North West Leicestershire Local Cycling and Walking Infrastructure Plan







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About Sustrans

Sustrans is the charity making it easier for people to walk and cycle. We connect people and places, create liveable neighbourhoods, transform the school run and deliver a happier, healthier commute. Join us on our journey. www.sustrans.org.uk.

Registered Charity No. 326550 (England and Wales) SC039263 (Scotland).

Our vision

A society where the way we travel creates healthier places and happier lives for everyone.

Our mission

We make it easier for people to walk and cycle.

What we do



We make the case for walking and cycling by using robust evidence and showing what can be done.



We provide solutions. We capture imaginations with bold ideas that we can help make happen



We're grounded in communities, involving local people in the design, delivery and maintenance of solutions



1. Introduction

In 2017, the first Cycling and Walking Investment Strategy (CWIS) was published by the Department for Transport. This was replaced in July 2022 by CWIS2, which sets out the Government's ambition to make walking and cycling the natural choices for shorter journeys, or as part of longer journeys by 2040. The CWIS supports the transformation of local areas: which will tackle congestion, extend opportunity to improve physical and mental health, and support local economies.

The CWIS2 built on the previous iteration and set out four revised objectives to ambitions 2025, which raised the level of ambition:

- 1. Increase the % of short journeys in towns and cities that are walked or cycled from 41% in 2018/19 to 46% in 2025
- 2. **double cycling**, where cycling activity is measured as the estimated total number of cycle stages made each year, from 0.8 billion stages in 2013 to 1.6 billion stages in 2025.
- 3. **increase walking activity**, where walking activity is measured as the total number of walking stages per person per year, to 365 stages per person per year in 2025.
- 4. increase the percentage of children aged 5 to 10 that usually walk to school from 49% in 2014 to 55% in 2025.

The Government's ambition by 2040 is to make cycling and walking the natural choices for short journeys, or as part of a longer journey, and deliver:

- Better safety a safe and reliable way to travel for short journeys
- Better mobility more people cycling and walking, making it normal, easy and enjoyable
- Better streets places that have cycling and walking at their heart and enable active travel



Government guidance recommended that local authorities should develop Local Cycling and Walking Infrastructure Plans (LCWIPs) for their area. While the preparation of an LCWIP is non-mandatory, the Department for Transport (DfT) has advised that Local Authorities who have plans will be well placed to make the case for future investment.

LCWIPs provide a new strategic approach to identifying cycling and walking improvements at the local level. They aim to enable a long-term approach to forming local cycling and walking networks, ideally over a 10-year period, and form a fundamental part of the Government's strategy to increase the number of trips made on foot or by bicycle.

The key outputs of LCWIPs are:

- a network plan for walking and cycling which identifies preferred routes and core zones for further development
- a prioritised programme of infrastructure improvements for future investment
- a report which sets out the underlying analysis carried out and provides a narrative which supports the identified improvements and network

1.1 LCWIP Structure

Government LCWIP guidance sets out the LCWIP process which includes six stages, as identified below

Stage	Name	Description
1	Determining Scope	Establish the geographical scope of the LCWIP and
		identification of the existing walking and cycling network.
2	Gathering Information	Identify existing patterns for cycling and walking and
		potential new journeys. Review existing conditions and
		identify barriers. Review related transport and land use
		policies.
3	Network Planning for Cycling	Identify origin and destination points and cycle flows.
		Convert flows into a network of routes and determine the
		type of improvements required.
4	Network Planning for Walking	Identify key trip generators, core walking zones and routes,
		audit existing provision and determine the type of
		improvements required.
5	Prioritising Improvements	Prioritise improvements to develop a phased programme for
		future investment.
6	Integration and Application	Integrate outputs into local planning and transport policies,
		strategies, and delivery plan



1.2 North West Leicestershire Local Cycling and Walking Infrastructure Plan

Sustrans has been commissioned by North West Leicestershire District Council (NWLDC) to produce their first Local Cycling and Walking Infrastructure Plan (LCWIP) for towns within their district, to build on the Cycling and Walking Strategy¹ produced by NWLDC in 2021. This Strategy sets out the approach that the District Council and partners intend to take at a local level to deliver on the Government's ambitions to make England a great walking and cycling nation. The Strategy provided the evidence base for Sustrans to develop this LCWIP.

The creation of a LCWIP will enable NWLDC to:

Identify short, medium- and long-term investment priorities for cycling and walking infrastructure improvements

Ensure that consideration is given to cycling and walking within both local planning and transport policies and strategies

Make the case for future funding for cycling and walking infrastructure

The study will help identify cycling infrastructure which links jobs and communities together, with the aim of increasing mobility by means of sustainable transport methods helping to improve air quality, modal shift from motorised forms of transport and seek to reduce delays in the highway network.

One of the main ways of delivering these objectives is to create a high quality and well-integrated walking and cycling network which maximises sustainable transport movements to services and facilities, employment, shops, education and leisure opportunities.

This is the first iteration of NWLDC's LCWIP and covers the urban areas of Ashby-de-la-Zouch, Ibstock, Coalville, Measham, Kegworth and Castle Donington. The report aims to provide the context and network planning to prioritise a list of walking and cycling routes that should be targeted for improvement in the future. The routes identified within this report offer the greatest opportunity to increase the numbers of walking and cycling trips in the above towns and have been prioritised using a range of factors.

The prioritised schemes are based on analysis that identifies the most important corridors requiring improved walking and cycling facilities. To develop the schemes further, design feasibility and concepts are required which assess scheme cost and deliverability, in turn leading to funding opportunities.

Local user knowledge is key to successful delivery of schemes and NWLDC welcomed input in developing the strategic network of schemes. Delivery of the plan will be evidence led, based on a

¹ https://www.nwleics.gov.uk/pages/local_cycling_and_walking_stategy



range of data sources, and informed by the views and aspirations of residents, visitors, and local groups across the areas this report focusses on.





2. Determining Scope

Following discussion with NWLDC and the launch of the Cycling and Walking Strategy the scope of this LCWIP was set out to cover the urban areas of Ashby-de-la-Zouch, Ibstock, Coalville, Measham, Kegworth and Castle Donington.

2.1 Establishing the Geographical Extent

The geographical extent of this LCWIP has been informed by NWLDC's Cycling and Walking Strategy and will cover the urban areas of of Ashby-de-la-Zouch, Ibstock, Coalville, Measham, Kegworth and Castle Donington. These areas represent the key urban locations within North West Leicestershire in terms of destinations and also residential areas.



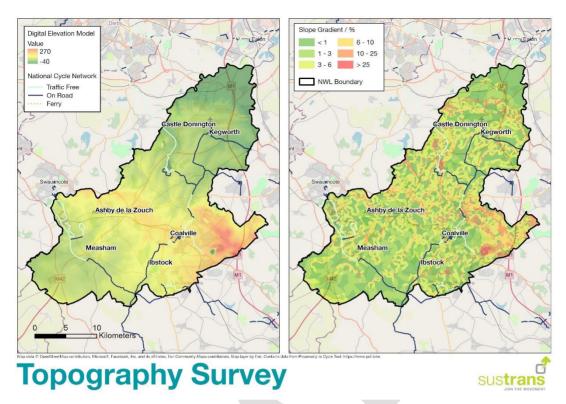


Figure 1 Topographical overview of North West Leicestershire with the existing National Cycle Network (NCN).



3. Gathering Information

The six urban areas within North West Leicestershire are compact towns where cycling and walking distances are relatively modest and often cover the whole the urban area, as such it is felt that the urban areas are particularly suitable for walking and cycling, which was observed at the time of audit.

LCWIPs are evidence led and based on data that evaluates several existing and potential trips that could feasibly be made by walking or cycling if current conditions were improved. A range of tools and information sources were used to examine this data to inform the LCWIP. Sources and methodology are detailed in the following section, and include:

Transport network – including the existing walking and cycling network, along with synergies with other NWL planned and proposed transport and land use schemes that could potentially have an impact on walking and cycling

Travel patterns – data about existing walking and cycling trips, and journeys that people currently make using other modes of transport. This information informs where walking and cycling may be able to contribute to all or part of a journey

Location of significant trip generators – location and size of existing and planned trip generators, such as key employment sites, transport interchanges, education facilities and housing developments

3.1 National Walking and Cycling Levels

To inform North West Leicestershire's current walking and cycling levels, the Department for Transport's National Travel Survey for England gives a good understanding of the current picture for walking and cycling. Below are some key relevant statistics from the survey's 2019 iteration:

Travel Mode in England 2019

61% of all trips were made by car, either as driver or passenger. 26% of trips were made by foot, 5% by bus, 3% by train, 2% by cycling and 2% by other modes.

68% of trips were under 5 miles and 24% of trips were under 1 mile. This varies by mode of travel: nearly all walks are under 5 miles (99%), compared to 56% of car driver trips and 8% of surface rail trips.

Active modes of travel (walking and cycling) account for 28% of all trips and 4% of all distance travelled, as active trips tend to be shorter distance trips. From 2002 to 2019, the number of trips by



walking has declined by 5% and total number of miles travelled per year has changed slightly, decreasing by 1%. For cycling, annual distance travelled has increased by 41% although the number of trips by cycling has declined by 10% between 2002 and 2019. This change is shown in the graph below:



Figure 2 - Change in the annual number of trips made by active modes

There were 249 walking trips per person per year on average in 2019, which decreased from 262 per walking trips per person in 2018. 80% of all trips under 1 mile were made by walking.

There has been a decline in the number of trips and the distance of trips by car between 2002 and 2019, by both drivers and passengers. Number of trips has declined by 13% for the car driver and 17% for passengers, and the distance of trips taken by car has declined by 13% for car drivers and 14% for passengers.

Journeys less than 1 miles were most frequently made by walking (80%), although all distance bands above 1 mile, travelling by car was the most frequent mode of travel. Buses were mainly used for medium-length trips, between 2 and 25 miles.

Bus trips were highest amongst the 17-20 year old age range accounting for 12% of their total trips 24% of trips were under 1 mile and 68% of trips were under 5 miles.

The average bicycle trip length increased from 2002 to 2019, with an average 3.3 miles (2.1 miles in 2002), Walking trip lengths remained largely unchanged between 2002 and 2019, which a slight increase of average walking trip distance being 0.68 miles in 2019, compared to 0.69 miles in 2002. Time spent on bicycle trips also increased to 23 minutes per trip in 2019 from 18 minutes per trip in 2002.

On average each person walks 205 miles per year, spending an average of 17 minutes walking per trip.



School Travel

National Travel Survey data from 2019 showed for 5-10 year olds the average trip length to school is 1.6 miles, and for 11-16 year olds the average trip length is 3.5 miles.

Primary school journeys in 2019 (children aged 5-10) 46% walk to school, 47% are driven, 1% cycle, 5% take a private or local bus to school.

Secondary school journeys in 2019 (children aged 11-16) 39% walk to school, 26% are driven, 3% cycle and 29% take a private or local bus to school.

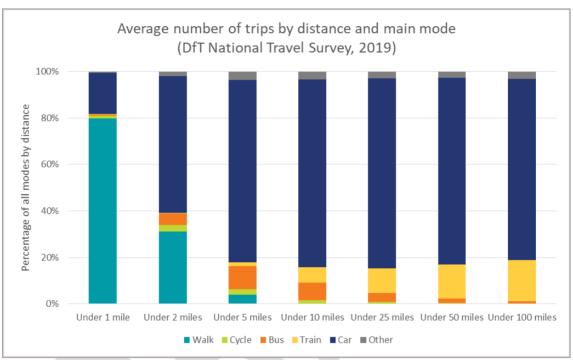


Figure 3 trips by distance and mode 2019

Travel to work

2019 commuting data by modes shows that on average 12% of people walked to work and 4% cycled. 8% of people travel by bus and 12% by train. Travelling by car as a passenger or driver was the most frequent mode at 61%.

On average people travelled 1,276 miles per year for commuting purposes, an decrease in mileage compared to 2002 of 124 miles. The average length of a commute in 2019 was 9.1 miles, compared to 8.5 miles in 2002.

Reasons for Travel

The reasons trips were made were also recorded, and on average:

- 26% for other leisure
- 19% for shopping

- 18% for personal business and other escort
- 15% for commuting



- 13% for education and escorting to education
- 6% for other reasons
- 3% for business

3.2 Local Walking and Cycling LevelsAt baseline (2011 Census), the proportion of commuters who cycled to work in Leicestershire was 3.3%, compared to the national average of 3.1% in England and Wales as a whole. The percentage of cycling expected was 3.3%, based on the distance and hilliness of commutes in the region using the baseline model for England and Wales.





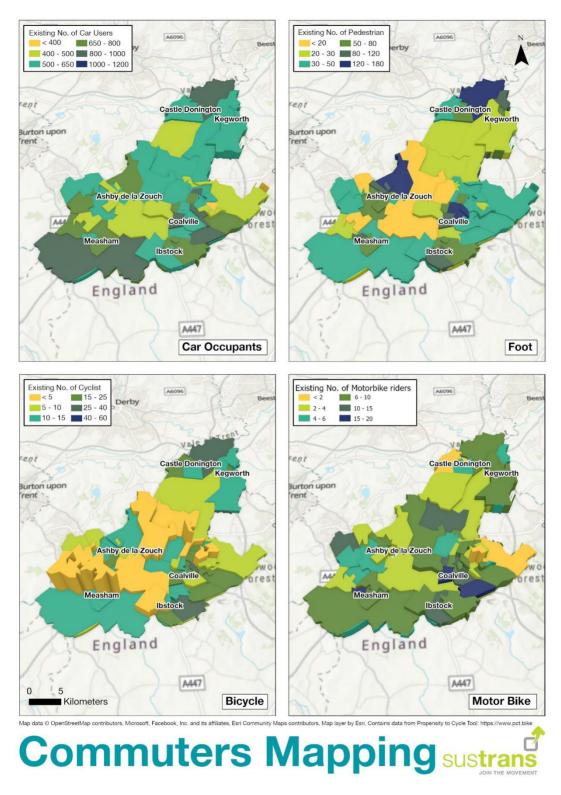


Figure 4 Census 2011 travel to work data visualised by transport mode



4. Network Planning for Cycling

This section describes the methodology adopted for the Network Planning for Cycling stage of North West Leicestershire LCWIP.

During this stage an analysis of data and local knowledge was completed so that key routes could be mapped.

Once identified, physical route audits were undertaken to determine what high level infrastructure improvements could be made to improve route quality and make cycling more likely to be adopted for journeys in the future.

The National Cycle Network (NCN) within North West Leicestershire and existing "LTN Street Statistics" are shown below for each urban area. A low traffic neighbourhood (LTN) is a scheme where motor vehicle traffic in residential streets is greatly reduced. This is done by minimising the amount of traffic that comes from vehicles using the streets to get to another destination. This is often referred to as 'through-traffic' or 'rat-running'. Private motorised vehicles still have easy access to all homes and businesses without driving directly through the neighbourhood.

This data was used to inform audits and potential alternative alignments to those proposed in the Cycling and Walking Strategy. The routes identified in the Cycling and Walking Strategy were identified through a process that drew on multiple sources summarised below. Further detail can be found in the full version of the Cycling and Walking Strategy.

- The Propensity to Cycle Tool (PCT), to identify potential cycling routes based on where cycling is currently common and where it has the greatest potential to grow
- Literature review of all relevant local documentation, including NWL's Local Plan and the current cycling strategies for Ashby, Kegworth and Coalville
- Participation in a range of consultation sessions with various stakeholders, to ascertain key destinations for cycling and walking both within and beyond the Authority.
- Online survey to allow people from the wider community in NWL to express their views



- Consultation with neighbouring local authorities to gain insight into current schemes and future proposals in the areas.

The LTN Statistics maps indicate where roads are either:

- A LTN/ have no through traffic
- A through-route where rat running potentially occurs
- A through-route with traffic calming

Data was sourced from CycleStreets and is a result of automated analysis of OpenStreetMap data which means it is high level and indicative and may not be accurately reflect road conditions. The maps have been used in this LCWIP to indicate potential quiet-way re-alignments for routes.

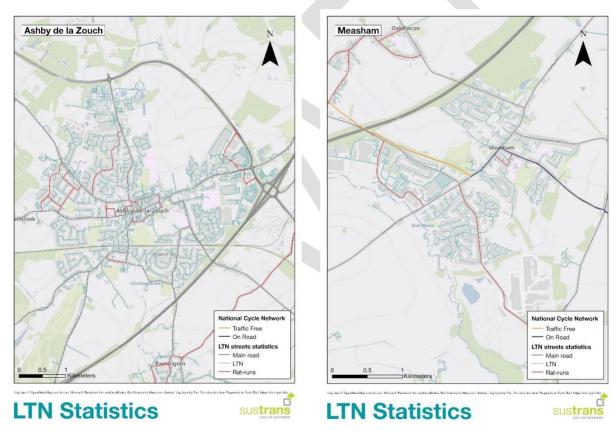


Figure 5 LTN Statistics maps



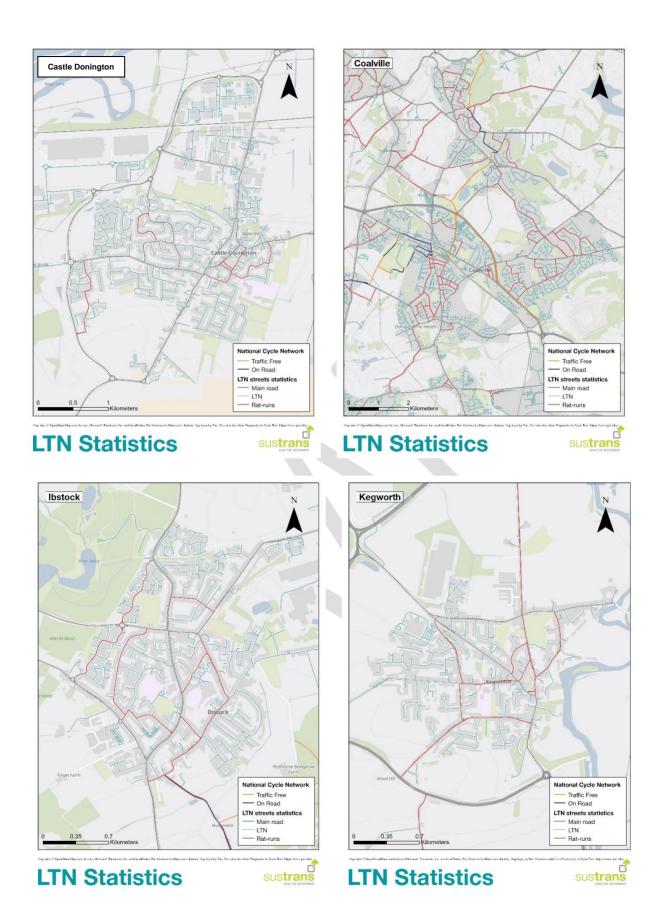


Figure 6 LTN Statistics maps



4.1 Cycle route prioritisation tools

Propensity to Cycle Tool (PCT)

The 2011 census data has been incorporated into the Propensity to Cycle Tool (https://www.pct.bike), which is a nationwide (England and Wales) web-based tool for estimating cycling potential down to the street level. The PCT covers travel behaviour data for commuting and travel to school. Cycle commuting data is based on the 2011 Census and cycle to school based on the 2011 School cycling Census. Other trip purposes and more recent data are not currently available nationwide at the geographic resolution required for the PCT. At the time of writing the 2021 census had taken place but no data was available.

The PCT is focused on the fastest and most direct route alignments. Whilst several cycle users may opt for the quieter route options the bigger increases in capacity and modal shift may necessitate significant improvements in the faster more direct options.

The PCT tool does not identify what type of infrastructure to implement on each road, however it identifies the most plausible route options where investment is likely to have greatest impact based on the data. The PCT was used in the Cycling and Walking Strategy, almogside other sources of data, toidentify and prioritise the cycle route options incorporated into the LCWIP.

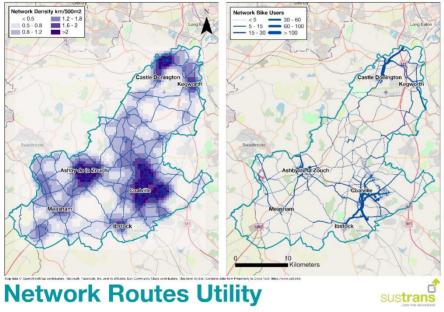
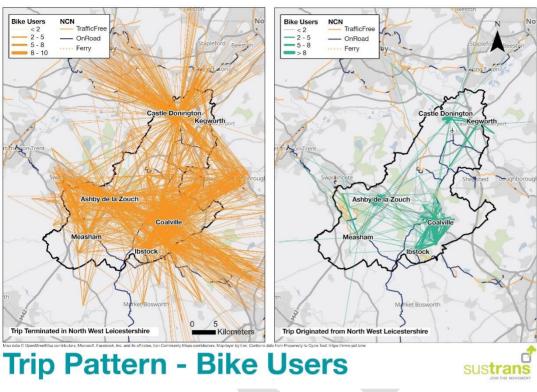


Figure 7 Network density and user numbers, Census 2011





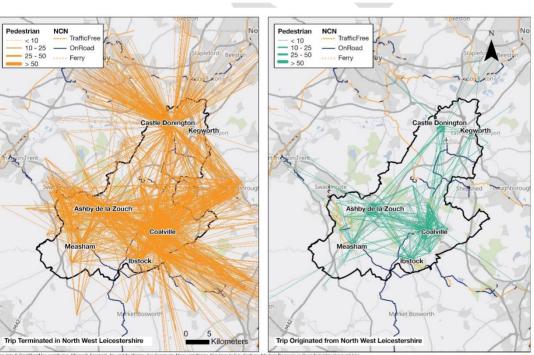


Figure 8 Trip patterns



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Trip Pattern - Pedestrian

It also enables several different scenarios to be investigated to understand how user numbers may increase given different levels of intervention. This analysis is useful when developing business cases for identified routes. The baseline for this analysis is the 2011 census data, as seen previously, and the PCT can relate the point-to-point travel to work data based on the Lower Super Output areas to the existing highway network. It uses the Cycle Streets routing algorithm to apportion the travel to work points to the available routes.

Further, the PCT tool can be used to appraise potential uplift in cycling levels given a number of different scenarios.

THE GO DUTCH SCENARIO

The Go Dutch scenario in the PCT tool is an ambitious vision for what cycling could look like.

People in the Netherlands make 28.4% of trips by bicycle, fifteen times higher than the figure of 1.6% in England and Wales. In addition, cycling in England and Wales is skewed towards younger, male cyclists by contrast in the Netherlands cycling remains common into older age, and women are in fact slightly more likely to cycle than men This means that the difference between England and the Netherlands is particularly large for women and older people.

E-BIKES SCENARIO

The E-Bikes scenario in the PCT tool is a model of the additional increase in cycling that would be achieved through the widespread uptake of electric cycles ('ebikes'). This scenario is designed as an extension of the Go Dutch scenario, making the further assumption that all cyclists in the Go Dutch scenario own an ebike.

It builds on the Go Dutch scenario by applying three additional ebikes scaling factors to account for the increased willingness of ebike users to cycle long distance, hilly and simultaneously long distance and hilly routes.

Whilst this part of the UK is not excessively hilly the rise of E-bike usage is increasing the distances that people feel capable of undertaking, and when coupled with high quality segregated infrastructure can offer commuters choice.



4.1 Trip Generators

To identify the demand for a new network, the main destination points were plotted within the NWLDC area using a Geographic information systems (GIS). Various trip generators were identified, including:

- Accommodation, eating and drinking
- Attractions
- Commercial services
- Education and health
- Manufacturing and production
- Public infrastructure
- Retail
- Sport and entertainment
- Transport

The proposed cycle route maps for each town included in the Cycling and Walking Strategy show how the priority routes identified relate to key destinations (trip generators) such as employment and leisure as well as residential areas within and surrounding the towns, including areas of housing growth, from where most cycling trips will originate.

The identified origins and destinations are plotted on the following maps. These are illustrative of how points of interest are clustered, with the density of points of interest reflecting hotspots of potential travel destinations.



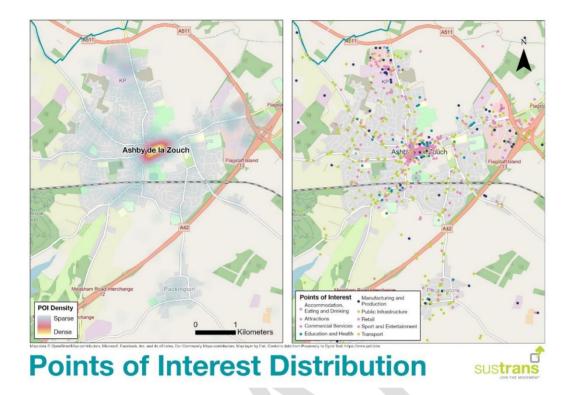
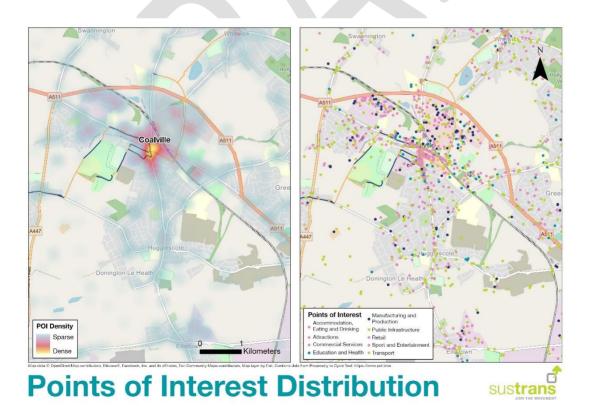


Figure 9 Ashby points of interest



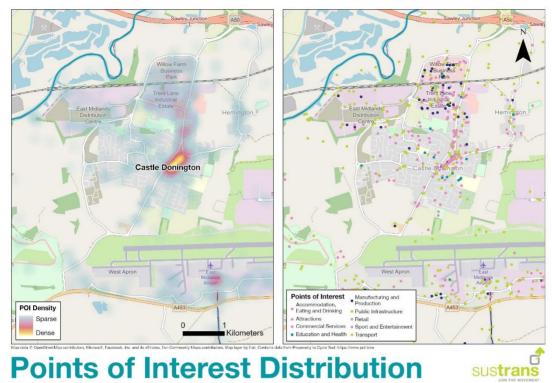


Figure 11 Coalville and Castle Donington points of interest

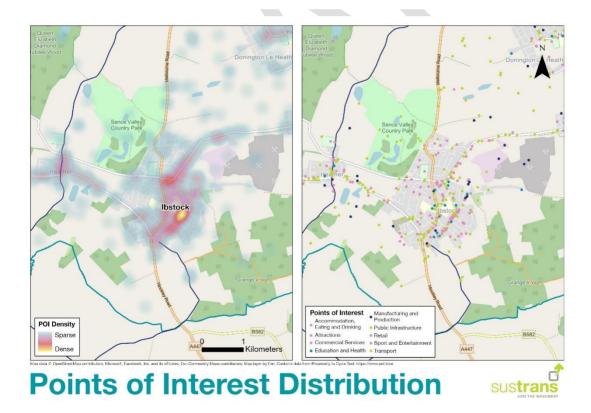


Figure 10 Ibstock Points of Interest



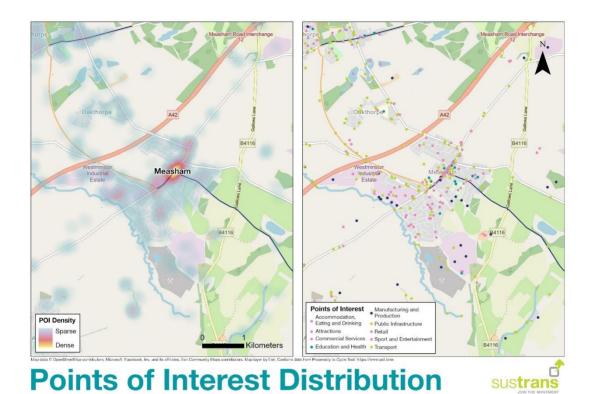


Figure 12 Measham Points of Interest

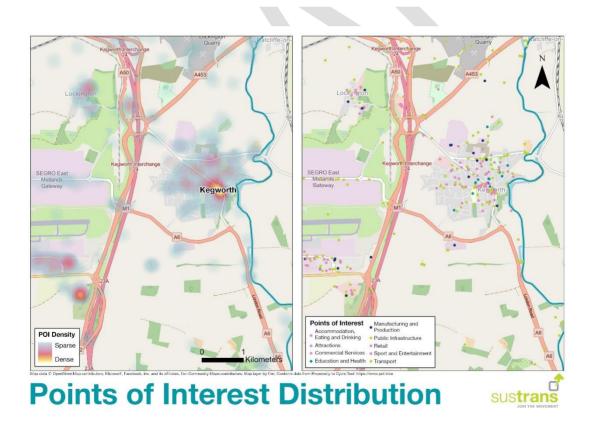


Figure 13 Kegwoth Points of Interest



4.2 Analysing Walking and Cycling Collision Statistics

Using the Cycle Streets Collision Data reports form 2011 heat maps have been produced identifying locations where collisions involving pedestrians are more prevalent. This analysis represented graphically can be used alongside the other tools detailed above to inform route selection based on current patterns of usage and locations that require improvements for pedestrian and cycling safety. Maps are detailed below.

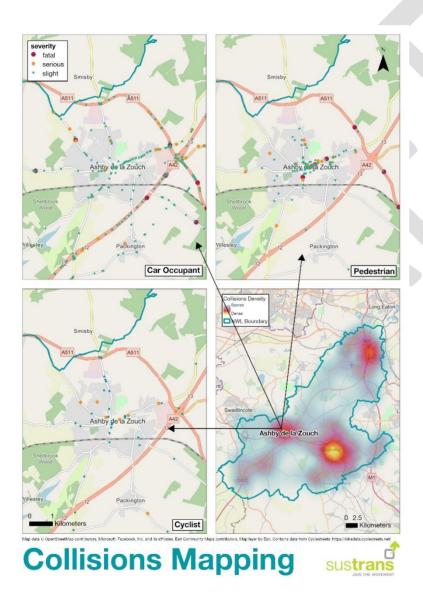


Figure 14 Ashby collision map



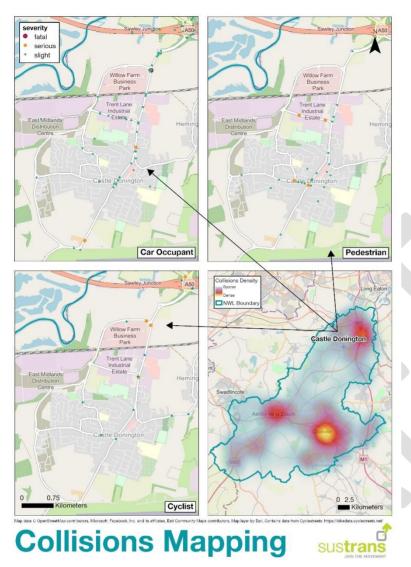


Figure 15 Castle Donington collision map



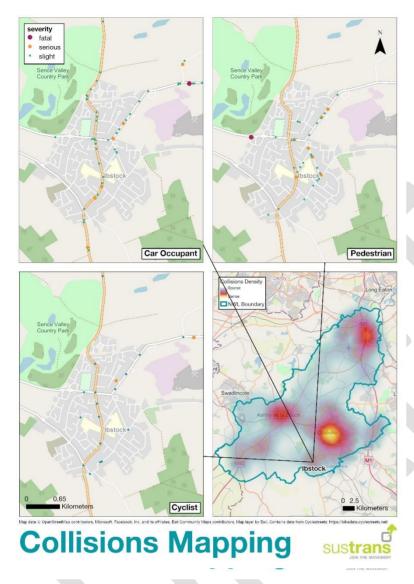


Figure 16 Ibstock collision map



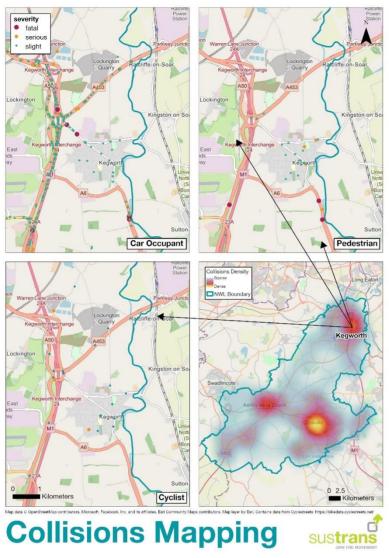


Figure 17 Kegworth collision map



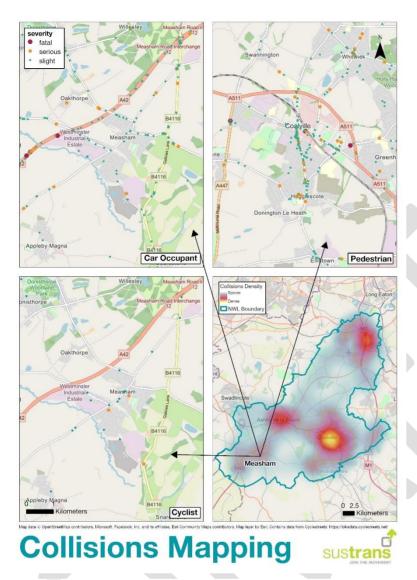


Figure 18 Measham collision map



4.3 Route Selection

The active travel priorities of the areas covered by the LCWIP (as well as surrounding boroughs) were gathered through consultation and engagement and this informed the selection and prioritisation of routes included in the NWLDC Cycling and Walking Strategy and used in this LCWIP. Further detail on the consultation and engagement process and a selection of key messages emerging from it can be found in the <a href="https://www.nwl.numer.com/www.nwl.numer.com/www.nwl.numer.com/www.nwl.numer.com/www.nwl.numer.com/www.numer.com/www.numer.com/ww.num

In summary the objectives of the Strategy and LCWIP are to:

- Create a highway infrastructure to support and encourage cycling and walking for all
- Work with partners to create a greener infrastructure
- Ringfence funding to support cycling and walking infrastructure
- Develop and support behavioural change processes and opportunities

Routes were prioritised based on need and the impact the route can have on increasing modal shift informed by data analysis described in previous sections. This was agreed through consultation with NWLDC Officers, with Ward Councillors engaged, during the process of developing the Cycling and Walking Strategy. There were no set timescales with priorities being identified to help be ready if/ when funding becomes available. The priority walking routes are listed in the table below and the cycling routes can be seen graphically in section 4.6 and in the table in section 4.6. They are also shown in more detail in Appendix 3.

Priority walking routes

Reference	Description	Destinations		
Ashby				
A-W01	Market Street from Derby Road roundabout to North Street junction	High Street		
A-W02	North Street from Brook Street roundabout to Wood Street	Leisure Centre, Ivanhoe College, Learning Centre		
A-W03	South Street from Bath Street to Market Street	Castle, Bath grounds, Memorial grounds		
A-W04	Burton Road	Ashby primary school, Castle Medical group		
A-W05	Kilwardby Street	Ashby Hill Top primary school		
Castle Doni	ngton			
CD-W01	The Spittal	Pavilion, Playground/Park		
CD-W02	The Green	Orchard Community Primary School		
CD-W03	Bondgate	Library, Bus Station, Parish Council		



CD-W04	Delven Lane to Clapgun Street	Care Home, St Edward's School, Pre-School, College, Wellbeing Centre
CD-W05	Borough Street	Surgery, Church, Retail, Post Office
Coalville		
C-W01	Ashby Road from Memorial Tower to Snibston Colliery Park	Snibston Colliery Park, Urban Forest Park, All Saints Primary School
C-W02	High Street from Memorial Tower to Whitwick Road	High Street, Bus and Coach Station
C-W03	London Road from Whitwick Road to Broom Leys Road	Coalville Park
C-W04	Belvoir Road from Memorial Tower to Avenue Road junction	
C-W05	Broom Leys Road from junction with London Road to Surgery	Broom Leys Road Surgery, Broom Leys primary school
C-W06	Ashburton Road from Manor Road to Central Road	Hugglescote primary school
C-W07	Thornborough Road and Mantle Lane from Memorial Tower to A511 roundabout	
Ibstock		
I-W01	Leicester Road	Skate park
I-W02	Chapel Street	
I-W03	High Street	High street, Ibstock & Barlestone surgeries, Leisure centre
I-W04	Reform Road	Between Melbourne Road and High Street
I-W05	Melbourne Road	
I-W06	Central Avenue	Schools
Kegworth		
K-W01	Derby Road from Nottingham Road to High Street	High Street
K-W02	High Street	Kegworth primary school
K-W03	Dragwell	Orchard Surgery
K-W04	Nottingham Road	
K-W05	Side Ley	Play area
K-W06	Mill Lane	Kegworth village hall, Mill Lodge
Measham		
M-W01	High Street south	Ashby Woulds heritage trail, proposed Landrover site, leisure centre
M-W02	High Street north	High street
M-W03	Bosworth Road	Primary schools, park, medical unit

Table 1 Details of walking route by location and reference



4.4 Community Engagement

A range of individuals and organisations have been engaged in the development of NWLDC's Cycling and Walking Strategy, which informs this LCWIP. The engagement consisted of four phases of consultation:

- Public consultation: An online survey was established to allow an opportunity for the public
 to have its say on where priorities should be directed towards to supporting cycling and
 walking.
- Stakeholder engagement: All interested parties, including, local cycling clubs, rambling organisations and strategic bodies were invited to take part in virtual face to face consultation
- **Town and parish councils**; A specific session was undertaken to identify the key cycling and walking destinations within all town and parish councils
- **Neighbouring authority engagement:** These were consulted with to understand the current and future ambitions they have for cycling and walking.
- NWLDC Elected Members were engaged.

A summary of the consultation findings is included in NWLDC's Cycling and Walking Strategy. Key outcomes of the online survey conducted in summer 2021 are summarised below.

Results showed that overall, most people surveyed **cycled for leisure** (94% of respondents) and **walked for general exercise purposes** (92%). Over half of respondents reported walking to undertake everyday activities (55%). With less than one quarter cycling to do everyday activities (24%). A **lower proportion of respondents' cycle** (17.5%) **or walk** (20%) **to/from work and/or /school**.

To encourage increased levels of cycling, respondents were keen to see **better cycling provision both on highway and for off road journeys** (85%). Respondents were also keen to see better *cycle parking infrastructure*, including safe cycle parking at destination points (53%).

To encourage people to walk more, respondents wished to see **safer routes including better lighting and safer public realm** (72.5%) and **better surfaced and wider paths** (72.5%). In addition, they wanted better pedestrian links between public transport nodes to encourage multi modal journeys and to discourage people from using cars (41%).



4.5 Route Selection Tool and Route Audits

The routes identified in the North West Leicestershire Cycling and Walking Strategy were physically audited. The routes were assessed on site to identify what measures could be implemented to provide improvements to achieve the targeted uplift in cycle levels.

The audit involved completing physical site surveys, cycling each route in both directions, and assessing feasibility. If it was considered that a route cannot be improved to an acceptable level, the next most direct route or an alternative was assessed. The audit focused on the five core design outcomes:

- A coherent network with a consistent route quality and easy to navigate
- A direct and fast route between origins and destinations
- A network that is through an environment that feels safe and removes conflicts with motor vehicles
- A network that is smooth and comfortable to ride
- An attractive network that makes cycling a pleasurable activity

The map on the following page (*figure 21*) shows the routes that were audited as part of the LCWIP. Appendix 3 also includes a map for each settlement, which shows these routes in more detail.



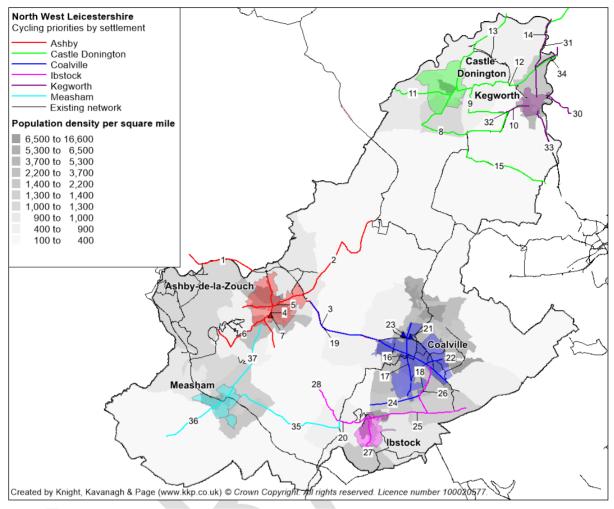


Figure 19 Cycle priority routes as identified in NWLDC's Cycling and Walking Strategy

4.6 Establishing Cycling Infrastructure Improvements

To increase levels of cycling in the urban areas, the quantity and quality of provision in certain locations requires significant improvement in terms of:

- Direct and joined up routes that improve access to trip generators and destinations, especially to areas of new development
- Provision of proportional space
- Best practice design for route widths and junctions
- Safe and direct crossing points
- Higher standards of safety and visibility including signage / wayfinding, surveillance and lighting



- On-road sections with segregation from traffic
- Quiet way measures to reduce traffic speed and volume to allow on-highway cycling

The proposals suggested are intended to appeal to new cyclists and to encourage less confident cyclists to make more journeys by bicycle. Where possible, the proposed facilities are separated from traffic, especially where traffic volumes are high or average vehicle speeds are greater than 30 mph. If it can be achieved, a minimum of 300mm buffer between the cycle way and vehicles will be applied to provide additional protection from passing vehicles and doors opening from parked cars. The buffer will also assist pedestrians crossing the cycleway.

Quiet way measures are proposed where motor traffic flows are light and speeds are low, cyclists are likely to be able to cycle on-carriageway in mixed traffic with traffic flows of less than 2,500 vehicles per day and speeds of less than 20 mph. Some of the more rural roads surrounding the urban areas in this LCWIP have conditions likely to support quiet ways, although robust data collection would be required at design stage. Traffic calming and traffic management techniques can be used to reduce motor vehicle speed and volume to make cycling in mixed traffic less hazardous and more comfortable. These routes can also involve removal of non-local through-traffic.

Detailed cycling audits are appended. It is important to note that solutions identified in LCWIP audits are high level concepts and feasibility studies for each route would be required to progress these further. This would involve defining the exact alignment of the route (e.g., which side of the road provision in on, whether it is on or off the highway, etc.) and identifying the most appropriate interventions (e.g., crossing location and type, cycle lane design, etc.) at a high level of detail. This allows accurate costings to be determined to be used in funding bids and proposals. Studies would typically also incorporate engagement with communities to consult and in some cases co-create and design spaces and routes that serve the people living and working in the localities. This process also allows for competing local priorities to be considered, safety audits to be undertaken, and ensures standards are complied with.

Table 2 List of high level improvements noted at route audit stage

Route Reference	Route Name	High level description of infrastructure improvements noted during the audit stage
Ashby		
A-C01	Cloud Trail Extension	New traffic free route creation (6.175km), new crossings toucan (x2)), new multi-user bridge bridge (x1), new ramp accesses (x1)
A-C02	Link to Hicks Lodge	New traffic free route creation (0.5km), new toucan crossing (x1) quiet way treatment (0.4km)
A-C03	Link to Coalville	Please refer to C-C04 Route 4 – Coalville to Ashby
A-C04	Link to proposed station and towards Packington	New traffic free route creation (0.5km), existing route resurfacing (1.1km), new parallel crossing (x2), low level quiet way treatment (0.35km), junction improvements (x1)
A-C05	Link to Swadlincote	New traffic free route creation (1.5km), new crossings toucan (x1) parallel (x1)



A-C06	North south through the town centre, from roundabout to bypass	New traffic free route creation (0.25km), new crossings toucan (x2) parallel (x3), wayfinding and signage, lighting improvement
A-C07	Link to Boundary from bypass roundabout through the town centre	New traffic free route creation (1.8km), new crossings toucan (x4) parallel (x6), junction remodelling (x2)
Castle Don	ington	
CD-C01	Green way around the Airport/EMEG	New traffic free route creation (1km), widen existing traffic free route (3km), new crossings toucan (x4), low level quietway treatment (2.4km), high level quietway treatment (1km).
CD-C02		New traffic free route creation (1.9km), resurfacing existing traffic free route (1.1km), lighting.
CD-C04	Linking Kings Mills	New parallel crossing (x4), low level quietway treatment (1.6km), high level quietway treatment (0.85km).
CD-C05	Linking to Ratcliffe on Soar	New traffic free route creation (0.9km), widen traffic free route (2.1km)
CD-C07	Link north to Sawley and beyond	Widen existing traffic free route (2.85km), resurface existing traffic free route (0.9km), New parallel crossing (x4), new crossings toucan (x4).
CD-C08	Strategic link to Loughborough	New traffic free route creation (2.45km), resurfacing existing traffic free route (1.3km), low level quietway treatment (1.1km), high level quietway treatment (0.6km).
Coalville		
C-C01	East to west through the town centre	Widen existing traffic free route (1.75km) new crossings toucan (x7) parallel (x10), low level quiet way treatment (1km), junction remodelling (x1)
C-C02	North to south through town centre	High level quiet Way treatment (1.65km), new crossings toucan (x1) parallel (x1), signage and wayfinding
C-C03	Coalville to Hugglescote/ Ellistown	Widen existing traffic free route (4.9km) toucan crossing (x2)
C-C04	Coalville to Ashby	New traffic free route creation (4.5km)
C-C05	Link to Sence Valley	Please refer to I-C05 Route 5 – Strategic link to Measham.
C-C06	North to south through town centre	New traffic free route creation (0.5km), new crossings toucan (x6) parallel (x3), signage and wayfinding, junction remodelling
C-C07	Link to town centre to hospital	Widen existing traffic free route (0.8km) toucan crossing (x4) high level quiet way treatment (0.5km)
C-C09	Connection to Cloud Trail	New traffic free route creation (2.7km), toucan crossing (x1)
I-C01	Ibstock to Ellistown and Bardon Hill	New traffic free route creation (1.9km), resurface existing route (0.5km) low level quiet way treatment (0.25km), wayfinding and signage



I-C02	Strategic link to Coalville	Please refer to C-C03 Route 3 – Coalville to Hugglescote/Ellistown.
I-C03	Route through the town centre	New traffic free route creation (1.4km), new crossings toucan (x1) parallel (x4), junction remodelling (x1), junction improvements (x1)
I-C04	Strategic link to Ashby	Please refer to M-C02 Route 2 – Strategic route to Ibstock.
I-C05	Strategic link to Measham	New traffic free route creation (0.3km), resurface existing route (1.25km), wayfinding and signage and lighting improvements
Kegworth		
K-C01	Link to Castle Donington employment areas	New traffic free route creation and quiet way treatment (1.25km)
K-C02	Link north using Long Lane towards Long Eaton	Low level quiet way treatment (5.6 km), areas of higher-level quiet way treatment, signage and wayfinding
K-C03	Route to Sutton Bonnington	New traffic free route creation (1km), new crossings toucan (x2) parallel (x1), junction improvements (x1)
K-C04	Route to A6 existing shared use provision	New traffic free route creation (0.25km), toucan crossing (x1) low level quiet way treatment (0.25km)
K-C06	Link Kegworth to Castle Donington / East Midlands Gateway	Widen existing traffic free route (0.5km), junction improvements x1.
K-C07	Link Sawley Marina with the K-C02 route at Lockington Quarry via Warren Lane and Public Bridleway/Footpath	Leicestershire County Council to audit route and identify interventions.
Measham		
M-C01	Creating a link between the new Jaguar Land Rover site and Measham	New traffic free route creation (2.75km), widen existing traffic free route (0.3km) new crossings toucan (x1) parallel (x5)
M-C02	Strategic link to Ibstock	Low level quiet way treatment (4km), widen existing traffic free route (0.05km) parallel crossings (x2) signage and wayfinding
M-C03	Strategic Link to Ashby	Widen existing traffic free route (2.3km) parallel crossing (x5) parallel, low level quiet way treatment (1km) with areas of higher level quiet way treatment, junction remodelling (x1)



4.7 Economic Appraisal of Cycling Schemes

The cost for implementing new infrastructure has been estimated from recently built schemes across the Midlands, with costs subject to change a low and high estimate has been used to give an indicative high-level estimate for each route. The range of costs are shown in the below table along with a narrative of high-level solutions. A Sustrans wide cost calculator tool was employed to generate the indicative costs estimate.





Reference	Description	High level improvements description	High level cost estimate
Ashby			
A-C01	"Cloud Trail Extension"	Extending the existing Cloud Trail to connect to Ashby Town Centre. Full feasibility study is required due to number of road crossings and landowners. High level cost estimate used.	£9.161-£10.65 million.
A-C02	Link to Hicks Lodge	Quietway treatment along Willersley Lane and improved crossing facilities to link to Hicks Lodge. Creation of new traffic free path.	£512-601,000
A-C03	Link to Coalville	Please refer to C-C04 Route to Ashby	
A-C04	Link to proposed station and towards Packington	The potential re-introduction of the Ivanhoe Line could see the number of cycling journeys to Ashby station ride as part of multi-modal journeys. To enable these journeys it is recommended that a traffic-free cycle route is installed along Tamworth Road, and quiet way treatment and resurfacing of the existing bridleway is considered.	£615-£777,000
A-C05	Link to Swadlincote	The existing shared use route along the bypass is adequate, but a signalised crossing at the junction with Ashby Road is recommended. A traffic free path adjacent to the A511 from the Ashby Road roundabout to link to the existing route onwards from Hepworth Road.	£781-£958,000
	North south through the town centre, from roundabout to bypass	The existing shared use provision from the A511 roundabout to the north needs extending and improving to ensure pavement parking is not constraining width and function. The existing traffic free path that links to the Leisure centre has recommended improvements but offers a direct route on the north south corridor. Side road junctions and additional crossing points are recommended.	£781-£985,000
A-C07	Link to Boundary from bypass roundabout through the town centre	A safe route east to west through the town centre is required and would be well used by school and work commuters, as well as those accessing the town centre. Like the walking recommendations, a re-design of the main section of Market Street is recommended to give more space to pedestrians and cyclists and improve safety for all. This includes continuous surfacing and a 20mph speed limit.	£2.32 - £2.92 million

Castle Do	nington		
CD-C01	Green way around the Airport/EMEG (a)	New off-road connection alongside the A453 Upgrading existing shared-use routes, widening to meet national standards Adding signalised crossing points on the route Quiet way treatment on Hill Top/High Street to improve safety	£3.9-£5.3 million
CD-C02	Green way around the Airport/EMEG (b)	Creating new off-road lit airport greenway link Quiet way treatments to roads through EM Airport site to bypass A453 and on Hill Top/High Street (continuation of CD-C1) Upgrading existing shared-use routes, widening to meet national standards	£800-965,000
CD-C04	Linking Kings Mills	Quiet way treatment and adjustments to junctions on Park Lane to increase safety Crossings added to roundabout Quiet way treatment along the rest of Park Lane	£2.6-3.75 million
CD-C05	Linking to Ratcliffe on Soar	Upgrading existing Dark Lane traffic free route. New off-road route alongside Remembrance Way alongside upgrades to existing shared use	£660-£795,000
CD-C07	Northern link to Sawley	Upgrading of existing shared use routes predominantly along Tamworth Road Adopt new off-road link via London Road and upgrade of Donington Lane Footway widening to create off-road provision in Castle Donington	£1.9-2.4 million
CD-C08	Strategic link to Loughborough	Quiet way treatments through Diseworth and Long Whatton villages New traffic free route created between the villages.	£2.2-3.0 million
Coalville			
C-C01	East to west through the town centre	There is existing shared use provision along Ashby Road which needs extending to provide extended provision, and enforcement to stop pavement parking. A number of additional Toucan crossings and junction remodelling are presented. This route makes use of the high quality traffic free path through Snibston Colliery Park.	£2.89 - £3.64 million



C-C02	North to south through town centre	Quiet way treatment in main shopping area alongside pedestrian scheme, alternative quiet way alignment south.	£468-£621,000
C-C03	Coalville to Hugglescote/ Ellistown	Construction of a new Greenway using disused railway. Full feasibility study and design recommended.	£1.43 - £1.75 million
C-C04	Coalville to Ashby	Route considered unlikely to be feasible – dual carriageway with safety concerns around adjacent segregated infrastructure. See cycle audit appendices for details. High level cost assumed on basis of creating new traffic free route in adjacent fields, landowner consent and ecological barriers pose risks to the project.	£2.57-£3.68 million
C-C05	Link to Sence Valley	Please refer to I-C05 Route 5 – Strategic link to Measham	
C-C06	North to south through town centre	Extend and improve existing shared use provision, to meet Memorial Square, with cycle	£2.21 - £2.83 million
	(Memorial Square to A511)	route through the square, with widening required in some locations. Review signalised crossing to provide safe access to the College across the A511.	
C-C07	Link to town centre to hospital	Some existing shared use offer adequate provision but requires widening in places. Redesign of the A511 junction recommend toimprove provision for cyclists and pedestrians.	£1.07-£1.406 million.
C-C09	Connection to Cloud Trail	Investigate feasibility of converting the disused Leicester and Swannington Railway into a	£1.09 million - £1.33 million.
		multi-user Greenway. The steep gradient would make it unfavourable for commuting and	
		inaccessible for some users.	
		Section between A511 and Spring Lane pursued first due to connection to College and	
		evident use.	
Ibstock			
I-C01	Ibstock to Ellistown and Bardon Hill	Route makes use of existing traffic free path and requires construction of a new traffic free path adjacent to Leicester Road and Ibstock Road.	
I-C02	Strategic link to Coalville	Please refer to C-C03 Route 3 – Coalville to Hugglescote/Ellistown	
I-C03	Route through the town centre	No existing provision and a road unsuitable for cycling, recommend construction of a new traffic free route along Melbourne Road including additional signalised crossings.	£1.25-£1.58 million.
I-C04	Strategic link to Ashby	Please refer to M-C02 Route 2 – Strategic route to Ibstock	



I-C05	Strategic link to Measham	Resurfacing of bridleway through Sence Park and consideration to lighting of the route. Traffic free link to Heather on Pisca Lane. Please also refer to M-C02 Route 2 – Strategic route to Ibstock	£353-£434,000 (and cost in M-C02).
Kegworth			
K-C01	Link to Castle Donington employment	Create new off-road route alongside Ashby Road	£842-£1,211,500
	areas	Implement quiet way measures along Ashby Road in Kegworth. The gradient of the route may not be suitable for all users.	
K-C02	Link north using Long Lane towards Long Eaton	Survey of existing traffic speed and volume, with quiet way treatment recommended throughout.	£150-£190,000
K-C03	Route to Sutton Bonnington	Review tactile paving provision, limited scope to widen footway due to land constraints.	£992,000-£1.26 million.
		Consider resurfacing of footways.	
K-C04	Route to A6 existing shared use	Consider improving or removing HGV access to Derby Road.	£308-£390,000
	provision	Check and rectify re-instatement faults.	
		Seek to formalise parking arrangements.	
		Seek alternative access arrangements for HGV away from residential areas.	
		Consider a controlled crossing at a location to benefit most users (new developments and	
		park).	
		Reduce traffic speed through calming measures.	
		Review tactile paving provision.	
K-C06	Northern link between Kegworth and	Use existing off-road provision travelling from Castle Donington under the Kegworth Bypass	£202-£273,000
	Castle Donington / East Midlands	to meet Derby Road.	
	Gateway		



		Upgrade the existing share use along Derby Road, widening by taking space from the existing verge/carriageway and removing parking where the off-road path meets Derby Road. Crossing improvements at the junction with Side Ley/Derby Road on the edge of Kegworth.	
K-C07	Link Sawley Marina with the K-C02 route at Lockington Quarry via Warren Lane and Public Bridleway/Footpath	Leicestershire County Council plan to audit and cost the route.	N/A
Measham			
M-C01	Creating a link between the new Jaguar Land Rover site and Measham	Upgrade and extend existing infrastructure to improve the experience for cyclists Focus on improving junctions and roundabouts including new crossings.	£1.5-£1.9 million
M-C02	Strategic link to Ibstock	Adopt a new route through the village of Heather and add new parallel crossings at either end of the village Quiet way interventions along Swepstone Road/Main Street between Heather and Measham.	£263-£328,000
M-C03	Strategic Link to Ashby	Extend footways to create new shared use off-road cycling route Install crossings on the A42 roundabout to enable safe passage for cyclists.	£1.5-2.0 million
Ibstock			
I-C01	Ibstock to Ellistown and Bardon Hill Industrial Estate	Route makes use of existing traffic free path and requires construction of a new traffic free path adjacent to Leicester Road and Ibstock Road.	£658- £799,000
I-C02	Strategic link to Coalville	Please refer to C-C03 Route 3 – Coalville to Hugglescote/Ellistown.	



I-C03	Route through the town centre No existing provision and a road unsuitable for cycling, recommend construction of a new traffic free route along Melbourne Road including additional signalised crossings.		£1.25-£1.58 million.
I-C04	Strategic link to Ashby	Please refer to M-C02 Route 2 – Strategic route to Ibstock.	
I-C05	Strategic link to Measham	Resurfacing of bridleway through Sence Park and consideration to lighting of the route. Traffic free link to Heather on Pisca Lane. Please also refer to M-C02 Route 2 – Strategic route to Ibstock.	£353-£434,000 (and cost in M-C02).



5. Network Planning for Walking

This section describes the methodology used for the Network Planning for Walking stage of NWLDC's LCWIP.

5.1 Overview

During this stage an analysis of data and local knowledge was completed so that key routes within the core walking zone of the urban areas could be identified. NWLDC's Cycling and Walking strategy identified the main destinations in each of the urban locations, as well as the high, medium and low priority for walking destinations (Section 8 of Cycling and Walking Strategy). Physical route audits were undertaken to determine what high level infrastructure improvements could be implemented to make the routes more attractive and safer for pedestrians in the future.

Many of the benefits of walking and cycling are shared, and most often improvements for one will affect the other as large parts of the two networks overlap. Pedestrians and cyclists are often in proximity and may share routes and crossings. However, walking trips are generally shorter than cycling trips, with longer trips being facilitated through multi modal journeys.

5.2 Trip Generators

The walking network used for the urban areas of this LCWIP were taken from NWLDC's Cycling and Walking Strategy which identified key walking destinations in each town and associated walking zones radiating out from them ranked into low, medium, and high priority walking zones. Roads and footpaths within the high priority zone connecting to identified destinations were audited as part of this LCWIP. Maps showing the walking zones for each town and the key destinations, which the LCWIP walking audits are focused on are contained in the Cycling and Walking Strategy.

The destinations highlighted in the Cycling and Walking Strategy are common destinations such as the town center core, educational establishments, public transport interchanges, retail, healthcare, workplaces and leisure facilities.



5.6 Walking Route Audit Tool (WRAT)

As part of the Welsh Active Travel Design Guidance, a Walking Route Audit Tool (WRAT) was developed to assist Local Authorities with the auditing of walking routes, forming part of the DfT's LCWIP guidance toolkit. The WRAT was used to audit walking routes identified.

The audit methodology targets the five core design outcomes for pedestrian infrastructure, which are like those for cycling. These are:

- Attractiveness
- Comfort
- Directness
- Safety
- Coherence

It was important to consider the different needs of all users, including vulnerable pedestrians who may be older, less mobile, hearing impaired, visually impaired, be using a wheelchair or push chair. The physical audits were undertaken in a way to consider this variety of users.

The summary information below is derived from more detailed audits of individual routes within each town.

Urban Area	Performance scores (out of 100)					
	Attractiveness	Comfort	Directness	Safety	Coherence	Overall
Ashby	58	55	49	42	13	49
Castle Donington	51	36	37	47	33	34
Coalville	54	56	51	52	43	53
Ibstock	52	43	42	57	44	47
Kegworth	56	35	41	44	33	42
Measham	44	38	42	53	52	43



5.7 Establishing Walking Infrastructure Improvements

The WRAT was used to summarise high level infrastructure improvements for each identified route. A brief summary of these is shown in the table below.

Reference	Description	High level improvements
Ashby		
A-W01	Market Street from Derby Road roundabout to North Street junction	Consider a complete re-design of this popular high street to create a more attractive and safe environment for pedestrians, including continuous footways to slow traffic and reduce the dominance of vehicles. Include additional seating facilities. Some advertising board clutter reducing available width, work to minimise disruption from these.
A-W02	North Street from Brook Street roundabout to Wood Street	Install missing side road tactile paving. Widen footway. Consider additional zebra crossing for school. Lighting improvements along Mill Lane Mews as direct cut through to high street.
A-W03		Install missing tactile paving and dropped kerb throughout route. Consider pedestrian priority across all car park entrances. Signage around castle entrance should be improved to avoid collisions.
A-W04	Derby Road from Station Street roundabout and Burton Road	Install missing tactile paving. and consider re- modelling of double roundabout to provide safe crossing facility.
A-W05	Kilwardby Street	Review crossing provision closer to town centre across Co-op car park and roundabout, consider repainting existing zebra near Beaumont Avenue.
Castle Doni	ngton	
CD-W01	The Spittal	Additional signage and path widening. Identify alternative walking routes to remove pedestrians from the roadway on The Spittal
CD-W02	The Green	Addition of tactile paving at crossing points and crossing provision by the school
CD-W03	Bondgate	Add crossing adjacent to the library and improve side road crossings along Bondgate.
CD-W04	Delvin Lane to Clapgun Street	The area around the Spar/Nursing Home and College/Wellbeing Centre is a priority for improvements.
CD-W05	Borough Street	Install missing tactile paving and consider changes to traffic movements and on-street parking.
Coalville		
C-W01	Ashby Road from Memorial Tower to Snibston Colliery Park	Additional crossings, priority over side roads. Signage for town centre journeys along Snibston route.
C-W02	High Street from Memorial Tower to Whitwick Road	Install missing tactile paving. Consider additional zebra crossing replacing central refuge. Improve safety for pedestrians over rail crossing.
C-W03	London Road from Whitwick Road to Broom Leys Road	Install missing side road tactile paving.
C-W04	Belvoir Road from Memorial Tower to Avenue Road junction	Installing missing tactile paving and dropped kerbs at side road junctions. Improve crossings over Marlborough Square. Consider public realm scheme.



C-W05	Broom Leys Road from junction with London Road to Surgery	Consider additional crossing for local shops, and traffic calming close to surgery. Review side road tactile paving.
C-W06	Ashburton Road from Manor Road to Central Road	Consider additional crossing to serve co-op, review tactile paving provision, could consider widening pavement outside school.
CW-07	Thornborough Road and Mantle Lane from Memorial Tower to A511 roundabout	Address provision around roundabout on south approach. Review tactile paving and need for additional signalised crossings.
lbstock		
I-W01	Leicester Road	Prioritise improving crossing of Ashby road roundabout. Install tactile paving at side road junctions. Widen footway in places. Consider crossing facility for park. Prevent pavement parking.
I-W02	Chapel Street	Review side road tactile paving. Provide crossing to High Street.
I-W03	High Street	Widen footway to provide improved pedestrian provision. Review side road tactile paving.
I-W04	Reform Road between High Street and Melbourne Road	Improve lighting and consider resurfacing.
I-W05	Melbourne Road	Could consider additional zebra crossing near lbstock Junior School and signalised crossing on Ashby Road roundabout south approach.
I-W06	Central Avenue	Footway width insufficient for peak school hour. Install missing tactile paving. Redesign and reallocate road space and improve public realm.
Kegwortl	า	
K-W01	Derby Road from Nottingham Road to High Street	Consider working with Google or others to ensure Kegworth Derby Road not used as cut through for A6. Hard to cross road to use Co-op or bus stop, consider signalised crossing.
K-W02	High Street	Review scores at school drop-off and pick-up. Consider if crossing required at school location to serve school and bus stops. Assess locations that require additional tactile paving.
K-W03	Nottingham Road	Install missing tactile paving, limited scope to widen footway due to land constraints. Consider resurfacing of footways.
K-W04	Side Ley	Consider improving or removing HGV access to Derby Road. Check and rectify re-instatement faults. Seek to formalise parking arrangements. Seek alternative access arrangements for HGV away from residential areas. Consider a controlled crossing at a location to benefit most users (new developments and park). Reduce traffic speed through calming measures. Install missing tactile paving provision.



K-W05	Mill Lane	Check and rectify re-instatement faults. Install missing tactile paving provision. Improve lighting and maintenance along footpath adjacent to village hall as well used, could resurface.
Measham	1	
M-W01	High Street south	Consider widening footway on one side of carriageway to provide better quality provision. Install missing side road tactile paving. Priority improvement would be toucan crossing to leisure centre and library site.
M-W02	High Street north	Review side road tactile paving. Widen footway. Unpleasant experience when traffic volume high.
M-W03	Bosworth Road	Control pavement parking. Install tactile paving around school entrances and consider surfacing treatment to slow traffic and provide crossing facility.

Table 3 Summary of Walking Route Schemes

A feasibility study for each route or wider scheme would be required to determine the precise interventions needed throughout the corridor. This would involve highway engineers, designers and other professionals assessing the conditions on the ground and potential options in detail and determining the best solutions. This would be informed by engagement with local officers and the community to reflect local knowledge and priorities. By doing this it is possible to produce accurate costings that allow funding to be sought for delivery.



6. Prioritising Improvements

The auditing of the priority cycling routes and core walking zones has identified a long list of potential cycle infrastructure improvements and walking infrastructure improvements.

6.1 Overview

This section details the steps taken to priortise the cycling and walking schemes for future development. Each of the schemes were assessed over a range of 4 factors:

Economic - value for money

Effectiveness – increased number of pedestrians and people on bikes, network development contribution and integration

Policy – improved transport connections for multi modal journeys, public and political acceptable and environmental constraints

The prioritisation exercise was completed by performing an analysis of the high level measures that would be required to bring the entire route up to a standard considered to deliver a significant benefit to the users.

6.2 Prioritising improvements

For each urban area's routes, a score was given over 12 indicators for cycling schemes, with a maximum possible score of 31, and 10 indicators for walking schemes, with a maximum possible score of 27.

The following table shows the indicators and criteria which identified improvements have been assessed against. The score for each urban area was compared directly against the cost of delivering



the improvement to produce a high level cost-benefit ranking. The full prioritisation of schemes is included in the appendices, with a summary by each urban area below.

All cycling schemes were assessed using the DfT Active Mode Appraisal Toolkit (AMAT) to quantify the key impacts of a proposed intervention, providing a measure of the value for money of each scheme, in the form of a benefit-cost ratio (BCR).

The projects were distributed into short (>3 years), medium (3-5 years) and long (5+ years) term projects based on suggested completion.

Indicator	Score	Score criteria	Type of scheme
Effectiveness			
Forecast cycle and pedestrian demand	3	>500 pedestrians/ cyclists	Walking and
	2	200- 500 pedestrians/ cyclists	cycling
Data sourced from Propensity to Cycle Toolkit	1	100- 200 pedestrians/ cyclists	
Go Dutch Scenario data for cycling and estimated for walking	0	<100 pedestrians/ cyclists	
Contribution of the scheme to widen network	3	Links with 3+ existing routes	Cycling
development	2	Links with 2 existing routes	1
	1	Link to 1 existing route	
	0	Isolation - outside of network]
Town centre location with high pedestrian and	3	Urban centre	Walking and
cyclist demand	2	Inter urban connection	cycling
	1	Links small number of residential areas	
	0	rural location limited connections	
Walk to work demand	2	Highly residential or industrial area	Walking
	1	Links to small number of potential workplaces	1
	0	No employment locations	
Improved transport connections	3	Links directly to transport interchange (bus station, train station)	Walking and cycling
	2	Covers majority of journey to transport interchange (including bus stops)	
	1	Provides part of a journey to transport interchange (including bus stops)	-
	0	No improvements	1
Policy			
Proximity to jobs and schools	1	Links to school or employment site	Walking and
	0	No link	cycling



Improves safety	3	Significant improvement to road safety and DDA	Walking and
		compliant where existing issues exist.	cycling
	2	Actions to improve road safety e.g. crossing points,	
		segregation or makes Equalities Act compliant	
	1	Smaller scale improvements e.g. signage, lighting	
	0	No improvement	
Improves cycle network density	3	Scheme to fill missing link in network	Cycling
	2	Scheme to fill the majority of missing link in existing	
		network	-
	1	Scheme partially fills missing link in existing cycle	
		network	_
	0	No contribution	
Economic			
Value for money (AMAT) (BCR)	3	BCR > 4.0	Cycling
	2	BCR = 2.0 - 4.0	
	1	BCR = 1.5 – 2.0	
	0	BCR = 1.0 to 1.5	
Proximity to a major development site	3	Committed Section106 or other source of private	Walking and
		funding	cycling
	2	Route serves a large proposed residential or	
		employment site	_
	1	Possible future development	-
	0	No private sources of funding	
Deliverability			
Scheme feasibility	3	No issues	Walking and
	2	Dependent on scheme or land issue that is likely to	cycling
		be overcome	
	1	Dependent on another scheme / land ownership	
		which will cause	
	О	Land ownership or issue unlikely to be overcome	
Political / local acceptability (subjective	3	No impact expected	Walking and
assessment based on possible public relation to	2	Low impact expected	cycling
schemes that may lead to delays, loss of parking etc.)	1	Medium impact expected	1
	0	High impact expected	1
Environmental constraints	3	No issues	Walking and
	2	Dependent on approval from environmental	cycling
		agencies which is likely to be overcome	



	Dependent on approval from environmental agencies which is likely to cause delay. Potential significant ecological constraints	
	Environmental and ecological constraints unlikely to be overcome	

6.3 Scheme Scores

The prioritisation exercise enabled each of the schemes to be scored. A maximum score of 31 for cycling schemes with a maximum possible score of 27 for walking schemes.

The following table shows the scores for each urban area in priority order.

Cycling Route Reference	Cycling Route Score	Walking Route Reference	Walking Route Score
Ashby			
A-C07	20	A-W01	17
A-C04	19	A-W02	16
A-C02	17	A-W04	15
A-C01	17	A-W03	14
A-C05	17	A-W05	11
A-C06	17		
A-C03	See C-C04 Route 4		
Castle Donington			
CD-C02	22	CD-W04	20
CD-C01	21	CD-W02	19
CD-C05	21	CD-W03	19
		CD-W01	16
CD-C07	16	CD-W05	16
CD-C04	15		
CD-C08	11		
Coalville			
C-C02	27	C-W04	19
C-C06	22	C-W01	17
C-C01	20	C-W06	16
C-C03	19	C-W07	16
		C-W03	15
C-C07	13	C-W02	14
C-C09	13	C-W05	11
C-C04	11		
C-C05	See I-C05 Route 5		



Ibstock			
I-C03	20	I-W03	19
I-C05	17	I-W02	17
I-C01	16	I-W05	16
I-C02	See C-C03 Route 3	I-W06	16
I-C04	See M-C02 Route 2	I-W01	11
		I-W04	8
Kegworth			
K-C01	20	K-W01	17
K-C04	18	K-W04	16
K-C06	16	K-W02	14
K-C02	15	K-W05	12
K-C03	11	K-W03	8
K-C07			
Measham			
M-C02	18	M-W02	22
M-C01	12	M-W01	19
M-C03	12	M-W03	17

The scores for each route have been sorted by urban area so prioritisation can be considered in each area individually. The prioritisation method with full scoring for each indicator, including each routes BCR is appended.

The highest scoring three schemes overall for both cycling and walking are listed below. These priorities are intended to inform local consideration and agreement on priority routes to take forward. This dialogue about local prioritisation will be informed by emerging local policy, opportunities, and developments, as well as the views of local leaders, partners, and residents, underpinned by the priorities set out in the Cycling and Walking Strategy. The analysis above and in appended provides some analytical input to inform the local prioritisation and decision-making process.

Cycling

- 1. **Coalville** C-C02 Route 2 North to south through town centre. Short term time frame, BCR of 10.15.
- 2. **Castle Donington** CD-C02 Route 2 Green way around the Airport/EMEG (b). Medium tern time frame, BCR of 2.18.
- 3. **Coalville** C-C06 Route 6 North to south through town centre. Medium term time frame, BCR of 1.82

Walking

- 1. **Measham** M-W02 Route 2 High Street north. Long term time frame.
- 2. **Castle Donington** CD-W04 Delven Lane to Clapgun Street.
- 3. **Ibstock** I-W03 Route 3 High Street



6.4 Conclusion and Recommendations

The six urban areas studied as part of this LCWIP offer great opportunities for local journeys to be made by walking and cycling, given their compact nature and in most part favorable terrain. To reduce the number of short journeys made by motorised vehicles, significant investment in active travel infrastructure is required.

A detailed table listing the recommended schemes is included in the appendices where analysis has identified a list of walking and cycling priorities that deliver upon national, regional, and local policies.

To future proof infrastructure it will be built for **resilience to the impacts of climate change**, including ensuring potential flood risk is considered. All scheme designs will also refer to the principles contained within Local Transport Note (LTN) 1/20.

Road safety is a key consideration throughout this report and will remain a focus in the development of walking and cycling schemes in NWL. Safety audits in the design process should be undertaken and will be key to ensuring the safety of people on cycles and on foot.

As described in chapter 12 of Local Transport Note 1/20, at all new development sites it is recommended consideration be given to including full permeability and connection to surrounding networks for pedestrians and cyclists and that these should be promoted through the **planning and highways** agreement processes.

As the recommendations of the LCWIP are taken forward emerging **guidance from Active Travel England** on a planning assessment framework will be considered.



4. Glossary of Terms

AMAT	Active Mode Appraisal Toolkit. Spreadsheet-based tool published by the Department for Transport (DfT) for assessing the overall benefits and costs of proposed walking and cycling interventions, ranging from capital investments to behaviour change programmes.
BCR	Benefit cost ratio, indicating the value for money of a proposed intervention. Output of the AMAT.
DfT	Department for Transport. The UK ministerial department which inter alia provides policy and guidance to English local authorities for local transport, including on cycling and walking. Published the LCWIP technical guidance.
LCWIP	LCWIP Local Cycling & Walking Infrastructure Plan, a new, strategic, long- term approach to identify the improvements to cycling and walking networks which are required in each local area.
LTN	Low Traffic Neighbourhood. Scheme where motor vehicle traffic in residential streets is greatly reduced.
MSOA	Mid-layer super output area.
ONS	Office for National Statistics, the body charged with the collection and publication of statistics related to the economy, population and society of the UK.
PCT	Propensity to Cycle Tool. A website analysis tool which forecasts the potential future growth of cycle trips under different scenarios for travel to work and travel to school.
RST	Route Selection Tool. An Excel spreadsheet which assesses and compares the suitability of different routes for inclusion in a cycle network.



Appendix 1 Design Principles

NCN Principles

The National Cycle Network design principles set out key elements that make the Network distinctive and need to be considered during design of new and improved routes forming part of the Network.

Where the Network is not traffic-free it should either be on a quiet-way section of road or be fully separated from the carriageway.

For a National Cycle Network route on a quiet-way section of road traffic speed and flows should be sufficiently low with good visibility to comply with design guidance for comfortable sharing of the carriageway.

Signs and markings should highlight the Network.

National Cycle Network routes shall:

- Be designed in accordance with current best practice design guidance;
- Be designed in collaboration with the local community;
- Provide convenient links to key destinations, connecting cities, towns and countryside;
- Meet the following nine design Principles

Principle 1:

Traffic-free or quiet way

Where the Network is not "traffic-free" it should either be on a quiet-way section of road or be fully separated from the adjacent carriageway.

For a National Cycle Network route on a quiet-way section of road the traffic speed and flows should be sufficiently low enough to encourage cycling for all ages and abilities.

It should have good visibility to comply with design guidance to allow for comfortable sharing of the carriageway.

Signs and road markings should highlight the Network.



Principle 2:

Wide enough to accommodate all users

Width of a route should be based on the level of anticipated usage, allowing for growth. A minimum width of 3m should be delivered.

Where it is not possible to deliver this, all other avenues should be fully explored before path widths are reduced.

Physical separation between users should be considered where there is sufficient width and a higher potential for conflict between different users.

Structures should be designed to maximise movement space. A minimum path width between parapets of 4m is to be maintained.

Principle 3:

Designed to minimise maintenance

A maintenance plan should be put in place during the development process.

Construction quality should be maximised to minimise future maintenance needs.

New planting should be kept well clear of the path.

Sufficient tree work should be undertaken as part of construction to minimise future issues.

Routes should be managed in a way that enhances biodiversity.

Principle 4:

Signed clearly and consistently

Signage should be a mix of signs, surface markings and wayfinding measures.

Every junction or decision point should be signed.

Signage should be part of a network-wide signing strategy directing users to and from the route.

Network to trip generators such as places of interest, hospitals, universities, colleges.

Signage should be used to increase route legibility and branding of routes.

Signage should help to reinforce responsible behaviour by all users.

Principle 5:

Smooth surface that is well drained.

Path surfaces should be suitable for all users, irrespective of age, ability or mobility needs



Path surfaces should be maintained in a condition that is free of undulations, rutting and potholes.

Path surfaces should be free draining and verges finished to avoid water ponding at the edges of the path.

In, or close to, built-up areas a Network route should have a sealed surface to maximise the number of path users.

Principle 6:

Fully accessible to all legitimate users.

All routes should accommodate a cycle design vehicle 2.8 metres long x 1.2metres wide.

Any barriers should have a clear width of 1.5 metres.

Gradients should be minimised and as gentle as possible.

The surface should be maintained in a condition that makes it passable by all users.

Principle 7:

Feel like a safe place to be

Route alignments should avoid creating places that are enclosed or not overlooked.

Consideration should be given as to whether lighting should be provided.

Design routes to be spacious and if necessary slow the speed of cyclists down.

Principle 8:

Enable all users to cross roads safely.

Road crossings should be in accordance with current best practice guidance.

Approaches to road crossings should be designed to facilitate a slow approach speed to a crossing, have enough space for several users to wait safely.

Signalised road crossings should be designed to minimise the wait time for NCN users. Where possible advanced notification systems should be used.

All grade separated crossings should provide step-free access.

Keep the straight line where possible and create key crossing points.



Current Best Practice Design Guidance References

Department for Transport - Cycle infrastructure design (LTN 1/20):

https://www.gov.uk/government/publications/cycle-infrastructure-design-ltn-120

Sustrans' Traffic Free Routes and Greenways Design Guidance:

https://www.sustrans.org.uk/for-professionals/infrastructure/sustrans-traffic-free-routes-and-greenways-design-guide/

A collection of other design guidance and information can also be found here:

https://www.sustrans.org.uk/for-professionals/infrastructure/walking-and-cycling-infrastructure-design-quidance/

Current Best Practice Design Guidance References

Local Transport Note 1/20, Chapter 11:

https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/90 6344/cycle-infrastructure-design-ltn-1-20.pdf

London Cycle Design Standards:

http://content.tfl.gov.uk/lcds-chapter8-cycleparking.pdf



Appendix 2 Potential Funding Sources

Active Travel Fund

Department for Transport: https://www.gov.uk/government/publications/emergency-active-travel-fund-local-transport-authority-allocations

Levelling Up Fund

Department for Transport: https://www.gov.uk/government/publications/levelling-up-fund-prospectus

Future High Streets Fund

Department for Transport: https://www.gov.uk/government/collections/future-high-streets-fund

Capability Fund

Department for Transport

Paths for Everyone

Sustrans: https://www.sustrans.org.uk/about-us/paths-for-everyone/

Cycle Rail Fund

Cycle Rail Working Group: https://www.cyclerail.co.uk/

Section 106 or Community Infrastructure Levy

Local Planning Authority: https://www.gov.uk/guidance/planning-obligations



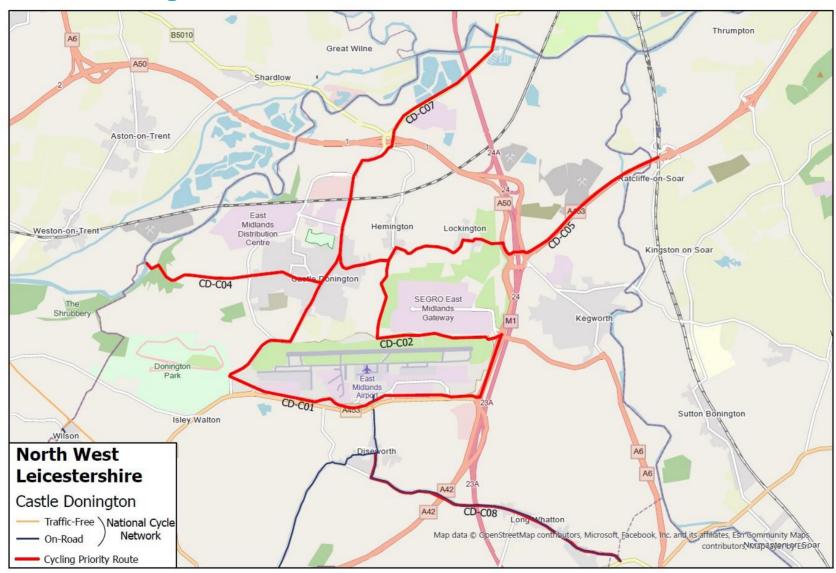
Appendix 3 Cycle route maps

Ashby-de-la-Zouch





Castle Donington



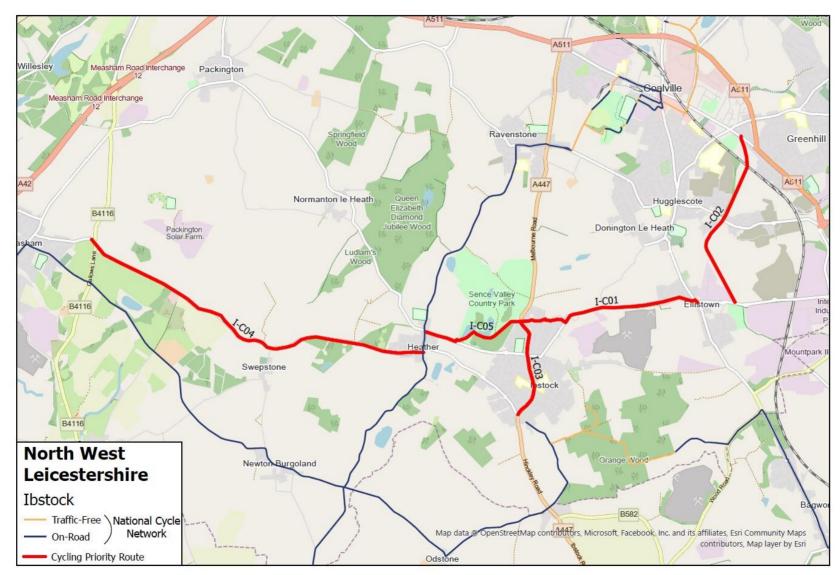


Coalville



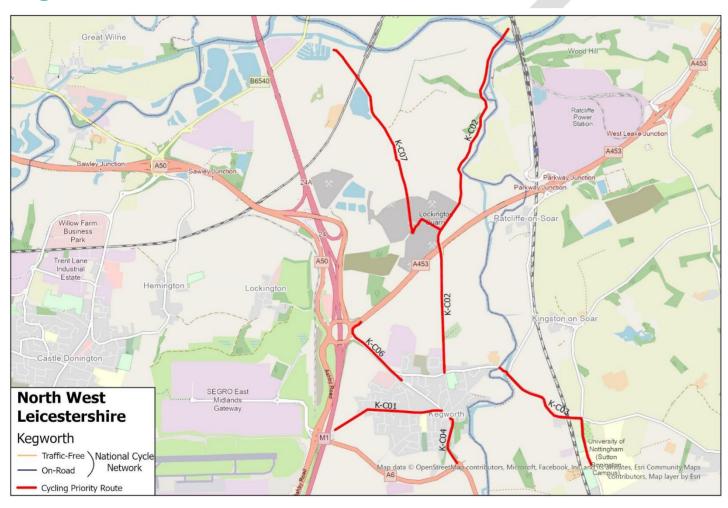


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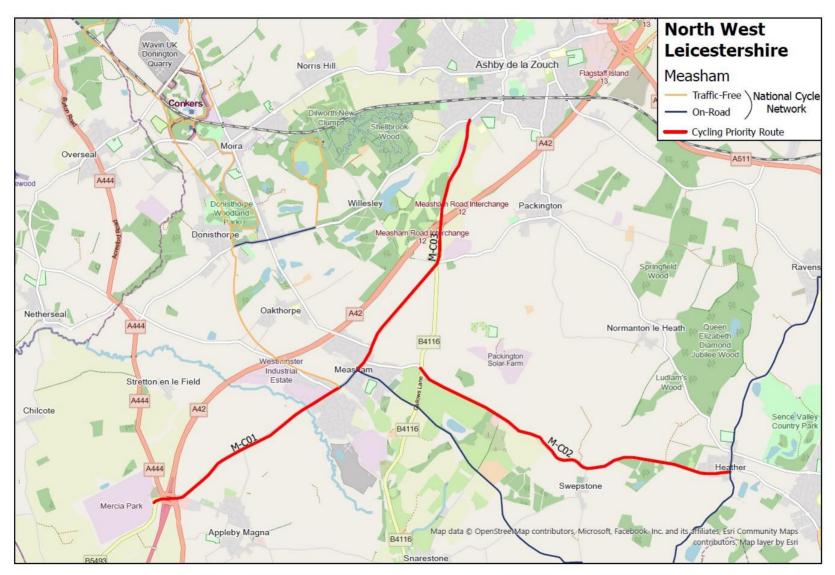


Kegworth





Measham



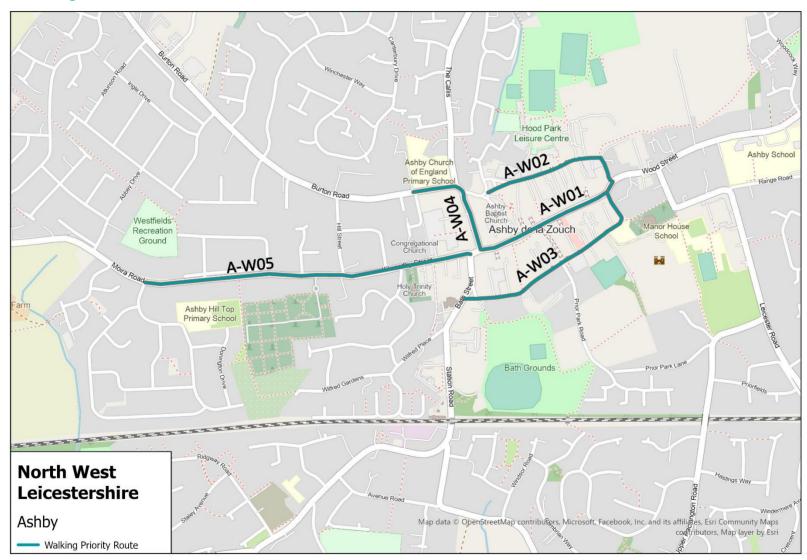


Appendix 4 Walking route maps





Ashby-de-la-Zouch





Castle Donington



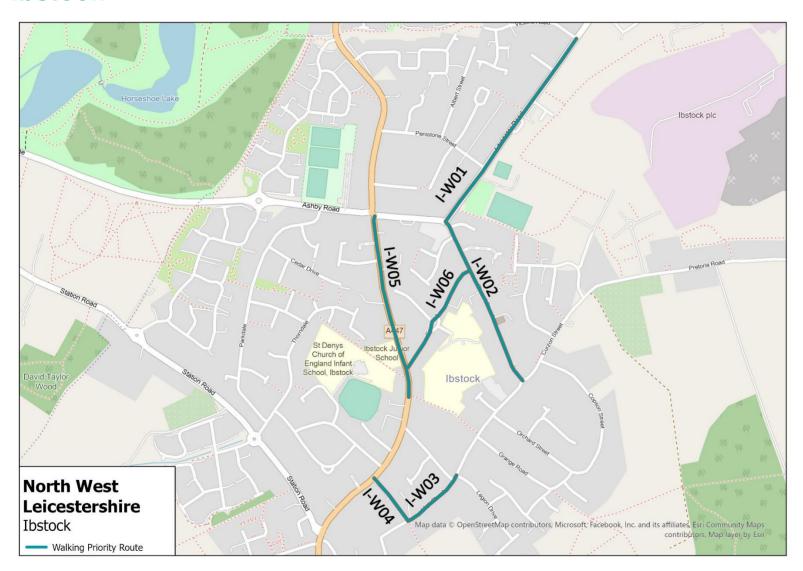


Coalville





Ibstock





Kegworth





Measham





Appendix 5 North West Leicestershire LCWIP Regular Review

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- Update January 2024: Ashby Footpath, Ivanhoe Line and HS2

Introduction

This document was developed by Sustrans May 2023 as the result of feedback received during consultation on the North West Leicestershire Local Cycling and Walking Infrastructure Plan (LCWIP).

This document aims to capture detail, data and intelligence to support the delivery of the LCWIP where other improvements are identified and are of local importance but may not fall under the main priorities of the LCWIP.

This document also aims to capture on going developments and changes within the district of North West Leicestershire as well as neighbouring districts and counties that may impact, or influence routes identified as a priority.

This document will be updated regularly from the date of formal approval by North West Leicestershire District Council (NWLDC), in consultation with key partners and stakeholders. It will sit as an appendix to the North West Leicestershire LCWIP.

Ashby Railway Station

Network Rail are undertaking a study into the Ivanhoe Railway Line, which would recreate the rail link between Leicester and Burton on Trent; connecting towns such as Ashby along the route. The study is looking to confirm the line's viability and if successful will enable Network Rail to progress to a design stage including detailed specifications and locations of railway stations.

If the Ivanhoe Line is re-opened it seems likely that a station will be constructed in Ashby, bringing about new transport options for people working and living in the area. The location of a station in Ashby is still to be determined and it has been suggested that it will not use the previous site off Station Road.

It is crucial that the North West Leicestershire LCWIP is updated on a regular basis or when a substantial new development such as a new railway station is planned. High quality walking and cycling routes and provision to a new station will enable multi modal transport journeys to be taken for education, work and leisure which could reduce car trips taken. It would be advisable to keep a watching brief on the development of the Ivanhoe Line, in relation to a new station.

Referenced in LCWIP report - A-C04 high level improvements in Ashby.

Moira - Shortheath Road Crossing

Shortheath Road and Ashby Road are the main roads through Moira and provide access into Ashby de la Zouch to the east and connections to the A444 to the west.

National Cycle Network link route 63 travels along the canal towpath over Shortheath Road. The crossing is non signalised and would benefit from improvement. The section of towpath that crosses Shortheath Road links the Conkers Waterside Centre to Moira Furnace, two popular visitor locations.

Shortheath Road has a 30 mile per hour speed limit in the vicinity of the crossing and there are speed cameras in operation. Improvements to the crossing would need to address visibility issues particularly when approaching from the Conkers Waterside Centre, increase safe waiting space and further reduce the speed on approach to the crossing.

Image: Shortheath Road Crossing, NCN 63

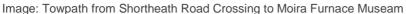




Connection to Moira Furnace Museum

The section of towpath from the Shortheath Road crossing to the Moira Furnace Museum and on into Donisthorpe would benefit from surface improvements to create a walking and cycling facility that is fit for purpose all year round. The Moira Furnace Museum Trust are actively seeking funds to improve the condition of the well-used towpath. The section of towpath which requires investment is approximately 900 meters in length.







Ashby A511 - B587 (Nottingham Road) Roundabout

The Ashby A511 – B587 (Nottingham Road) roundabout is located 1.5km to the east of Ashby de la Zouch town centre. It is a key link roundabout for later access onto the A42 – M42 and the M1.

Near to the roundabout are 3 large food shops and several other large retailers. It is a key retail location and will employ a significant amount of people locally.

Walking and cycling provision is present along the west side of the A511 on approach to the roundabout. At the roundabout the continuation of the walking and cycling route on the A511 involves a non-signalised crossing over 5 traffic lanes with a central island between the two traffic flows. Improvement to this arm of the roundabout will support with ongoing travel and access to the retail units for shopping and employment.



Ashby Walking and Cycling Strategy

Ashby Walking and Cycling Strategy 2022

Locations identified in the Walking and Cycling Strategy 2022	Referenced in the North West Leicestershire District Council LCWIP	Comments
Hicks Lodge Connectivity, Creation of a safe cycle route from Ashby Town Centre to Hicks Lodge Cycle Centre on Willesley Woodside. Including access to Hicks Lodge from the north via a new permissive path facilitating access from the north side of Ashby and Ashby Heights.	A-C02 – Links to Hicks Lodge	Including new traffic free route creation, a new toucan crossing and quiet way treatments.
Nottingham Road and to the East, Creation of a cycle route along Nottingham Road connecting eastern side of Ashby towards Lound and the Cloud Trail	A-C07 – Link to boundary from bypass roundabout – providing an east west route.	A safe route from east to west required and would be well used.
Safe Cycle Route to the Cloud Trail Connecting the Cloud Trail from Melbourne Road by following the disused railway line from Smoile Farm to Worthington	A-C01 – Cloud Trail Extension	Full feasibility study required due to number of road crossings and landowners.



Walking improvements between Abbotsford Road Estate and Tesco Provide a walkway from the estate to the Tesco to enable residents to walk to the shops		
Smisby Road and Hood Park Improve existing provision and complete the connection.	A-C06 – North South through the town centre	The existing shared use provision from the A511 roundabout to the north needs extending and improving to ensure pavement parking is not constraining width and function. Side road junction and additional crossing points are recommended.
Town Centre Improvements A new crossing facility at the bottom of Kilwardby Street. Improvements to Market Street, speed reduction with appropriate traffic calming. Improved cycle parking provision. Increase signage. Improvement to Brook Street / Market Street junction. Consideration to moving crossings on Derby Road and Bath Street.	A-C07 – Link to Boundary from bypass roundabout through the town centre. A-W05 – Kilwardby Street A-W02 – North Street from Brook Street roundabout to Wood Street A-W03 – South Street from Bath Street to Market Street.	A re-design of Market Street is recommended to give more space to pedestrians and cyclists and improve safety for all. This includes continuous surfacing and a 20mph speed limit.



Bath Grounds and Castle
A new cycle route from
Ashby Castle to Station
Road via the Castle Field
and Bath Grounds.

Update January 2024, Ashby Footpath, Ivanhoe Line and HS2

Ashby Footpath 089

Section 106 moneys have been secured to upgrade a Public Right of Way through Ashby De La Zouch along part of the Ivanhoe Way as identified in Ashby Town Council's <u>Cycling and Walking Strategy 2022</u>.

See below exert from the strategy, if cycle routes A-C01 and C-C04, from the North West Leicestershire LCWIP, are able to be developed in the future, consideration during detailed design should give consideration as to how best to link with the new route along O89 once developed.

3.2 Nottingham Road and to the East. Nottingham Road. A safe cycle route is required along the line of Nottingham Road to connect the eastern side of Ashby to the town centre and towards Lount and the Cloud Trail (National Cycle Network route 6) in the opposite direction. This is the eastern arm of proposed route priority 1 in the SPD. The current Nottingham Road pathways are narrow and would not support mixed use by pedestrians and cyclists, though in some places, the grass verge is wide and could be modified. The current situation, with faded painted cycle signs on the road itself at sections where the road narrows due to central reservations, is considered unsafe.

The Money Hill housing development is expected to provide a good quality walking and cycle track along footpath O89 parallel with Nottingham Road. It would seem sensible for priority route 1 to be diverted to use this cycle track, feeding onto the Tesco retail/industrial park and/or continuing along Featherbed Lane (O91) to the bypass (section 35a of the current SPD proposed route priority 2). This would resolve the dangers of cycling along Nottingham Road.

However, careful consideration will be needed on feeding two-way cycle traffic onto and off the O89 route at its junction with North Street, which is a one-way road, particularly for school children using the route to cycle to Ivanhoe school, currently in the wrong direction along North Street. This problem could be reduced by provided a direct cycle and walking entrance into the school at this point.



Also, a designated cycle route into the rear of the school grounds directly from the Money Hill estate is required. Currently only a pedestrian route is included in the plans.

Safe Cycle Route to Cloud Trail. If, as proposed above, footpaths O89 and O91/092 become a proper cycle way to the A511 Ashby Bypass, then it would not require much additional work to ensure a safe route along the bypass through to public footpath M30 on the south eastern side of the A42, some of which is already designated as a traffic free cycle way and some as a permissive bridle way. However, a potential problem with this section is interference from HS2 construction.

Alternatively, according to the first draft of the NWL Walking and Cycling Strategy produced by Knight, Kavanagh & Page Ltd in 2021, a route is being "explored by a local interest group" following a currently undesignated track along the north western side of the A42, past Lount tip. This could join up with the SPD's Route 35 (a and b) to avoid Nottingham Road and would have the advantage of not being affected by HS2.

Either of the above routes could connect to the Cloud Trail from Melbourne Road by following the disused railway line from Smoile Farm to Worthington.

Ivanhoe Line

Network Rail released an update on the Ivanhoe Line Sept 2023. They plan to create an Outline Business Case to reopen the line between Coalville and Burton with stops at both Coalville and Ashby De La Zouch. Where the stations will be located is not yet clear.

HS₂

In October 2023 the Government announced that phase two of the planned HS2 from Birmingham to the East Midlands and the north of England would not go ahead.

