2018
- Local Air Quality Strategy for Cheshire East Council July 2024;
- Cheshire East Borough Council Air Quality Action Plan 2020-2025 March 2021; and
- 2024 Air Quality Annual Status Report (ASR) June 2024.

Where areas are found where pollutants exceed the objectives, local authorities are required to declare an Air Quality Management Area (AQMA) and to prepare an Air Quality Action Plan (AQAP) setting out the measures they intend to introduce in order to reduce concentrations of air pollutants, in pursuit of achieving the objectives.

The Cheshire East Low Emission Strategy (March 2018) states air quality across Cheshire East is generally good, although there are a number of Air Quality Management Areas (AQMAs) in the borough, which have been declared as a result of exceedances of the annual mean nitrogen dioxide (NO₂) Air Quality Objective (AQO) of 40µgm³.

In 2023 Cheshire East had 12 AQMAs which breach the NO₂ AQO of 40µgm³, see Table 6-12. However, in January 2025, the Council revoked 11 of the AQMAs around the borough to the concentration of nitrogen dioxide being consistently below the national air quality objective. The last AQMA is located along the A6 Market Street Disley, running from the Market Street / Buxton Old Road crossroads in the West, to the Junction with Redhouse Lane in the East

Table 6-12 Declared Air Quality Management Areas¹⁶⁷

AQMA Name	Date of Declaration	Pollutants and Air Quality Objectives	One Line Description	Level of Exceedance: Declaration (µg/m ³)
AQMA West Road, Congleton	01/05/2005	NO ₂ Annual Mean	Between the Wagon and Horses gyratory and the fire station roundabout	61
AQMA A34/A54 Rood Hill, Congleton	01/05/2005	NO ₂ Annual Mean	A short stretch at the Rood Hill A34/A54 traffic lights	60
AQMA Hospital Street, Nantwich	16/12/2006	NO ₂ Annual Mean	A short stretch of the A534 through Nantwich	59
AQMA Lower Heath, Congleton	01/04/2008	NO ₂ Annual Mean	A short stretch of the A34 at Lower Heath	47
AQMA A5022/A534, Sandbach	01/04/2008	NO ₂ Annual Mean	A number of properties around the junction of the A534 and the A5022	47
AQMA A6 Market Street, Disley	01/04/2010	NO ₂ Annual Mean	A stretch of the A6 running from Market Street/Buxton Old Road crossroads in the west, to the junction with Redhouse Lane in the east	62
AQMA A523 London Road, Macclesfield	01/04/2010	NO ₂ Annual Mean	An area from the Mill Lane/Silk Road junction in the north, to a point 65m south of the London Road Terrace junction in the south	43
AQMA Chester Road, Middlewich	01/10/2017	NO ₂ Annual Mean	A stretch of Chester Road in Middlewich	42
AQMA Hibel Road, Macclesfield	01/10/2017	NO ₂ Annual Mean	A short length of Hibel Road, Macclesfield	44
AQMA Broken Cross, Macclesfield	01/10/2017	NO ₂ Annual Mean	An area around Broken Cross Roundabout, Macclesfield	44
AQMA A533 Lewin Street, Middlewich	10/10/2019	NO ₂ Annual Mean	A section of the A533 Lewin Street, Middlewich	41
AQMA A537 Chelford Road, Knutsford	10/10/2019	NO ₂ Annual Mean	A section of the A537 Chelford Road, Knutsford	40

The AQMAs are predominantly located in towns where there is a high volume of traffic, busy junctions and areas of congestion, which result in elevated levels of NO₂.

¹⁶⁷ Cheshire East Borough Council Air Quality Action Plan 2020-2025 March 2021

NO₂ concentration measurements are taken across the borough using both continuous and passive monitoring systems, such as diffusion tubes, the sites are reviewed regularly to make sure that the monitoring is still relevant to sensitive receptor exposure. There are 88 monitoring sites throughout the borough, the site locations can be found here: [Air Quality Monitoring NO₂ Diffusion Tube Data 2024 | Air Quality Monitoring NO₂ Diffusion Tube Data 2024 | Insight Cheshire East \(arcgis.com\)](#).

The council's priorities are to tackle vehicular emissions by applying AQMA targeted measures as well as taking a holistic/integrated approach across Cheshire East. These measures include:

- Development and planning;
- Traffic management;
- Alternative travel;
- Active travel;
- Low emission transportation;
- Transportation;
- Public awareness; and
- Green infrastructure.

Under the Air Quality Action Plan (AQAP) the council has also developed actions under eight broad topics:

- Environmental permits;
- Policy guidance and development control;
- Promoting low emission transport;
- Promoting travel alternatives;
- Public information, awareness and education;
- Transport planning and infrastructure;
- Traffic management; and
- Vehicle fleet efficiency.

6.4.2 Air Quality and development

The population of the borough is forecast to increase as set out within the Our Community section of this evidence base. The council's Local Plan identifies sites for housing, employment, commercial and mixed use. This development in the borough is likely to put future compliance at risk, therefore, integration of the CEC Low Emission Strategy¹⁶⁸ (LES) into the development planning process is an effective mechanism to achieve results.

The LES will be based upon the Avoid; Shift; Improve (ASI) approach for the reduction of emissions and therefore NO₂ concentrations:

- Avoid: reduce vehicle kilometres driven;
- Shift: change mode from cars to public transport, cycling and walking; and
- Improve: improve the vehicle technology to reduce emissions.

If emissions from vehicles do not improve, projected increases in vehicle numbers resulting from the planned developments and housing growth in Cheshire East will result in larger exceedances of the annual mean AQO for NO₂.

Additionally, the council's Local Plan requires all major development proposals that are likely to generate significant additional journeys to be accompanied by a Travel Plan which will address the following requirements:

1. The Travel Plan will need to propose measures that will mitigate the impact of increased trips generated on the highway network;
2. The Travel Plan should propose measures to facilitate and encourage the use of sustainable travel alternatives (such as walking, cycling or public transport use), whilst discouraging single occupancy vehicle travel and parking; and
3. Major developments will be required to monitor the effectiveness of the travel plan and the traffic generated by that development and share data with the Local Authority.

To reduce future reliance on travel by private car, the council's Local Plan Strategy seeks to enable growth through providing a range of sustainably located development sites that are attractive to economic investment. In addition, infrastructure investment is required to support the strategy such as: safe walking routes, high quality cycle routes, electric vehicle charging infrastructure, and developing efficient and accessible public transportation networks. It is vital that the next Local Transport Plan Strategy and next Local Plan are aligned and coordinated to ensure a robust approach to land-use planning and transport planning.

6.4.3 Air Quality and Health

Air pollution is associated with a number of adverse health impacts. It is recognised as a contributing factor in the onset of heart disease and cancer. Additionally, air pollution particularly affects the most vulnerable in society, children and older people and those with heart and lung conditions. Therefore, it is vital for public health that the measures identified by the council to mitigate increasing emissions from development growth succeed. Encouraging modal shift to walking and cycling will not only reduce vehicular traffic, but also improve emissions, reducing air pollution which will have a positive impact on health.

The annual health cost to society of the impacts of particulate matter alone in the UK is estimated to be around £16 billion¹⁶⁹. The council is committed to reducing the exposure of people within Cheshire East to poor air quality in order to improve health.

6.5 Environment

The Cheshire East Council Environment Strategy 2020 – 2024¹⁷⁰ sets out the council's strategic goals and summarises the key strategies and action plans that will ensure the council deliver these goals through service delivery, regulatory activity, projects, and partnerships. It also provides a policy framework for the council to evaluate all emerging strategies, policies, action plans, and projects to consider the environmental and climate change impact and how they can

¹⁶⁸ [CEC Low Emission Strategy 2018](#)

¹⁶⁹ Cheshire East Borough Council Air Quality Action Plan 2020-2025 (March 2012)

¹⁷⁰ Cheshire East Council Environment Strategy 2020-24 (April 2020)

contribute positively to the goals of this strategy. It is designed to ensure that everything the council does should consider the implications on climate change and the natural environment.

The natural environment provides us with multiple benefits including improving air quality, conserving biodiversity, reducing flood risk and capturing carbon. It contributes to our 'Quality of Place' and enables people to enjoy the outdoors contributing to their physical and mental wellbeing and to our economy.

6.5.1 Green Infrastructure Plan

The council has published a Green Infrastructure Plan for 2019 to 2030 (October 2019) which is a road map for a more comprehensive and connected green infrastructure. It is envisaged that the plan will be delivered through collective contributions with the involvement of partners, communities, landowners and developers. The Plan identifies key activities that can be aligned to projects and particular interest groups:

- **Urban greening** – creating and maintaining vibrant, healthy and inspiring places where people want to live and work;
- **Getting outdoors easily** – engaging people and improving community access to, and enjoyment of, green infrastructure for health and wellbeing;
- **Rivers and valleys** – catchment-wide activity to improve water quality, natural flood management, re-naturalisation and tranquil enjoyment of watercourses and waterways;
- **Thriving nature** – creating and safeguarding well-connected networks of habitats;
- **Working alongside major infrastructure** – integrating green infrastructure into major new infrastructure projects and retrofitting green infrastructure alongside existing infrastructure;
- **A distinctive place for culture, heritage and tourism** - enhancing the setting of and access to heritage, landscape and outdoor recreational assets;
- **Environments for business** – creating an attractive and accessible setting for centres of employment and economic activity, both in towns and the countryside; and
- **Farmland and soils** – enabling land management which conserves and restores soil productivity and improves carbon sequestration.

The Plan applies these activities at both a landscape scale in urban fringe and rural areas, and to urban projects in the principal towns and key service centres. This vision for green infrastructure should be integrated into the next Local Transport Plan Strategy.

6.6 Sustainable development

6.6.1 Planning Policy

The Local Plan is the council's plan to manage growth and development over future years. It governs all new development, including the change of use of land, and allocates land for new developments such as housing, employment, retailing, infrastructure and community facilities. The overall growth proposition set out in the Local Plan Strategy, adopted in 2017, is to deliver at least 36,000 new homes and around 31,000 additional jobs by 2030. The objective of the plan is not economic growth at any price; rather it is the sustainable development of Cheshire East.

The National Planning Policy Framework¹⁴ (NPPF) explains that the purpose of the planning system is to contribute to the achievement of sustainable development. Achieving sustainable development means that we must develop both economically and socially, but in a way that contributes to protecting and enhancing our natural, built and historic environment; including making effective use of land, helping to improve biodiversity, using natural resources prudently,

minimising waste and pollution, and mitigating and adapting to climate change, including moving to a low carbon economy.

At the heart of the NPPF and the Cheshire East Local Plan is a presumption in favour of sustainable development. The Local Plan Strategy provides clear guidance on how the presumption in favour of sustainable development will be applied locally.

The Local Plan is in three parts:

1. The Local Plan Strategy (LPS) (adopted July 2017) - provides the overall framework for growth up to 2030 and includes the key strategic policies necessary to achieve sustainable development;
2. The Site Allocations and Development Policies Document (SADPD) (adopted December 2022) - this plan provides further detailed planning policies and site allocations to support the strategic policies and sites contained in the Local Plan Strategy. This includes more detailed policies to manage the impact of new development on the natural environment, climate change mitigation, renewable energy, flood risk management, and natural resources; and
3. The Minerals & Waste Plan (MWDP) - this plan is in preparation. It plans for the extraction and exploitation of earth minerals in all their forms: sand, aggregate, hard rock, salt, coal, shale gas and peat. It also plans for how the sustainable management of waste in the Borough. It covers the period to 2041. Consideration is being given to incorporating planning policies for minerals and waste into a new Local Plan as an alternative to preparing a separate MWP.

The council has resolved to prepare a new Local Plan which would establish the borough's development needs into the 2040s and identify how they would be met whilst meeting key priorities relating to health and wellbeing as well as the environment. Once adopted it would replace the LPS and SADPD along with saved planning policies for minerals and waste.

6.6.2 Development Management

The delivery of sustainable development is central to the determination of planning applications ensuring that planning application decisions for new developments are plan led and take proper account of national planning policy. Through the application of local and national planning policies, new developments are required to have regard to key environmental factors such as air quality, access to sustainable transport, and protection and enhancement of the natural and built environment.

New development has the potential to affect air quality. Air quality is one of the material planning considerations considered as part of the planning decision making process. Air Quality Impact Assessments may be required before an application can be determined. Cheshire East Council has produced an [Air quality developers guide 2024 \(PDF, 260KB\)](#) to aid developers through the development process.

Developers are advised to read the [Environmental Protection Supplementary Planning Document \(SPD\) \(PDF, 2.19MB\)](#) to ensure their proposed development meets planning policy requirements and is designed to minimise the impacts on public health, wellbeing and amenity. The SPD constitutes formal planning guidance and will be considered as a material consideration when determining relevant planning applications.

6.7 Sustainable Transport and Travel

Transport infrastructure and services are vital to meet our community needs for connectivity to employment, education, health care, shopping and leisure. However, as illustrated in Figure 6-5, on-road transport is the largest source of carbon emissions in Cheshire East and is a significant contributor to air pollution within Cheshire East is road transport. This

impact is indicative of relatively high car ownership in Cheshire East with 40% of households having two or more cars against a UK average of 29%¹⁷¹.

Greater use of sustainable transport will help improve air quality and contribute to the decarbonisation of the borough. This means making provision for a range of sustainable transport opportunities to enable travel on foot, by cycle or by public transport; thereby reducing reliance on travel by private cars.

¹⁷¹ Cheshire East Council Environment Strategy 2020-24 (April 2020)

6.9 Summary

Summary of reducing environmental impacts

Section	Key findings	Implications for the LTP
6.2	Transport is responsible for 23% of all the council's operational emissions and boroughwide 34% of all emissions are from transport.	More needs to be done to reduce transport related emissions within the next LTP period, and therefore a shift is required by reducing demand, moving away from private vehicles to public transport, active travel options and electric vehicles etc.
6.2	Between 2011 and 2017, there have been 264 internal flood incidents recorded in Cheshire East. As a result of climate change, flooding events are becoming increasingly more frequent and extreme, due to more intense precipitation.	As a result of different flooding affects, there can be multiple impacts created to the transport system within Cheshire East. With the increasing risk and intensity of flooding events the transport system needs to be resilient to withstand flood impacts and ensure that infrastructure can recover quickly after floods to maintain connectivity and minimise economic losses for the borough due to delays to transport.
6.3	EV uptake is important to reducing emissions from cars, in particularly given vehicle kms travelled is expected to increase. A range of scenarios have very different outcomes in terms of EV proportions and emissions, however. In addition to the transition to EV, there is also a need to reduce demand for transport and achieve modal shift to public transport and active travel to further lower emissions, especially in the short-medium term while there are still a high number of ICE vehicles ahead of a full transition to EV.	A high proportion of trips to/from Cheshire East are within the 0-5km bracket which suggests that enhancements to the walk and cycle network could be effective in encouraging modal shift to these modes. Modal shift to active travel modes will help to decarbonise and reduce the missions emitted within Cheshire East.
6.4	Cheshire East currently has 12 AQMAs which breach the NO ₂ AQO of 40µgm ³ . These are located predominantly in town towns where there are high volumes of traffic, busy junctions and areas of congestion.	More needs to be done to reduce the number of AQMA's within the next LTP period.
6.5	The natural environment provides us with multiple benefits including improving air quality, conserving biodiversity, reducing flood risk and capturing carbon.	More needs to be done to improve the environment within the next LTP period, by improving air quality and providing high quality green infrastructure.
6.6	The overall growth proposition set out in the Local Plan Strategy, adopted in 2017, is to deliver at least 36,000 new homes and around 31,000 additional jobs by 2030.	More needs to be done to reduce emissions from growth within the next LTP period, by ensuring new development contributes to protecting and enhancing our natural, built and historic environment; including making effective use of land, helping to improve biodiversity and using natural resources prudently.

7. Trends

This section sets out some of the current transport trends and projections and forecasts for what the future of transport may look like for Cheshire East. The purpose of reviewing these trends is to understand these in more detail and consider how these can be considered in the forthcoming LTP strategy document for Cheshire East.

7.1.1 Increasing car dependency

7.1.1.1 Yearly modal split of all journey types

Figure 7-1 shows the yearly modal split for all journey types between years 2017 and 2021 in Cheshire East. The data has been taken from the National Travel Survey (NTS)¹⁷² and is derived from the average mode share for all purposes. It must be noted however that the sample size for Cheshire East is low and that although the trends shown are instructive, further data is required from a larger dataset.

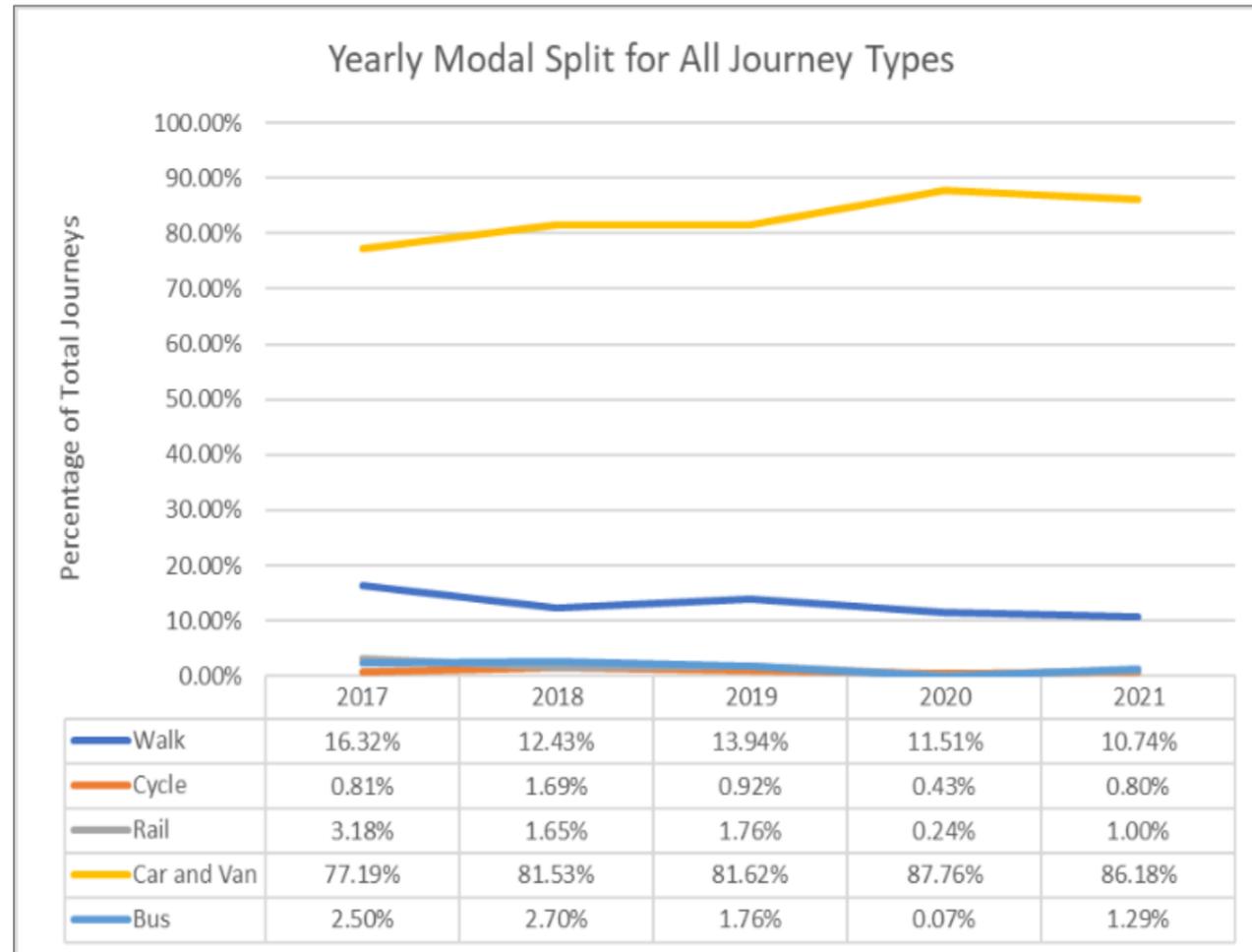


Figure 7-1: Yearly Modal Split for All Journey Types

Figure 7-1 shows that in Cheshire East the proportion of walking trips has reduced over the five year period between 2017 and 2021 by approximately 5.6% and the proportion of cycling trips has remained relatively similar and at low levels. Therefore, the proportion of active travel trips has declined over the study period. In terms of public transport, the proportion of rail trips has decreased by approximately 2.2% between 2017 and 2021 and the proportion of bus trips has decreased by approximately 1.2%. The overall proportion of public transport trips is low compared to car and van trips.

This dataset suggests that within Cheshire East there is a strong and increasing car dependency, car and van trips make up the highest proportion of trips in Cheshire East, with approximately 75% more trips being undertaken by car and van than the next highest mode which is walking. This proportion has risen by approximately 9% between 2017 and 2021. More investment and support need to be given to increasing the number of public transport and active travel trips in the borough, as this will provide many benefits such as improved health and wellbeing and reduced congestion and Carbon Dioxide emissions. This will help contribute to a better environment and support reaching national objectives for decarbonisation of transport.

7.1.1.2 Car ownership trends

As shown in Section 4.6.8, households with access to 1 or 2 cars or vans has remained relatively similar between the 2011 and 2021 census. Car ownership in Cheshire East is increasing given the number of households with three or more cars or vans has increased by 1.1% and the number of households without access to a car or van has decreased by 1.6%.

7.1.2 Potential future changes to mode demand

7.1.2.1 National Trip End Model

Figure 7-2 shows the National Trip End Model (NTEM) forecast for Cheshire East between the years 2018 and 2040¹⁷³. NTEM is a tool used to predict the future demand for travel in England and Wales. The forecast considers national projections of:

- Population
- Employment
- Housing
- Car ownership
- Trip rates

The forecasts are subject to uncertainty, particularly when disaggregated to local zones or travel modes. NTEM forecasts are therefore only a prediction, and the actual demand for travel may differ. Future travel demand and mode share will be partly determined by the vision that is set and the specific measures and policies that are pursued. It also must be noted that these forecasts were made pre-pandemic in 2018, therefore they do not account for changes in behaviour and growth that occurred during this period, as a result the accuracy of the forecasts may be affected.

¹⁷² National Travel Survey Statistics

¹⁷³ National Trip End Model (NTEM)

As can be seen in Figure 7-2, there are six Common Analytical Scenarios (CAS) which aim to capture a range of key drivers of national travel demand uncertainty, these scenarios are based on different uncertainty assumptions about the future and are explained below¹⁷⁴:

- **Core Economy Scenario** – considers a constant moderate growth in population, employment, and GDP;
- **High Economy scenario** – considers high rates of population, employment, and GDP growth;
- **Low Economy scenario** – considers low rates of population, employment, and GDP growth;
- **Regional scenario** – considers higher relative growth of population, employment, and GDP growth outside London, the South East and East of England. Households and dwellings are also re-distributed in line with the population;
- **Behavioural scenario** – considers increased flexibility of working and online shopping, a reduction of licence holdings rates amongst the younger population cohort and changes in trip rates; and
- **Technology scenario** – considers a high uptake of Connected and Autonomous Vehicles (CAVs) and low-cost Electric Vehicles (EV), increased trip making for the elderly cohort among other assumptions.

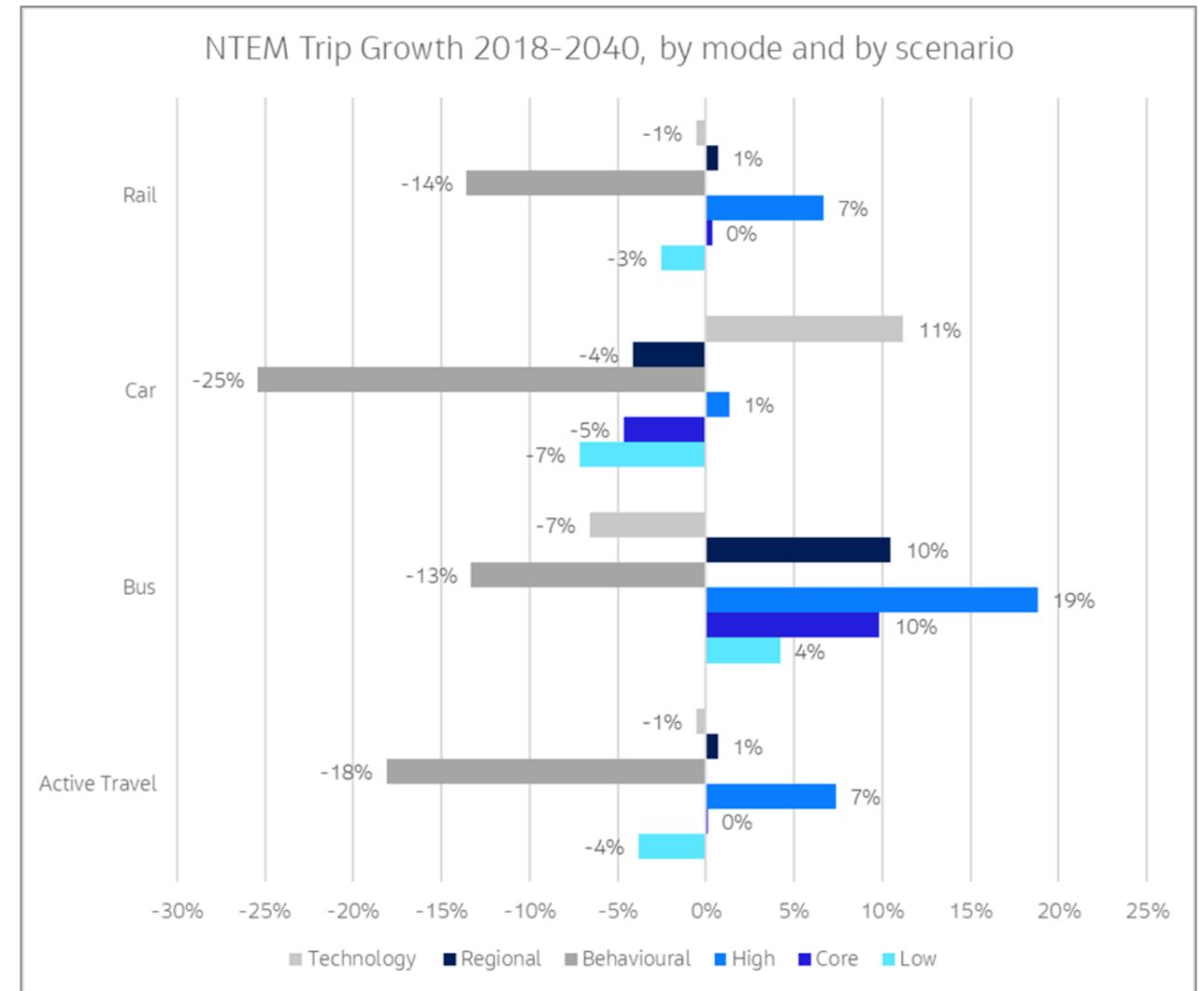


Figure 7-2: NTEM Trip Growth 2018-2040, by mode and by scenario

For each NTEM scenario, Figure 7-2 shows the forecasted growth in 24-hour average any day trips by mode between 2018 and 2040, an explanation of the results follows:

Active Travel

- The largest increase in active mode trips is 7% which is predicted to occur within the High Economy Scenario, this is likely to be the case due to a rise in population and an increased need to travel to work;
- Active travel trips are predicted to fall most significantly (-18%) in the Behavioural Scenario and slightly (-4%) in the Low Scenario, due to a reduced need to travel for work and shopping trips; and

¹⁷⁴ NTEM data release note – Additional Guidance

- These forecasts highlight a need for policy and interventions which promote active travel as a mode of transport and actively seeks model shift to walking, wheeling and cycling.

Bus

- The largest increase in bus trips is forecasted to be 19% which is experienced within the High Economy Scenario - this is likely due to an increased population and demand to travel to work;
- Bus trips are also predicted to rise by 10% in the Regional and Core Scenarios, this may be due to a rise in population and employment growth; and
- Bus trips are predicted to fall most significantly in the Behavioural Scenario, this may be due to the increasing number of people working from home and choosing to shop online.

Car

- The largest increase in car trips is predicted to be experienced within the Technology Scenario (11%), this is likely due to the high uptake of CAVs and low-cost EVs, and the increased trip making by the aging population;
- The High Economy Scenario is the only other scenario where car trips are seen to increase, the others are all predicted to decrease with the largest decrease experienced in the Behavioural Scenario (-25%). This is likely due to less people travelling to work and more people online shopping as well as there being a lower rate of young people being able to drive a car; and
- The predicted reduction in car use across most of the scenarios has not been borne out in monitoring of traffic levels on A roads and motorways in Cheshire East to date.

Rail

- A significant increase in rail trips is forecasted to be experienced within the High Economy scenario (7%), this is likely due to a rise in the population and the number of people travelling to work; and
- For the Technology, Regional, Core and Low Scenarios, there is predicted to be insignificant change experienced. However, a large decrease is forecasted in the Behavioural Scenario (-14%). This is likely due to less people travelling to work and less people travelling to go shopping, instead they are working from home and online shopping.

7.1.2.2 TfN Future Travel Scenarios

Figure 7-3 shows the change in forecasted demand, by mode, across TfN's Future Travel Scenarios for 2050 compared to 2018. The data is derived from the socio-economic and travel implications of TfN's Future Travel Scenarios¹⁷⁵. These Future Travel Scenarios "represent strategic factors that are external to TfN's direct control and are used as 'reference case' scenarios to test different TfN strategies and policies in terms of their performance against objectives." It must be noted that the forecasts were made pre-pandemic in 2018; therefore, the accuracy of the forecasts may be affected. The four Future Travel Scenarios as defined by TfN are presented below:

Just About Managing

- This scenario sees a state of inertia, although this should not be taken as neutral. It sees a future where people do not alter their behaviours much from today, or give up certain luxuries, although there is a gradual continued trend towards virtual interaction. Economic growth continues at a moderate rate, but it is largely consumption-

led and unequal, lacking agility and vulnerable to shocks. This scenario is led by markets, without much increase in political direction, with its biggest driver being economic.

Prioritised Places

- This scenario sees a significant shift in political and economic direction to ensure that no place is left behind. Every area, including cities, towns and rural and coastal areas, has a bespoke local economic strategy, supported by investment in local assets, specialisms and economic and social infrastructure. Community, localism and place-making across the North is applied to build a sense of local identity to improve local economies. There is a focus on work-life balance and social equity within and between places. This scenario is led by a change in priorities, with its biggest driver being the push for a fairer redistribution of economic prosperity.

Digitally Distributed

- This scenario sees a future where digital and technological advances accelerate, transforming how we work, travel and live. In general, we embrace these technological changes and the move towards a distributed, service-based transport system. Long-term climate change targets are met, but there is slow progress in the short-term due to a general preference for individualised mobility over traditional public transport. This scenario is led by technology, with the biggest drivers being technical advances and a willingness to embrace mobility-as-a-service and shared mobility in the long-term.

Urban Zero Carbon

- This scenario sees a significant shift in public attitudes towards action on climate change, and strong national Government response to meet it. There is a boost to economic productivity to levels consistent with the Northern Powerhouse Independent Economic Review (NPIER), primarily through a combination of urban agglomeration and place-making. Transport users demand and embrace publicly available transit and active travel options, as there is a blurring of the line between 'public' and 'private' with increasing shared mobility systems online. This scenario is led by attitudes to climate action and urban place-making, with the biggest drivers being strong Government policy and trends of urban densification.

¹⁷⁵ TfN Future Travel Scenarios

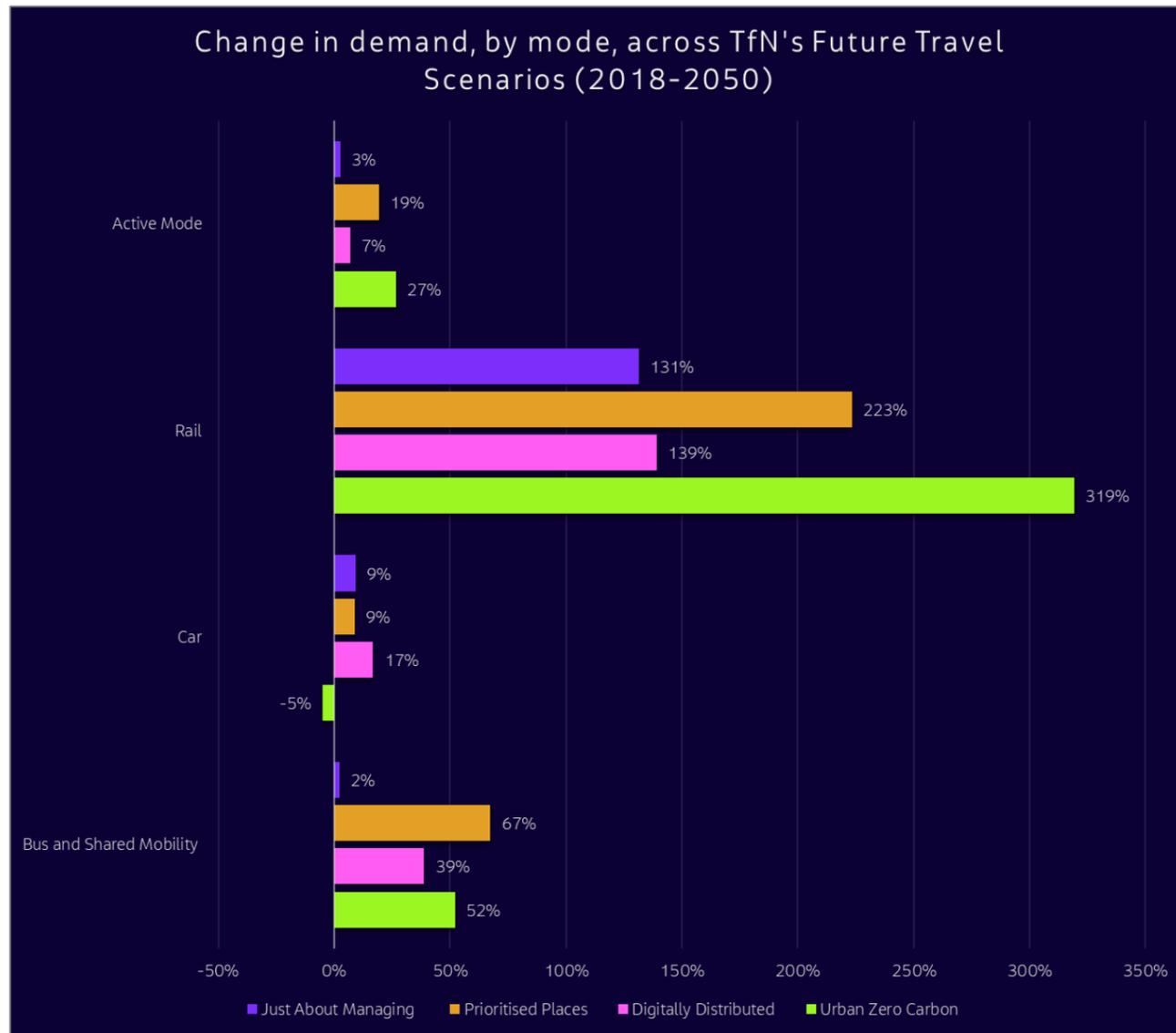


Figure 7-3: Change in demand, by mode, across TfN's Future Travel Scenarios (2018-2050)

For each Future Travel Scenario, Figure 7-3 shows the predicted percentage change in trips, by mode, originating in Cheshire East between 2018 and 2050. An explanation of the results follows:

Active Mode

- The future travel scenarios seem to be unambitious in relation to the growth of active travel, especially when considering this growth would be from a very low baseline;
- The largest predicted increase in active mode trips is 27% which is experienced within the 'Urban Zero Carbon' scenario. This is likely due to an increase in demand and enthusiasm for active travel modes;
- There is also predicted to be a significant increase in active travel trips under the 'Prioritised Places' scenario (19%). This is likely due to all areas being included in economic strategy and prosperity which will improve the infrastructure and facilities needed for active modes; and

- The lowest increase in trips is 3% which is experienced under the 'Just About Managing' scenario. This is likely due to there being little change in behaviour under this scenario.

Rail

- Of the four modes, rail experiences the largest predicted increase in trips for all four scenarios. However, mode share must be considered when analysing demand change as this increase does not translate to a significantly higher mode share;
- The highest trip increase is predicted to be 319% which is experienced under the 'Urban Zero Carbon' scenario, this is likely due to an increased demand for public transport due to a change in perceptions on climate change;
- Similarly to active modes, the next largest trip growth was experienced under the 'Prioritised Places' scenario with a predicted 223% increase. This is likely due to the fairer distribution of economic prosperity providing more people with access to rail trips;
- The lowest forecasted increase was also experienced under the 'Just About Managing' scenario, this is likely due to a lack of behavioural change and political action; and
- This shows that changing perceptions on rail will be important in increasing the number of trips, as will incorporating all areas into strategy and prioritisation.

Car

- Car trips have the lowest increase in the number of trips between 2018 and 2050, however they have the highest mode share;
- The most notable predicted increase is 17% which is experienced under the 'Digitally Distributed' scenario, this is likely due to the embracing of technological solutions increasing the options available for car travel. This includes a notable uptake in Connected Autonomous Vehicles (CAV), which contributed to an increased demand on the roads;
- Under the 'Urban Zero Carbon' scenario a decrease of 5% in trips is predicted. This is likely due to the public embracing incentives to reduce demand and people choosing to switch to alternative cleaner modes;
- This suggests that digital and technological advancements will not contribute to addressing congestion on the roads, as mode share will be similar to 2018 levels and the number of car trips will increase; and
- It will be important to ensure incentives and alternative modes are in place to shift demand and enable mode shift.

Bus and shared mobility

- Bus and shared mobility trips are predicted to increase in all the scenarios;
- The increase under the 'Just About Managing' scenario is relatively insignificant at 2%. This is likely due to there being little change in travel behaviour;
- The most significant increases are forecasted under the 'Prioritised Places' and 'Urban Zero Carbon' scenarios, with increases of 67% and 52%, respectively. This is likely due to an increase in the support for traditional forms of public transport such as bus;
- Under the 'Digitally Distributed' Scenario bus trips are predicted to increase less significantly by 39%. This is likely due to new shared private mobility solutions becoming available; and
- This shows that supporting public transport and providing incentives and inclusive strategy will increase the number of bus trips most significantly.

7.1.3 Changing trends in travel demand

7.1.3.1 Pandemic impacts on working from home

As discussed earlier in the report, the 2021 Census shows home working to be much more prevalent among those in Cheshire East living in rural areas (42.2% worked at home) than in urban areas (30.9%). The proportion of home working varied from above 50% in Prestbury (55.9%), Goostrey (52.5%) and Alderley Edge (51.1%) to only 20.6% in Crewe (more than 10 percentage points below any other settlement). However, it must be noted that the Census was undertaken during the pandemic lockdown and therefore the data provides a snapshot in time that is not reflective of the current position.

The 2021 Census provides further evidence the proportion of people travelling to work by car was significantly higher in Crewe than more rural areas of Cheshire East. In areas with a lower work from home rate, it is important to ensure public transport and active travel are attractive alternatives to the car for travelling to work to encourage mode shift.

Also presented earlier in the report is the home working habits of employees in small and medium enterprises (SMEs) from an Ofcom survey in 2022. The data support the view that the pandemic has accelerated a shift towards hybrid working within SMEs. If these trends continue, there will be an impact on transport networks and how the workforce utilise various modes, and the frequency of utilisation.

The ONS Opinions and Lifestyle Survey provides monthly data on the social impacts of recent topics of national importance, such as the pandemic and the cost of living¹⁷⁶. It must be noted the sample size for each month's survey is low, so the results do need to be analysed with caution. The survey covers the period September 2022 to January 2023 it details that among working adults who have worked in the last seven days, 16% reported working from home only and 28% reported both working from home and travelling to work. Also, workers in the highest income band, those who were educated to degree level or above, and those in professional occupations were most likely to report home only or hybrid working.

As hybrid working becomes a popular way of working, with individuals splitting their work time between travelling to the office and staying at home, travel patterns are shifting. This may affect the attractiveness of certain public transport passes, as the value for money of inflexible fixed passes such as a five day or month-long pass may decrease.

Cheshire East should look to offer more flexible public transport offerings that attract those working in a hybrid way. For example, providing a flexible five-day pass where five days of travel within a certain period are allowed as to provide more benefit to the user. This may increase patronage on public transport and shift those travelling to work away from the car.

7.1.3.2 Shared mobility

Shared mobility solutions such as car clubs play an important role in switching to more sustainable modes of travel. As described by Collaborative Mobility UK (CoMoUK)¹⁷⁷, the national charity dedicated to the social, economic and environmental benefits of shared transport, "Car clubs allow individuals and organisations to have access to a car without being tied to ownership". This can help to cut costs and mileage whilst increasing the use of public transport and active travel. Reported within the CoMoUK Annual Car Club Report 2022¹⁷⁸, across the UK car club membership has grown 113% since 2019 from 353,726 members to 752,560 members. Therefore, car clubs are becoming a more popular form of sustainable travel and should be considered as part of the transport offering. In Cheshire East car club vehicle

numbers are low; there is currently only one car club vehicle available across the borough located in Crewe, which can be accessed through enterprise CarClub¹⁷⁹.

7.1.4 Changing Climate

As explained in section 6.2.6, climate change is already impacting transport infrastructure. As forecasted by the Met Office¹⁸⁰, UK winters are projected to become warmer and wetter, and summers are to become hotter and more likely drier. Extreme weather events such as heavy precipitation, flooding and heatwaves and are likely to become more frequent and intense due to climate change. All three can cause damage and disruption to transport. Flooding is an example of an extreme weather event which has multiple impacts on the transport system within Cheshire East, these include:

- Flood water can cause damage to roads and railways as they may become submerged, closed or unsafe for travel due to floodwaters.
- During flooding events, travel for passengers, goods and services can be disrupted. This may mean individuals daily lives and journeys are impacted meaning they cannot access work or school.
- Due to a reduction in productivity as a result of goods and services being delayed, businesses may suffer financial losses due to transportation disruptions caused by floods.

Therefore, it is important the borough's transport infrastructure is adapted to be resilient to climate change, be able to recover quickly, and reduce the impacts of extreme weather events on the transport network to maintain connectivity and minimise economic and social losses for the borough.

As a result of climate change, flooding events are becoming increasingly more frequent and extreme, due to more intense precipitation. As a result, the impacts listed above are to become more significant, therefore transportation in Cheshire East needs to be resilient to withstand flood impacts and ensure that infrastructure can recover quickly after floods to maintain connectivity and minimise economic losses for the borough.

Furthermore, as described by the Met Office¹⁸¹, extreme weather events such as heavy precipitation, flooding and heatwaves and are likely to become more frequent and intense due to climate change. UK winters are projected to become warmer and wetter, and summers are to become hotter and more likely drier. By 2050, heatwaves like that seen in 2018 are expected to happen every other year. However, this is likely to cause little change to the risk of drought in the country. Most studies by the Met Office point to a general increase in the frequency and length of meteorological droughts in the UK which is based on the degree of dryness or rainfall deficit and the length of the dry period. Despite the warming climate, severely cold winters are still likely to occur just on a less often frequency. In Cheshire East specifically, the region experienced an estimated 49% increase in rainfall between April 2023 and March 2024. This has led to a 73% increase in service requests and gullies becoming full more often which will inevitably have more of an impact on the network¹⁸².

¹⁷⁶ [Opinions and Lifestyle Report 2022-2023](#)

¹⁷⁷ [CoMoUK Car Clubs](#)

¹⁷⁸ [CoMoUK Annual Car Club Report](#)

¹⁷⁹ [enterprise CarClub](#)

¹⁸⁰ [Met Office Climate Change](#)

¹⁸¹ [Met Office Climate Change](#)

¹⁸² [Hydrology Data Explorer Worleston](#)

These changes are likely to impact transport considerably, for example the heatwave in 2022, which led to temperatures above 40 degrees Celsius caused many rail services across the country to stop running and speed restrictions were imposed to avoid track buckling¹⁸³. Roads across the country also began to melt, which caused closures¹⁸⁴.

¹⁸³ [Network Rail Red Weather Warning](#)

¹⁸⁴ [BBC News A14 closures](#)

7.1.5 Technology trends

Table 7-1 below describes technology trends and explains the implications for Cheshire East.

Table 7-1: Technology trends

Trend	Description	Implications for CEC
Future of vehicles	<p>Electric Vehicles (EV) are currently more prominent than hydrogen powered vehicles. This is because they are more suitable for use and the infrastructure already exists for them to be charged. Charging times depend on the battery size and type of charging station. As the technology improves, charge times are becoming faster, and the vehicles are becoming cheaper and thus more widely available.</p> <p>Hydrogen vehicles are not as well developed or widespread, however the advantages to hydrogen fuelled vehicles are the quick refill times and range. This could provide the freight industry with a more suited vehicle due to the long distances they can travel.</p>	<p>With EV growing in popularity, it is important that Cheshire East has the infrastructure ready to support this. CEC should also look to stay up to date with new findings regarding hydrogen powered vehicles as implementing these may be beneficial in supporting freight movements.</p> <p>See Section 4.5 for further details on implications of EVs.</p>
Drones and airborne transport for logistics	<p>According to DHL¹⁸⁵ drones can be useful for logistics in three different ways:</p> <ul style="list-style-type: none"> • Last mile delivery and short to medium distance transportation • Inventory management and order picking • Surveillance and inspection <p>The use of drones as a new mode of delivery could provide quick, point to point shipping. However currently, they are somewhat off realisation as technology and regulations have limited their use to a few operations globally. DHL predict it will take 5-10 years for drones to have an impactful application.</p>	<p>Whilst not relevant to the early phase of the LTP, the future of logistics may look different, particularly regarding short journeys within neighbourhoods that are currently undertaken by LGVs.</p>
Online shopping trend	<p>As discussed in section 4.8.4 there has recently been a rise in e-commerce and home delivery services. According to Statista, in 2022 online sales accounted for 26.5% of overall retail sales in the UK. This was over double the amount from one decade prior. In 2020 alone internet retail sales grew by 47%; this is the fastest rate recorded in the previous ten years¹⁸⁶. This has resulted in an increase in the number of delivery vehicles/vans on the roads particularly within residential neighbourhoods.</p>	<p>With an increasing number of high emitting delivery vehicles/vans in residential areas, air quality in these areas is likely to reduce. Kerbside deliveries also pose a problem to accessibility as vehicles parked on the kerb can reduce the width of the footway which stops walkers and wheelers being able to use the footway, they can also block bike lanes reducing the perceived safety for cyclists.</p>
Connected Autonomous Vehicles (CAV)	<p>It is predicted that Connected Autonomous Vehicles (CAV), or self-driving cars, will be an integral part in the transformation to a smart mobility future. They are predicted to change transportation, consumer behaviour and society. There is potential for CAVs to make driving safer and more efficient alongside electrifying vehicles, this may increase private car ownership due to their attractiveness. The introduction of CAV infrastructure and regulation must be well thought out and conducive to replacing private cars to reduce the number of privately owned vehicles within Cheshire East.</p>	<p>If CAVs are to have a place in Cheshire East, then the council must understand what changes are required in terms of their infrastructure and policy so that they can be implemented in a safe and effective way. There is also a risk that this trend entrenches car dependency further in the borough. There is a lot of uncertainty around how CAVs will affect private vehicle ownership, however it is believed policy will have an important influence on these trends. Therefore, it is key to ensure CAV policy is well developed within Cheshire East.</p>

¹⁸⁵ DHL Future of Freight

¹⁸⁶ Statista e-commerce facts and statistics.

Trend	Description	Implications for CEC
Micro-mobility	<p>The sale and use of e-scooters in the UK is increasing, however the use of a privately owned e-scooter on public land (e.g. roads, cycle paths and pavements) is illegal. There have been multiple e-scooter trials across the country in recent years, and the government is considering legalisation more widely. E-scooters could potentially play a role in providing alternative more sustainable modes of transport to cars and they can help to alleviate congestion. In particular, they could provide an option for first and last mile journeys linked to public transport. There are however safety concerns, and their use could abstract from current walking/cycling journeys. There are also other forms of micro-mobility which are growing in popularity, this includes e-bikes which have made cycling a more accessible form of travel and leisure. Cargobikes which enable lower emission delivery services and also other forms of small motorised personal vehicles which offer a convenient and low emission mode of transport.</p>	<p>If e-scooters are legalised, Cheshire East will need to develop a policy position on their use on the public highway and consider integration within the wider transport network. Work will also need to be done around reducing their conflict with other modes, for example from parking and riding on the footway, as well as avoiding vandalism.</p>

7.1.6 Summary

The table below summarises the key points of the Trends section.

Section	Key Findings	Implications for the LTP
7.1.1	<p>Cars and vans still hold the largest proportion of yearly journey types by approximately 75% more journeys than any other mode. Car ownership in Cheshire East is also increasing with a lower proportion of households not having access to a car and a higher proportion of households having access to three or more cars.</p> <p>The proportion of active travel and public transport trips has declined and cycling, and public transport hold relatively insignificant proportions of travel modes.</p>	<p>More needs to be done policy and investment wise to improve the attractiveness of alternative modes of transport to the car or van, for people to shift from driving to public transport or active travel. If there are attractive alternatives to the car it may shift some people away from owning a car as it is economically less required.</p>
7.1.2.1	<p>Forecasts from the NTEM model predict that active travel trips are most likely to rise within a high economy scenario and fall most significantly in a behavioural scenario.</p> <p>Bus trips are predicted to rise most significantly in a high economy scenario and fall most significantly in a behavioural scenario.</p> <p>Car trips are most likely to increase within a technology scenario and fall most significantly in a behavioural scenario. And rail trips are predicted to increase within a high economy scenario and fall most significantly in a behavioural scenario.</p>	<p>Policy and intervention will be required to ensure active travel and public transport trips increase significantly and car dependency is addressed. The LTP should consider the different forecast scenarios and how these may impact the LTP strategy and investment decisions, alongside future development and sustainable growth. This should be used to shape interventions and enhance the transport network for all.</p>
7.1.2.2	<p>From the TfN scenarios, active travel and car trips are predicted to experience the least increase in trip numbers, with car trips predicted to fall in the Urban Zero Carbon scenario. Rail trips are predicted to rise most significantly; however, this is due to their low mode share. Bus and shared mobility trips are predicted to rise more significantly than active travel and car trips.</p>	<p>Cheshire East Council should look to improve the choices on offer for active travel, public transport and shared mobility through strategy and policy, to increase demand for these modes.</p>
7.1.3.1	<p>Within Cheshire East the 2021 census revealed that home working is much more prevalent among those living in rural areas than in urban areas, with Crewe having a significantly lower proportion of homeworkers (20.6%) than any other settlement.</p> <p>The ONS Opinions and Lifestyle Survey presents that between September 2022 and January 2023, among working adults who have worked in the last seven days, 16% reported working from home only and 28% reported both working from home and travelling to work.</p> <p>In 2022, Ofcom presented analysis that suggests the pandemic has accelerated a shift towards hybrid work within small and medium enterprises (SMEs).</p>	<p>In areas with a lower work from home rate, it is important to ensure public transport and active travel are attractive alternatives to the car to encourage mode shift.</p> <p>If the trends relating to hybrid working continue there will be an impact on transport networks and how the workforce utilises various modes.</p>
7.1.3.2	<p>Across the UK car club membership has grown 113% since 2019 from 353,726 members to 752,560 members. Currently there is only one car club vehicle available across the whole borough located in Crewe</p>	<p>Car clubs are becoming a more popular form of sustainable travel in the UK. Cheshire East Council should consider enhancing the current Car Club offering to help residents access opportunities and reduce the need for car ownership.</p>
7.1.5	<p>Extreme weather events such as heavy precipitation, flooding and heatwaves can cause damage and disruption and are likely to become more frequent. Flooding is an example of an increasing environmental issue across Cheshire East.</p>	<p>It is important the borough's transport infrastructure is adapted to be resilient to climate change, be able to recover quickly, and reduce the impacts of extreme weather events on the transport network to maintain connectivity and minimise economic and social losses for the borough.</p>
7.1.6	<p>Technology is changing how individuals travel in terms of modes and frequency, for example the improvements in remote working have allowed for hybrid working. It has also impacted upon commercial travel, for example there has been an increase in delivery vehicles on the roads and in neighbourhoods due to the rise in e-commerce. In the future these deliveries may be able to be completed by drones.</p>	<p>Cheshire East must understand these changes in transport habits to be able to adapt policy and the transport offering. There is also a need to consider impacts from increased deliveries on residential streets.</p>

8. Summary

This chapter summarises key findings from the evidence base.

Car dependency and its causes

A key theme running through the Local Transport Plan evidence base is very high levels of car dependency in Cheshire East. The latest available comprehensive data on travel choices in Cheshire East was the 2011 Census that reported 74% of people commuting to work travel by single occupancy car, which was significantly higher than both the North West average (69%) and the England average (62%). This is coupled with significantly lower levels of commuting to work by bus (2%) than the North West and England average (approximately 8%), and low levels of walking (10%) and cycling (3%) that are line with the North West and England averages. More recent data from Cheshire East specific respondents to the National Travel Survey indicates that car dependency has only increased in the intervening years with the car and van modal share increasing from 77% in 2017 to 81% in 2019. Corresponding decreases have also been reported in the National Travel Survey data for walking, cycling and public transport over this period. It should be noted that the National Travel Survey has a limited number of responses from Cheshire East and that further data should be analysed to check and verify this finding. Between 2011 and 2021, the percentage of households with access to a car or van increased by 1.6% in Cheshire East and the number of households with access to three or more cars or vans has increased by 1.1%.

The pandemic (between 2020 – 2021) resulted in major impacts to travel behaviours with decreases in car and public transport usage. Since then, traffic levels have been trending back towards pre-pandemic levels and although walking and cycling increased significantly during periods of pandemic restrictions, this has now fallen back towards pre-pandemic levels. Bus and rail usage is steadily increasing from the low levels during the pandemic, however, there appears to be long lasting impacts on the type and timing of journeys, such as less commuting on weekdays and more leisure journeys at the weekend. There are also greater levels of working from home amongst some employment sectors. Regardless, the pandemic does not seem have significantly changed the long-term trends towards high levels of car dependency in Cheshire East.

There are a range of contextual factors that have contributed to high levels of car dependency in Cheshire East including:

- Approximately 39% of residents in Cheshire East live in rural areas in which travel distances are longer, and the public transport network is more limited. The rural population in Cheshire East increased by 12% between 2011 and 2021 compared to a 5% increase in the urban population over the same time period.
- Digital connections are also more limited in rural areas of Cheshire East with broadband availability currently lower in Cheshire East than the rest of the North West and Superfast and Gigabit broadband availability currently lower in Cheshire East than the UK.
- Cheshire East as a borough has comparatively higher levels of income amongst residents compared to the national average¹⁸⁷ and there is an established link to higher levels of car ownership¹⁸⁸.

However, policy and investment decisions have also shaped the high levels of car dependency in Cheshire East. At the national level policy and investment has prioritised increasing traffic capacity, with long term declines in bus usage seen outside of London. At the Cheshire East level, the majority of transport investment has previously been targeted at increasing traffic capacity and providing new highway links, with a significant programme of successful delivery of complex schemes. This approach has led to significant benefits including releasing pressure on urban centres such as a Congleton and Poynton and accommodating significant levels of new development to support economic growth. It

should however be noted that currently there is a lack of suitable alternative options to the private car for travel in Cheshire East for many people. Although there are some good examples of active travel infrastructure such as the Connect 2 route between Crewe and Nantwich, there is not a joined-up network that gives people the confidence to walk, wheel and cycle. The bus network has struggled to provide a competitive offer against car travel and long-term declines in usage have placed severe pressure on the ability to run a financially sustainable network.

Since 2019, important steps have been taken in both policy and planning to provide high quality alternative travel choices. An ambitious Bus Service Improvement Plan (BSIP) has been developed that is seeking to stabilise the network and work towards future growth. In-depth planning through Local Cycling and Walking Infrastructure Plans (LCWIPs) has identified the improvements needed to provide a high-quality walking, wheeling and cycling network across some areas. Funding levels of walking, wheeling and cycling have increased, and a number of key schemes have either been delivered or are due for construction in 2024/25. Wider transport policy is also evolving and there is now a consistent approach to car parking tariffs across the borough that is providing the basis for an integrated transport plan. Constrained levels of revenue and capital funding in Cheshire East have however limited the pace of change.

Challenges associated with car dependency

Notwithstanding the connectivity and flexibility car travel offers people in Cheshire East, particularly those living in more rural areas, there are a number of challenges associated with high levels of car dependency including:

- **Carbon emissions** – Road based travel is a significant contributor to carbon emissions that are driving climate change. In Cheshire East, road based transport contributes approximately 33% of carbon emissions emitted in the borough. The transport sector has not matched the substantial emissions reductions seen in other sectors, with a 36% increase in the contribution transport has made to overall emissions since 2005 nationally. The large majority of emissions are directly generated by road-based trips, particularly private cars. The shift to electric vehicles will play a major role in reducing transport emissions however this in itself is not sufficient to meet net zero targets. An overall reduction in the amount of travel is needed such as through remote working, and a shift to more sustainable modes such as walking, cycling and public transport. Road based transport is also a significant contributor to air quality issues. Again, the shift to electric vehicles is positive however these still produce Non-Exhaust Emissions that affect health.
- **A lack of accessibility for many residents to services, education and employment, particularly for people in areas of deprivation** – Overall Cheshire East is a relatively affluent borough, however there are large disparities in deprivation and health. In particular, areas of Crewe and Macclesfield are among the top 20% most deprived wards nationally. In some areas of Crewe and Macclesfield, the average life expectancy is 10 years lower than in more affluent areas of Cheshire East. There are roughly 57,600 residents living in wards that are within the top 40% of deprived areas nationally and of that 57,600, 9,200 of them are living in the top 20% of deprived areas nationally, demonstrating the scale of the issue. Levels of car ownership in these areas are significantly lower than in more affluent areas. In some areas of Crewe, the percentage of households not having access to a car is as high as 56%. As noted above there are often limited alternative transport choices to the private car in Cheshire East and this affects the majority of the borough. Although not rating as highly on the deprivation index as Crewe and Macclesfield, urban areas such as Middlewich and many rural areas also experience significant transport barriers. These issues present a major barrier for residents, limiting their access to a wide range of health and other key services. This can also limit access to education and employment opportunities reinforcing entrenched levels of deprivation. This is a particular issue in Cheshire East with many high value jobs

¹⁸⁷ [The English Indices of Deprivation 2019 \(publishing.service.gov.uk\)](https://publishing.service.gov.uk)

¹⁸⁸ [nomis Car or Van Availability](#)

located at out-of-town employment parks such as Alderley Park, Waters and Radbroke that are difficult to access by non-car journeys, particularly from areas such as Crewe and Macclesfield.

- **Accessibility barriers limit the ability of key businesses to attract talent and grow** – Limited alternative travel choices is also affecting the ability of key employers in Cheshire East to attract and retain the talent they need to thrive and grow. Cheshire East's economy has key strengths in the science and technology sectors with key employment sites in Wilmslow, Alderley Edge, Macclesfield and Crewe. However, many employers are concerned about the challenge of recruiting the talent they need, caused in part by limited travel options and longer journey times for people who do not drive a car. Anecdotal information drawn from some employers in the north of Cheshire East are mindful of the significant population in Greater Manchester living car free lifestyles and the competition of employers based in more accessible locations.
- **Lack of physical activity and poor health** – Although overall health in Cheshire East compares relatively well against regional and national figures, in addition to masking the spatial disparities within the borough, this does not recognise the structural issues associated with physical inactivity across the nation. The UK government published the 'Get Active: a strategy for the future of sport and physical activity' in 2023, noting 'the health benefits of sport and physical activity are well known. Active people live healthier, longer and happier lives, with physical activity reducing the risk of disease, helping to support individuals to maintain a healthier weight and wide-ranging musculoskeletal health benefits'¹⁸⁹. In Cheshire East, there are significant proportions of the population who are physically inactive. The UK government recommends adults do at least 150 minutes of moderate physical activity per week, however only 67.1% of Cheshire East residents achieve this figure with 22.4% physically active for less than 30 minutes per week. 62.5% of adults in Cheshire East are classified as obese or overweight and worryingly this is increasingly seen in children with 21.6% of children aged 4-5 and 30.2% aged 10-11 falling into this category. Car dependency and the associated low levels of walking, cycling and public transport use is a contributory factor to these health issues and the associated burden on health services from treating related conditions. Ultimately, choices about how we use highway and public spaces affects the attractiveness and perceived safety of walking, cycling and public transport. At present many routes within the network are not perceived to be safe and/or attractive, and this is limiting the number of people travelling more sustainably.
- **Asset management** – The highway network is the single largest asset that Cheshire East Council maintains. The network includes 2,707 km of carriageways, 2,204 km of footways and cycleways, and 5.8 million square metres of grass verge, plus bridges, road gullies, road signs, street lights, pedestrian crossings, and traffic lights. The current gross replacement cost for the local highway network with its associated assets and land values, stands at over £6 billion. The Cheshire East highway network is used daily by the majority of residents and those passing through the borough and is fundamental to the economic, social, and environmental wellbeing of the community. All highway authorities are experiencing challenges in maintaining highway assets due to large demands on carriageway resurfacing and limited funds. Car dependency and low usage of walking, cycling and public transport is placing more vehicle movements on the network and contributing to this challenge.
- **Maintaining efficient traffic links to support economic growth** – Productivity in the local, subregional and national economy is driven in part by efficient transport links and the highway network plays a vital role in connecting people, businesses and places. The reliance on cars for journeys in Cheshire East means that highway links and junctions are dealing with additional demand that exacerbates congestion, journey delay and journey time unreliability. As congestion has grown this has also impacted on the attractiveness of bus travel as journey time delays and unreliability has eroded confidence in services, causing a reinforcing loop in car dependency. CEC has delivered a number of significant highway schemes to expand capacity on the network and relieve key

pressure points in areas such as Crewe, Congleton and Poynton, however these large schemes are costly and the scope for further expansion is limited. Additionally, the expansion of highway capacity can create 'induced demand' so that benefits are eroded by more trips using the upgraded network and congestion returning¹⁹⁰. This is not to say that new highway links and capacity is inappropriate, however the context is important, and there needs to be a focus on providing high quality alternative travel choices alongside any targeted investment.

Wider challenges

There are a range of contextual challenges facing Cheshire East that will place additional pressure on the provision of a high-quality transport network in the coming years. The LTP will also need to consider how the inherent uncertainties relating to many of these challenges can be reflected in a strategy that is robust across a range of plausible scenarios. Key linked challenges are set out below:

- **Climate change impacts** – Although local and national government policy is working towards achieving net zero it is clear impacts from climate are already being felt and these impacts will increase. The United Nations Environment Programme says the science is clear – the world is facing a climate emergency. Burning of fossil fuels has emitted enough greenhouse gases to significantly alter the composition of the atmosphere and the average world temperature is rising. According to the Met Office, the global average temperature for 2023 was 1.46°C above the pre-industrial baseline and it was the 10th year in succession that has equalled or exceeded 1.0°C above the pre-industrial period (850 – 1900)¹⁹¹. Extreme weather events such as major storms, heavy precipitation, flooding, and heatwaves can cause damage and disruption and are likely become more frequent, however there is significant uncertainty around the scale and timing of such changes. It is important that the borough's transport infrastructure can be resilient to climate change to reduce the impacts of extreme weather events on the transport network. This will be a key challenge set against a backdrop of aging assets and constrained funding. These pressures come on top of already challenging circumstances, and although significant funds are invested in maintaining the network each year using a best practice approach to asset management, the network overall is declining in quality.
- **Demographic changes** – Cheshire East currently has a larger proportion of the population in the older age category of over 65 (22.3%) compared to Cheshire West (21.3%), the North West (18.7%) and England (18.4%). This trend is forecasted to continue with an increasingly older population in the borough. The next LTP should consider the specific needs of an older population to keep older residents active and participating within society where possible. Cheshire East's population is also growing at a faster rate compared to the North West and England, and the rural population has increased at a faster rate than within urban areas. Cheshire East's population in 2022 was approximately 406,000 which was a significant increase since 2011 when the population was approximately 370,000. By 2040 the population is forecast to grow to approximately 415,756. The next Local Plan will however have a large bearing on future demographic and spatial changes, and the next LTP should consider varying scenarios for this through joint working with CEC's spatial planning team.
- **Changing habits (home/hybrid working)** – The way people work and shop is changing with the rise of remote working and online shopping. At the last census in 2021 there were significantly higher levels of home working. It should be noted that levels of home working have reduced since the pandemic however there are some longer lasting effects on some employment sectors with a move to hybrid working. This increased home working will bring benefits through reduced numbers of trips on the transport network, however the impact of this on public transport commercial sustainability is still being played out. There are also negative effects from this trend from increased carbon emissions from home heating, however the transition to low carbon heating in time should mitigate this.

¹⁸⁹ <https://www.gov.uk/government/publications/get-active-a-strategy-for-the-future-of-sport-and-physical-activity/get-active-a-strategy-for-the-future-of-sport-and-physical-activity#executive-summary>

¹⁹⁰ <https://www.sciencedirect.com/science/article/abs/pii/S1361920901000098>

¹⁹¹ 2023: The warmest year on record globally - Met Office

- **Changing habits (e-commerce)** - The move to online shopping is reducing the number of trips on the transport network and is part of wider structural changes to society. However, this is placing significant pressure on the retail and leisure sectors within our town and village centres with some shops closing and the range of services declining. These areas have historically been the beating heart of communities and the borough is facing the challenge of revitalising these centres. There are many factors at play however key considerations for the next LTP will be how access to these areas can be maximised, and how management of the highway network shapes public spaces and their attractiveness to people living and visiting town and village centres. Another key consideration is the management of many delivery vehicles in residential areas which have increased significantly in recent years.

Opportunities for change

Despite the challenges set out in this document there are also significant opportunities that can be unlocked through the next LTP:

- **Modal shift** – Although geographically Cheshire East is predominantly rural approximately 61% of residents live in urban areas. For urban areas, particularly Crewe and Macclesfield and their travel catchments, there is significant potential to enable people to travel by more sustainable modes of travel that would tackle persistently high single occupancy car travel. In these areas spatial proximity, travel patterns and the basis of a sustainable transport network offers significant potential. This is not to say that all journeys should be non-car, but a significant proportion could be transitioned to walking, cycling, public transport, or shared transport, if a high-quality alternative is available, or avoiding the need to travel in the first place. Through this evidence base key information relating to the potential to increase walking, wheeling, cycling and local buses has been set out. Cheshire East also benefits from the presence of a number of rail lines, and this too represents a key opportunity to work with the rail industry to improve services and connect with local transport improvements to enable

multimodal journeys. This modal shift would bring a wide range of benefits linking to CEC's Corporate Plan objectives and would release pressure on the traffic network itself.

- **Connecting communities** – Although the potential for modal shift will be limited in smaller urban areas, rural communities and for some individuals with specific mobility requirements, accessibility to services and life opportunities is fundamental to health and wellbeing. For these areas and individuals, a different approach is needed that is focussed on meeting accessibility needs. There may be an opportunity to work with local communities to jointly identify needs and collaboratively develop financially sustainable solutions.
- **Leveraging new technology** – New technology will present significant opportunities. The uptake of electric vehicles is already bringing significant benefits for carbon reduction. There will be a range of other opportunities related to micro and shared mobility, connected and driverless vehicles, new forms of transport, and digital connectivity in the future. The LTP needs to consider how these opportunities can be leveraged in a way that is appropriate for the circumstances of Cheshire East. It should also be noted that new technology may also bring potential negative impacts which need to be carefully considered. The evidence set out in this document also notes that a reliance on technology alone will not achieve the pace of change sought and the full benefits required to meet the various challenges facing our community, environment and economy.
- **Local Plan** – CEC has commenced the process of developing a new Local Plan that will provide a strategy and spatial plan for new development in Cheshire East. There is potential to create significant synergy between the next LTP and Local Plan to achieve joint outcomes related to CEC's Corporate Plan. Spatial proximity is a key determinant of accessibility to jobs, education and services, and a key factor in giving people the option to travel more sustainably. The location of new development will also determine potential positive and negative impacts on the transport network and the degree to which new infrastructure and transport services can serve existing communities. For these reasons close coordination is planned between the CEC teams developing these plans.