



# **REGULATION 18: NEW ENFIELD LOCAL PLAN:**

## **DRAFT INFRASTRUCTURE DELIVERY PLAN**

**LONDON BOROUGH OF ENFIELD**

**JUNE 2021**

## CONTENTS

1 INTRODUCTION.....	3
2 APPROACH.....	7
3 TRANSPORT.....	9
4 ENERGY.....	18
5 BLUE & GREEN INFRASTRUCTURE .....	29
6 EDUCATION.....	40
7 HEALTHCARE AND EMERGENCY SERVICES.....	45
8 COMMUNITY AND CULTURAL FACILITIES.....	48

# 1 INTRODUCTION

## 1.1 PURPOSE OF THIS DOCUMENT

This emerging London Borough of Enfield Infrastructure Delivery Plan is a corporate delivery document to guide infrastructure provision. It builds on AECOM's 2020: Draft Infrastructure Baseline Assessment Study, providing an evidence base for the draft Enfield Local Plan (regulation 18 version) that will guide the future growth of the borough up to 2039.

The final Enfield Infrastructure Delivery Plan (IDP) will set out:

- a review of existing and planned infrastructure supply;
- a schedule of required infrastructure to support the preferred growth scenario; and
- infrastructure costs and funding and delivery methods (where available).

The IDP aims to help the London Borough of Enfield and its partner organisations to:

- reduce risks related to uncertainties over infrastructure delivery;
- prioritise infrastructure projects to support growth in Enfield in the most efficient way possible;
- secure the timely delivery of infrastructure and services in association with the phasing of new development; and
- realise the potential of the long term vision for Enfield set out in the emerging Local Plan.

For each type of infrastructure required, this draft plan sets out:

- where we are at now (current baseline position);
- demand;
- specific challenges & risks;
- key priorities; and
- planned provision

This document will be further developed during the next stage of the Local Plan (regulation 19) process, when further research and engagement will be undertaken both internally with key council officers and externally with infrastructure providers to:

- present the preferred growth scenario in the light of the alternatives and understand associated infrastructure demand (in relation to planning standards validated with infrastructure providers);
- set out how planned provision will meet need under the preferred growth scenario; and
- identify what else will be needed and how this could be delivered.

This draft document aims to capture the direction of travel and set out next steps, as well as broader conclusions to ensure the required infrastructure is delivered in a timely and coordinated manner.

## 1.2 STRATEGIC CONTEXT

### Draft Enfield Local Plan: 2019-2039 (regulation 18)

The London Borough of Enfield is required by law to produce a spatial plan, in consultation with local communities, statutory stakeholders and the development industry. Its purpose is to:

- set out how identified development needs in a borough will be accommodated spatially over a 15-20 year period; and
- determine the amount and types of development that are needed to meet future needs, how it will be delivered, when and in what form.

The resulting Local Plan (regulation 19) will be subject to an independent examination following the appointment of a planning inspector on behalf of the secretary of state.

This Infrastructure Delivery Plan sets out what infrastructure is required and when to support the preferred growth scenario in the borough.

The key challenges Enfield needs to address through the Local Plan are:

- ensuring there is enough housing to meet everyone's needs;
- creating better employment opportunities and promoting economic growth;
- reviewing infrastructure and community facilities;
- the future role of the borough's town centres;
- creating places that promote health and wellbeing; and
- ensuring development is high quality and protects the environment.

Enfield LB prepared and consulted on its regulation 18: Issues and Options Local Plan in 2018. A further regulation 18 consultation will take place from June 2021 to:

- explore issues identified through earlier consultations;
- respond to changes in government planning policy, climate and nature emergencies, COVID-19, and the new adopted London Plan (March 2021);
- reflect new evidence; and
- identify preferred policy options.

Enfield LB is committed to creating opportunities for residents through new homes, safe communities, and an economy that works for everyone. A positive growth agenda can help enhance all parts of Enfield and create beautiful places that work well, reduce poverty and increase quality of life. It enables the council to bring investment into the borough and deliver homes, jobs and infrastructure, as well as adapt for and mitigate climate change, and provide for nature enhancement and recovery. Planning should ensure good growth that delivers sustainable and quality places.

Once adopted, the new Local Plan will supersede the current adopted Enfield development plan policies in the Core Strategy, Development Management Document and Area Action Plans.

## Housing crisis

Enfield needs more housing because:

- 3500 households currently live in temporary accommodation in Enfield. This is the 2<sup>nd</sup> highest in the country;
- house prices in Enfield have risen significantly in the last 20 years, more than doubling between 2000-2019, in line with the trend across London as a whole;
- home ownership is beyond the reach of many. Average house costs 13.7 times income vs London average of 12.5; and
- rents have also increased substantially in the last 5 years, with more significant rises amongst lower quartile rents (the cheaper properties on the rental market). Enfield has the highest eviction rate in London.

## Planning for resident housing needs

Enfield has built 500 homes per year on average and is failing the government's "housing delivery test." This is causing housing to be scarce and more unaffordable. Policy targets and requirements for housing include:

- government set housing need: 4,397 new dwellings per year;
- London Plan target: 1,246 new homes per year to 2029;
- affordable housing need: 1,407 households per year;
- larger units for both market and affordable housing; and
- various specialist housing: self and custom build plots, older persons accommodation, wheelchair accessible, and student housing.

## Other significant land use requirements

In addition to housing, there are other significant land use requirements, including :

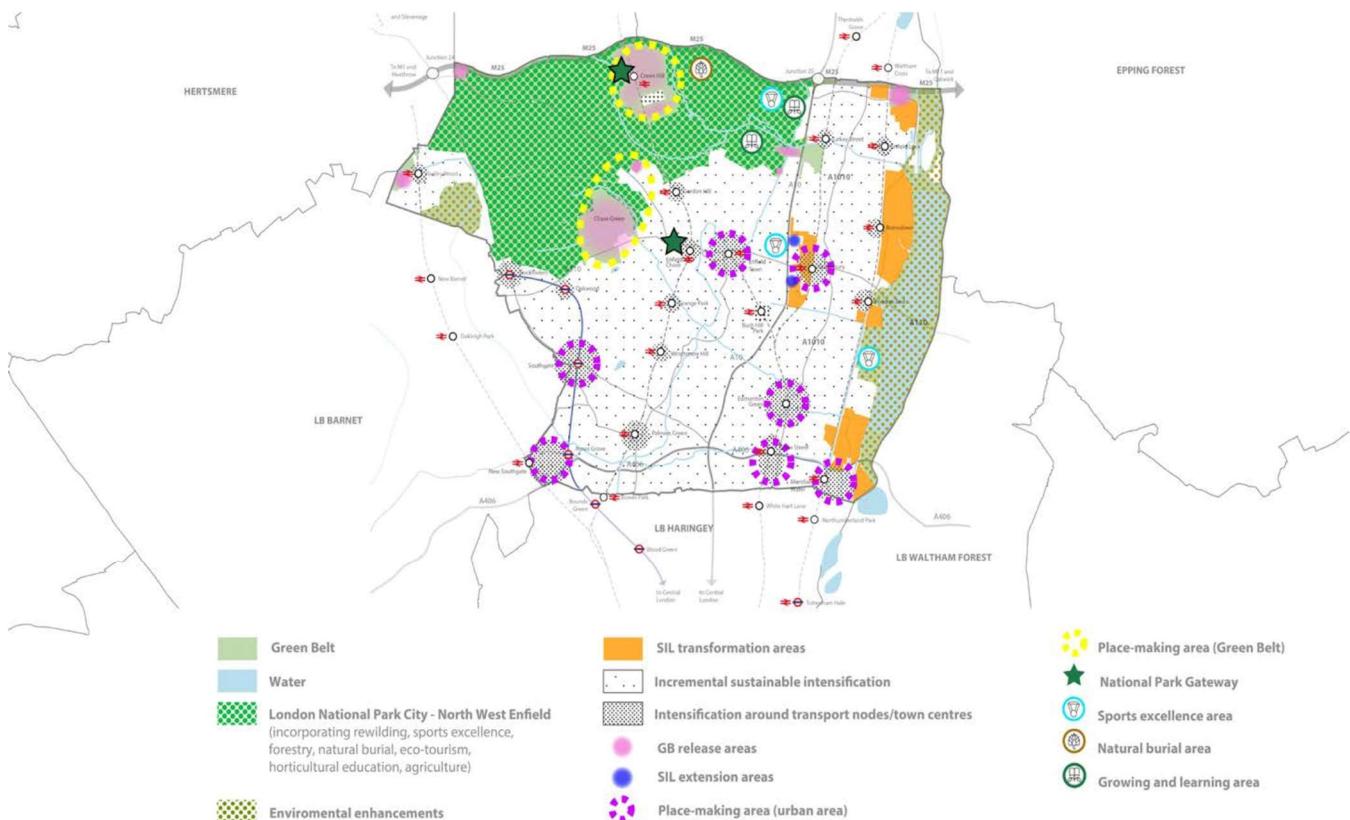
- 56 ha additional industrial/logistics land with large floorplates and good road connectivity;

- 37,000 sqm of office floorspace, including for large manufacturers and small independents in well-connected locations, especially Enfield Town and Southgate;
- physical and social infrastructure to support the influx of new residents, such as schools, health facilities and transportation routes;
- blue and green infrastructure to address deficiencies across the borough's network of spaces and routes, including new designations (e.g. London National Park City "north west Enfield": combining re-wilding, sustainable eco-tourism, farming/horticulture, forestry, sport, recreation, burial and leisure activities) and extension of existing wildlife corridors.
- sporting activities of regional and national importance; and
- burial needs.

## Growth options in the draft Enfield Local Plan: 2019-2039 (regulation 18)

The London Borough of Enfield has considered a number of growth options.

- High growth
- Medium growth
- Low growth



Growth options are likely to be found unsound, in relation to need and the policy framework where they:

- seek to accommodate most growth outside of the borough (this is not feasible as there are no willing partners);
- seek to accommodate the majority of development east of the A10 (industrial land is protected; there are limited sites and this will not meet need for family housing);
- seek to accommodate the majority of development west of the A10. (Insufficient sites and would need more green belt and would not meet needs or bring improvements to east-west connections.);
- baseline growth scenario: c. 17,000 new homes (represents 1 new home for every 7); and
- high growth scenario: c. 50,000 new homes.

This leaves one growth option that is the most likely to be found sound:

- Medium growth scenario: c. 25,000 new homes (represents 1 new home for every 5)

## Medium growth scenario

### Identified opportunities

- Greater affordable housing delivery
- Provides for wider mix of housing units including family homes with gardens and larger housing
- Reduces reliance on small housing units in tall buildings
- Enables the environmental enhancement of rural areas including the development of the London National Park City (northwest Enfield).
- Supports long term protection plus improved access for existing residents to nature
- Supports the regeneration and improvement of industrial land
- Supports sustainable regeneration and re-use of urban areas
- Delivery more certain due to a more viable approach and increase in private sector involvement
- Facilitates long-term strategic planning for the borough.

### Identified challenges

- Involves Green Belt release
- Would be contrary to London Plan policy
- Significant investment in new infrastructure required and may not be deliverable
- May exceed environmental capacity
- Goes beyond London Plan housing policy - we have to look beyond to 2039
- Risk that it could be found unsound at examination.

### Allocated sites and key clusters

Allocated sites are specifically identified in the plan for development. The allocations are large scale sites providing 50+ homes. There are 52 sites within the urban area, and a further 25 outside the urban area.

Design principles (height, housing types, green space requirements) will be included in the draft version of the plan. More detail will be included in later versions of the plan.

Key areas of development include the following, though it is worth noting that not all development will be delivered in the plan period to 2039 (e.g. Meridian Water)

Area	Anticipated contribution by 2039	Anticipated contribution after 2039
Meridian Water	c. 5000 new homes	Mixed-use including 5000 new homes & employment space
Crews Hill	c. 3000 new homes	c. 4500 new homes
Chase Green	c. 3000 new homes	c. 1300 new homes
Junction 24	5 ha employment space	c. 5 ha employment

## 1.3 SUMMARY OF KEY ISSUES

The most pertinent key issues identified in relation to growth and infrastructure delivery in Enfield area:

- The baseline growth scenario will provide affordable housing only and therefore does not require development on the Green Belt. However, initial indications are that this option presents viability challenges because it does not make the most of opportunities to capitalise on investment opportunities to meet significant need in the borough.
- However, the London Plan requirements of the borough are predicated on their identification of opportunity areas related to key infrastructure that has not been delivered as anticipated (Crossrail 2). Therefore, further development in Enfield - particularly on the outskirts on the Green Belt - is constrained by an insufficient transport network and is also unaffordable without the level of development (and associated council tax payments) that this new infrastructure would have supported.
- The medium growth scenario is likely to be the most appropriate option bearing in mind the above context. This is because, by releasing a small part of the green belt, it delivers more of the housing and other development required to meet identified needs over the plan period and subsequently unlocks higher levels of funding from developer contributions (community infrastructure levy and section 106 agreements) that are very much needed in the borough to address capacity shortfalls and some significant strategic issues:

- 39% of the borough are deficient in access to nature and open space (particularly in the suburbs of Enfield Town and in Ponders End), yet at the same time, Enfield has some of the biggest regional parks (e.g. Trent Park and Lee Valley Regional Park) and significant rural areas, including areas with Enfield Chase. These must be made more accessible to ensure all in the borough can easily use them.
- Although Enfield does have the Jubilee and Piccadilly underground lines, overground and main line services which provide relatively good connectivity to Central London and other regions, public transport throughout the borough is of a poor standard relative to other London boroughs and PTAL levels urgently need improving to support inclusive growth that will benefit some of the borough's most vulnerable residents, which is all the more important in the wake of the pandemic and its health and economic impacts. The new station at Enfield Chase / Crews Hill will be a crucial part of the approach to meeting this need.
- These strategic issues regarding open space and transport access deficiencies can also partially be addressed through residential development in town centre locations which have higher PTAL ratings, in order to support more people to live and work locally - this approach would also be supported through the medium growth scenario. This option would enable the council to unlock funding from high street / levelling up funds released to help communities to be more sustainable and increase resilience post-COVID.
- Vital to delivering the required infrastructure identified will be the council working closely with development partners to understand the delivery pipeline more fully, and to help systematically overcome barriers before they impede delivery.

## 2 APPROACH

### 2.1 SCOPE

The scope of this Infrastructure Delivery Plan includes the following:

- Transportation: Rail, bus, walking and cycling (active travel routes) and highways
- Energy and smart networks: Electricity, gas, renewable energy, water and digital infrastructure
- Green and blue infrastructure: Green space (parks and gardens), trees and woodlands, green corridors, burial spaces, public realm (amenity civic space), water spaces, natural spaces, equipped play and allotments.
- Flood risk and water management: flood zones, climate change allowances, surface water flood risks and groundwater flood risk.
- Sports & leisure facilities: Sports halls, swimming pools, synthetic turf pitches, health and fitness and indoor bowling.
- Education: Early years, primary and secondary education, special educational needs and disabilities, further education and higher education.
- Healthcare and emergency services: Primary (GPs, pharmacies and dentists) and secondary (hospitals) healthcare facilities and emergency services (police, fire and ambulance)
- Community facilities: libraries, community centres / hubs and youth centres.
- Cultural facilities: Cinemas, theatres, museums, art galleries, artist studios and rehearsal space and other arts buildings.

Please note: the infrastructure projects set out in this document have been derived from existing baseline evidence in AECOM's draft baseline review and other relevant evidence base documents. Detailed infrastructure capacity / modelling work will follow at regulation 19 stage of the Local Plan to take account of the 15-year housing and employment growth targets, once the preferred options has been agreed following the June / July public consultation. At the regulation 19 stage, we will publish a more detailed project schedule setting out the site-specific and area-based infrastructure requirements arising from the site allocations and preferred growth areas from the Local Plan.

Given the infancy of the Local Plan process, the evidence relating to infrastructure delivery is more advanced in respect of some development schemes, where they benefit from planning permission, funding allocations or public sector oversight. Some of the projects are underway but not yet delivered.

This schedule is a working document that will form the starting point of discussions with developers, landowners and statutory agencies to establish a detailed roadmap of future infrastructure interventions, in light of feedback from the regulation 18 consultation and any emerging evidence.

The delivery phasing and costs of the projects set out in this schedule are estimates based on the best available information at the time of production of this document. For many of the proposed interventions, the detailed timeframes (phasing) and costings are not yet known and will depend on more detailed investigation at subsequent stages in the planning process,

while some projects will require the release of neighbouring land, which many not be in public ownership. For this reason, broader bands of time (short, medium and long term) are shown.

## 2.2 PRIORITISATION

Infrastructure projects have been prioritised according to the following categories:

Category	Description	Relationship to the Local Plan	Impact on delivery	Examples
Critical:	<ul style="list-style-type: none"> <li>Physical constraints to growth - development cannot come forward without it</li> </ul>	<ul style="list-style-type: none"> <li>Fundamental to delivery of vision, objectives and policies of the Local Plan.</li> </ul>	<ul style="list-style-type: none"> <li>Failure to deliver will cause substantial delays and significantly impede the delivery of the Local Plan.</li> </ul>	<ul style="list-style-type: none"> <li>Major strategic transport projects (e.g. motorway upgrades and new rail capacity) that are needed to unlock development sites and overcome bottlenecks</li> </ul>
Essential:	<ul style="list-style-type: none"> <li>Development cannot come forward in a sustainable / acceptable way without it.</li> </ul>	<ul style="list-style-type: none"> <li>Not critical but required to support / deliver growth and meet the Local Plan objectives.</li> </ul>	<ul style="list-style-type: none"> <li>Failure to invest could result in delays to site delivery in the medium to long term.</li> </ul>	<ul style="list-style-type: none"> <li>Flood risk mitigation</li> <li>Bus networks</li> <li>Local transport improvements</li> <li>Schools and health facilities</li> </ul>
Important:	<ul style="list-style-type: none"> <li>Development is required to meet wider strategic or site specific objectives However, sustainability goals will need to be compromised and some adverse impacts (e.g. landscape) accepted.</li> </ul>	<ul style="list-style-type: none"> <li>Crucial to the success of Local Plan objectives</li> </ul>	<ul style="list-style-type: none"> <li>Precise timing of infrastructure not critical but needs to be coordinated alongside development</li> </ul>	<ul style="list-style-type: none"> <li>Telecommunications</li> <li>Emergency services</li> <li>Burial spaces</li> <li>Energy networks</li> </ul>
Desirable:	<ul style="list-style-type: none"> <li>Infrastructure will encourage sustainable development and meet local needs but not a high priority</li> </ul>	<ul style="list-style-type: none"> <li>Implementation of the Local Plan is not dependant on the delivery of the project.</li> </ul>	<ul style="list-style-type: none"> <li>Failure to deliver is unlikely to prevent development in the short or medium term</li> </ul>	<ul style="list-style-type: none"> <li>Local services (e.g. dentists)</li> <li>Community centres</li> </ul>

The information contained in this document will be kept under regular review over the plan period to take account of:

- updated or new plans and strategies (e.g. future iterations of the Local Plan);
- the progress and status of projects and programmes;
- the identification of new infrastructure requirements;
- changing priorities and outputs; and
- monitoring triggers (e.g. new planning permissions and funding allocations from developer contributions and other sources).

# 3 TRANSPORT

## 3.1 INTRODUCTION

Transport infrastructure includes:

- rail;
- bus;
- walking and cycling; and
- highways.

## 3.2 STRATEGIC CONTEXT

Overall, Enfield has good transport links. It benefits from direct access to the strategic road network including the M25 motorway and major trunk roads (A10 and A406) and a broad range of public transport options, including:

- 18 railway stations across 4 separate lines with connections to central London, Cambridgeshire Essex, Stansted Airport and Hertfordshire;
- 4 underground stations (Piccadilly line) in the west of the borough connecting to central London and Heathrow Airport;
- a network of day and night bus routes, connecting to Central London and the surrounding boroughs and counties; and
- good interchange to key interchanges (e.g. Jubilee line at Seven Sisters and Stratford international station).

Car transport remains the dominant form of transport in the borough. While walking and cycling trips have increased in recent years, Enfield still has a disproportionately higher number of trips to work from less sustainable modes of transport compared to the rest of London.

Crowding and congestion are recurring issues across many parts of the borough's transport network, especially at key junctions leading onto strategic highway routes. Demand on the road and public transport network is increasing as a result of population growth, major regeneration initiatives and developments (e.g. Upper Lee Valley). However, some areas of the borough have limited access to rail and bus services, especially along the Lee Valley corridor despite the presence of the West Anglia Main Line, as this suffers from low service frequencies and poor station access, particularly around Meridian Water station.

Enfield LB recognises the need to transform and modernise Enfield's transport infrastructure, with a particular focus on improving public transport accessibility and connectivity to address current capacity constraints, as well as meet the needs arising from additional growth - which are critical to supporting the borough's economy and quality of life.

## 3.3 RAIL INFRASTRUCTURE

### Where are we at now

Enfield supports a comprehensive network of rail services (tube, overground and mainline) serving a range of rural, suburban and urban communities. National rail and London Overground connections are available to London King's Cross, Moorgate and Liverpool Street stations, and outside of London towards Welwyn Garden City, Letchworth, Stevenage (via Hadley Wood); Hertford North (via stations including Palmers Green, Enfield Chase and Gordon Hill); and Hertford East, Cheshunt, Stansted Airport and Cambridge (via the West Anglia Main Line route through stations including Meridian Water and Brimsdown, or the London Overground Southbury Loop and Enfield Town branch line via stations including Edmonton Green).

As rail transport demand continues to rise across the network, significant capital investment will be required to keep pace with the borough's ambitious growth agenda, including additional track capacity and faster and more frequent freight and passenger services, especially at peak times. Direct train links are available from Enfield to Central London but there are no east-to-west connections.

### Key priorities

- Increase the frequency, journey times and reliability of rail services between the Upper Lee Valley and surrounding areas including central London and London-Cambridge innovation corridor;

- Improve local connectivity and strategic links to key designations (e.g. Stratford and Canary Wharf);
- Increase the frequency of train services to at least 4 an hour at all times (including Enfield Town to Liverpool Street services and those operating on the Great Northern branches via Crews Hill and New Southgate);
- Devolve investment decisions to reflect local priorities (e.g. suburban rail routes);
- Increase step free access at rail stations and providing better interchanges between bus stations and rail routes/services along West Anglia and Overground lines and access/capacity constraints at Liverpool Street and Stratford stations

## **Challenges & risks**

- Existing railway lines and the land acquisition requirements of the four-tracking scheme are a major barrier to east-west movement in Enfield including the existing level crossings at Enfield Lock and Brimsdown, with impacts on the wider transport network in north London and beyond.
- Crossrail 2 has been postponed due to the financial impact of the covid-19 pandemic. However, TfL is still seeking to safeguard the route along the West Anglia mainline from unnecessary development during the plan period.
- Closure of existing level crossings (e.g. Brimsdown and Enfield Lock) would need mitigation to avoid severing links and would restrict vehicular movement. Minimising risk at level crossings to improve the safe and reliable operation of the railway line.

## **Planned provision**

- New enhancements will be required along the rail network in the Upper Lee Valley (e.g. Hertford loop line) and on other suburban routes to support the planned growth and address accessibility gaps and capacity constraints.
- New growth / urban intensification will be directed around existing or planned stations to unlock future development opportunities

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
<b>Stratford to Angel Road Enhancement Project</b>	Meridian Water access improvement works and rail upgrades, including: <ul style="list-style-type: none"> <li>a new central spine road (Bridge Street) to link the whole of Meridian Water to the station and</li> <li>a fourth track from Tottenham Hale to Meridian Water station to improve frequency of train services</li> </ul>	Short term (2025)	<ul style="list-style-type: none"> <li>Greater Anglia Rail</li> <li>Great Northern Rail</li> <li>TFL</li> <li>Network Rail</li> </ul>	£156 million	Housing Infrastructure Fund (£40million will be used to fund 6-8 trains per hour)	Critical	No other funding required
<b>Piccadilly Line Modernisation Project</b>	London Underground upgrade programme to serve stations at Arnos Grove, Cockfosters, Southgate and Oakwood. Signal replacement and new rolling stock will provide increased frequencies and unlock extra capacity on the tube network from 2023 onwards	Short term (to around 2023) will include upgrading maintenance facilities  New trains from 2025  Signalling upgrade mid to late 2020s	<ul style="list-style-type: none"> <li>TFL</li> <li>GLA</li> </ul>	£16 billion (overall scheme)	New Tube for London (TfL)	Critical	Upgrades to stabling and maintenance facilities at Cockfosters depot to enable migration to the new fleet
<b>West Anglia Mainline Enhancement Project</b>	<ul style="list-style-type: none"> <li>Four tracking of the West Anglia mainline (between Tottenham Hale to the south and Broxbourne to the north)</li> <li>New platform capacity at Stratford</li> <li>Higher frequency services: 8 trains per hour</li> <li>Solutions to level-crossings (e.g. bridges/ structures)</li> </ul>	Medium to long term (long lead in times of track possessions)	<ul style="list-style-type: none"> <li>Network Rail</li> <li>TFL</li> <li>Upper Lee Valley stakeholders</li> <li>West Anglia Taskforce</li> <li>London Stanstead Cambridge Corridor Consortium</li> </ul>		Growing Places Fund (GLA)  Housing Infrastructure Fund - four-track part of line from Tottenham Hale and Meridian Water	Critical	Enfield Lock and Brimsdown crossings will need to close when the line is four-tracked north of Ponders End.
<b>London Overground</b>	<ul style="list-style-type: none"> <li>Increase frequency of train services on both Enfield Town and Chestnut branches - four trains per hour per day with intervals</li> <li>New high capacity rolling stock to be provided on services out of Liverpool Street to Cheshunt, Chingford and Enfield Town. Higher frequency services to support growth areas, including the Edmonton Green Housing Zone.</li> </ul>	Short term	TFL - health streets programme  Mayor of London		Liveable Neighbourhood Fund (from a pot of £6 million)  Mid-Tier Access for All (funding nominations in due course).  £200 million (new rolling stock)	Critical	Delivery is underway
<b>Access improvements to existing stations along Lee Valley mainline (Southbury Loop)</b>	<ul style="list-style-type: none"> <li>Facilitate interchange (Silver Street, Brimsdown, Southbury and Enfield Lock) and the growth potential of surrounding development sites.</li> <li>Step-free access</li> </ul>	Short to medium term (post 2024)	<ul style="list-style-type: none"> <li>TFL</li> <li>Train operators</li> <li>Network Rail</li> </ul>		Partnership working with train operator and Network Rail	Critical	Contingent on West Anglia Mainline investments
<b>Frequency and reliability on Great Northern services</b>	<ul style="list-style-type: none"> <li>Devolution of services to the Mayor of London &amp; transfer to London.</li> <li>Re-signalling the line to European rail traffic management system standards will provide increased capacity &amp; improved resilience</li> <li>Overground network. Increase off peak services</li> </ul>	Short to mid-term	<ul style="list-style-type: none"> <li>Network Rail</li> <li>TFL</li> <li>LBE</li> </ul>		Devolution of the route to TfL	Essential	

<b>Crossrail 2</b>	<p>Crossrail 2 is a proposed rail route running across the south west and north west of London to serve all the West Anglia mainline stations in the borough: Meridian Water, Ponders End, Brimsdown and Enfield Lock, with up to 12 trains per hour in each direction.</p> <p>Crossrail stations are proposed at Tottenham Hale and New Southgate</p>	Long-term (post plan period)	<ul style="list-style-type: none"> <li>• Network Rail</li> <li>• TFL</li> <li>• Mayor of London</li> <li>• Department for Transport</li> </ul>	£40 billion	<ul style="list-style-type: none"> <li>• Mayor of London CIL</li> <li>• Transport for London</li> <li>• Department for Transport</li> <li>• Other sources</li> </ul>	Critical in the next plan period	<p>Crossrail 2 cannot be built until it receives formal consent from government</p> <p>Crossrail 2 relies on four-tracking the West Anglia Mainline.</p>
--------------------	--	------------------------------	--	-------------	--	----------------------------------	--

## 3.4 BUS INFRASTRUCTURE

### Where are we at now

Buses are by far the most used form of public transport in Enfield and provide a comprehensive service that supports the economic and social fabric of the borough. Enfield town centre has reasonable coverage with 12 routes serving it including services connecting to neighbouring London boroughs and a few services extending into Hertfordshire and Essex.

Services are generally reliable but there is scope to improve links to hospitals (e.g. Chase Farm) and key employment areas from residential areas in the west and reduce waiting times arising from congestion along main roads, such as A10, A110, A1055 and North Circular Road A406.

### Risks & challenges

- Physical barriers (e.g. Greater Anglia Mainline - level crossings) and long walking distances to employment.
- Crossrail 2 will have a significant impact on future bus demands.

### Key priorities:

- Reduce journey times, especially to key destinations (e.g. town centres)
- Increase the reliability and frequency of bus services on existing routes and, where possible, introducing new routes and stopping points
- Reverse the decline of bus journeys (traffic congestion is a major contributor to this trend)
- Improve bus circulation and access to railway stations and key employment centres, avoiding conflict with pedestrians and cyclists
- Make sure bus services are flexible and tailored to suit changing demands (e.g. travel behaviour)
- Provide bus stands and depots in strategic locations (e.g. Meridian Water)
- Introduce cleaner and more energy efficient fleets to minimise emissions, especially along key arterial and orbital routes

### Planned provision

- Develop a high-quality mass bus-transit network to improve east-west connectivity and serve/facilitate development, especially in locations where there is no planned rail access (as identified in the Mayor of London's Transport Strategy) as part of a phased approach which links to housing and employment growth along transport corridors (subject to the results of transport modelling)
- Deliver borough-wide improvements to bus services, focused on the Lee Valley corridor (e.g. Meridian Water) and orbital links (e.g. North Circular)

Project Title	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
Meridian Water	<p>Bus priority measures (including new standing areas and stops) will be introduced along key arterial routes (especially at traffic signals) and the central spine to facilitate east-west movement across the site and create a more efficient and reliable bus network</p> <p>Relocation of the existing bus depot</p>	Short to medium term	<ul style="list-style-type: none"> <li>• TFL</li> <li>• LBE</li> <li>• London Bus Services</li> </ul>		<ul style="list-style-type: none"> <li>• TFL / GLA</li> <li>• Developer contributions</li> <li>• Funding bids e.g. Liveable Neighbourhoods</li> </ul>	Critical	<p>The scheme will facilitate east-west movement across the site and create a more efficient and reliable bus network</p>

<b>Enfield rapid transit</b>	Rapid transit bus lanes in the Upper Lee Valley corridor from Ponders End (via Enfield Town, Enfield Chase and Oakwood) to East Barnet and along the North Circular from Meridian Water to New Southgate	Medium to long term	<ul style="list-style-type: none"> <li>TFL</li> <li>Better Streets for Enfield</li> <li>LB of Barnet</li> </ul>		<ul style="list-style-type: none"> <li>Developer contributions</li> <li>TFL</li> </ul>	Critical	Likely to be a phased approach which links to housing and employment growth along corridors.
<b>Lee Valley bus improvement programme</b>	New bus routes and services to key designations and changes to existing routes, with improved frequency and journey times. Specific proposals include: <ul style="list-style-type: none"> <li>a new link to North Middlesex Hospital;</li> <li>new routes to the Lee Valley, serving new homes and businesses in Meridian Water and the Tottenham regeneration area);</li> <li>extensions to existing routes (e.g. from Tottenham Hale to Blackhorse Road, Clapton and Walthamstow); and</li> <li>new stopping points.</li> </ul>	Various timescales	<ul style="list-style-type: none"> <li>TFL</li> </ul>		<ul style="list-style-type: none"> <li>TFL</li> <li>Developer contributions</li> </ul>	Essential	Enfield Climate Action Plan
<b>Retrofitting bus fleet programme</b>	Expansion of the retrofitting bus fleet programme to meet emission standards and Low Emission Bus Zones in pollution hot spots	Short to medium term	<ul style="list-style-type: none"> <li>TFL</li> </ul>		<ul style="list-style-type: none"> <li>TFL</li> </ul>	Essential	
<b>Fore Street</b>	The scheme will create a new south bound bus lane on the southern section of Fore Street and include a range of upgrades to road crossings, pathways and the surrounding street space which will enhance the visibility and accessibility of the town centre	Short to medium term	<ul style="list-style-type: none"> <li>TFL</li> <li>LBE</li> <li>London Bus Services</li> </ul>		<ul style="list-style-type: none"> <li>TFL / GLA</li> <li>Developer contributions</li> <li>Funding bids (e.g. Liveable Neighbourhoods)</li> </ul>	Essential	
<b>North East Enfield</b>	<ul style="list-style-type: none"> <li>Bus service prioritisation and associated traffic management measures along key corridors (e.g. A110, A1055 and A1010)</li> <li>Provision of more direct and frequent bus services to industrial areas (e.g. Brimsdown estate)</li> <li>Standing and interchange facilities at Enfield Lock and Brimesdown stations</li> </ul>	Short to medium term	<ul style="list-style-type: none"> <li>TFL</li> <li>LBE</li> <li>London Bus Services</li> </ul>		<ul style="list-style-type: none"> <li>TFL / GLA</li> <li>Developer contributions</li> <li>Funding bids e.g. Liveable Neighbourhoods</li> </ul>	Essential	
<b>Enfield Town Bus Project</b>	<ul style="list-style-type: none"> <li>Redevelopment / relocation of the bus turnaround area and public realm improvements (Little Park Gardens/Church Street)</li> <li>Enfield Chase</li> </ul>	Medium to long term	<ul style="list-style-type: none"> <li>TFL</li> <li>LBE (freehold)</li> <li>London Bus Services</li> </ul>		<ul style="list-style-type: none"> <li>Funding bids e.g. Liveable Neighbourhoods</li> <li>Developer contributions</li> </ul>	Essential	

## 3.5 WALKING & CYCLING

### Where are we now

Like other parts of outer London, Enfield has relatively low levels of cycle usage and walking and is still relatively car dependent.

The highest levels of walking in Enfield are around the railway stations and along the Lee Valley Regional Park corridor. However, there are significant barriers to walking and cycling in much of Enfield:

- The A406 North Circular forms a barrier to north south movement on foot and by bike through Meridian Water and the rest of Edmonton Leeside

- The A1055 along with the industrial estates and the Lee Valley reservoirs form a significant barrier to east west active travel movements
- The railway lines form a barrier for east west movement for pedestrians and cyclists, increasing travel distances away from desire lines
- Various cycling and walking routes highlighted in the North East Area Action Plan and Edmonton Leeside Area Action Plan are narrow, unlit, unsegregated and of poor quality
- There are also site-specific constraints such as private ownership and lack of design consideration to improve connectivity across various forms of development.

Research suggests that physical inactivity in Enfield is contributing to rising levels of health-related problems such as obesity, diabetes, cancer, dementia, stroke, heart disease and mental illness, especially among poorer groups.

The network of public rights of way in Enfield has over 1,170 km of footways and cycleways and over 52km of footpaths. These range from long distance routes (e.g. London Loop, Thames Path and Lee Navigation towpath) to a number of circular routes (e.g. Turkey Brook Link and Salmon Brook Link) and off-road paths.

Enfield's proximity to green spaces and waterways offers significant opportunity to expand the existing cycle and pedestrian network from the dense urban communities via the river valleys (e.g. New River) and towpaths to the Lee Valley Regional Park and open countryside, building on the early momentum of the Mini Holland programme. The borough has among the highest active travel growth potential in outer London.<sup>1</sup>

## Risks & challenges

Site-specific constraints (e.g. private ownership), physical barriers (e.g. level crossings, arterial roads and reservoirs) and development blight

## Key priorities

- Make active travel the natural choice, particularly for those trips less than 2km in length (30% of all car trips in Enfield are less than 2km in length and nearly 60% are less than 5km)
- Increase active travel to destinations such as open spaces, schools, leisure centres, town centres and places of work
- Improve east-west connectivity over existing road and railway lines to the Lee Valley Regional Park, especially along the River Lea and Lea Navigation
- Improve public access to existing attractions and open countryside, reconnecting deprived communities to nature and open spaces
- Enhance north-south landscape connections along tributary river valleys (e.g. Pymmes Brook, New River and Salmons Brook) and green wedges
- Increase physical activity through the creation of new cycling and walking routes, linking key destinations (e.g. town centres, hospitals and transport interchanges) and national cycle network;
- Enhanced cycle parking facilities in neighbourhoods and at key destinations (e.g. schools, public transport interchanges and major employment centres)
- Enhance the quality of the public realm (e.g. junction upgrades and safer crossings) to help improve the vitality and viability of our town centres

## Planned provision

As part of the Mayor of London's healthy streets programme, we are delivering a series of large-scale physical works (e.g. new segregated cycleways, walking and crossing-points) and a range of complementary measures (e.g. cycle parking, priority junctions and speed restrictions) to create a safer, more accessible and high-quality cycle and pedestrian network, with improved links to other parts of London and parts of Hertfordshire. Our long-term ambition is to increase the mode share of walking and cycling across all trips originating in the borough with a view to substantially increasing the number of active travel trips. The aim is to generate a five-fold increase in cycling levels, enabling around 25,000 daily journeys by bike, and by 2031, 80% of residents to be within 400 metres (about 1 minute by cycle) of a cycle route.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
New bridge construction programme	Construction of a series of new bridges over existing railway lines, level crossings	Short, medium and long term	• LBE	• £10 million	• Levelling Up Fund	Critical	LBE will be required to fund any

<sup>1</sup> The North London Sub Regional Transport Plan (2015) estimates that between three and five million more trips could be made via active travel modes (walking and cycling) every day in Enfield.

	<p>&amp; major roads to facilitate access into major regeneration sites &amp; town centres, including:</p> <ul style="list-style-type: none"> <li>• NMUH hospital site to Angel Edmonton town centre &amp; Silver Street station</li> <li>• Shires estate via the A406 to Upton Raynham Estate &amp; onto Angel Edmonton;</li> <li>• Level crossing replacements / bridges over West Anglia mainline</li> <li>• River Lea to upper Lee Valley Regional Park</li> </ul> <p>Other improvements will include footways widening and new lighting installations</p>				<ul style="list-style-type: none"> <li>• Developer contributions</li> </ul>		consequential restructuring needed to the road network
<b>New River Loop as a walking path</b>	New River Loop as a walking path (Enfield Town - Broxbourne).	Short term	<ul style="list-style-type: none"> <li>• Enfield Civic Trust</li> <li>• LBE</li> </ul>	TBC	<ul style="list-style-type: none"> <li>• Heritage Lottery Fund</li> <li>• LBE</li> </ul>	Desirable	
<b>Green Loop</b>	A new continuous route of active travel infrastructure and open space from the Green Belt/Lee Valley Regional Park along the river corridors & existing routes into densely built-up urban areas	Medium to long term	<ul style="list-style-type: none"> <li>• Lee Valley Regional Park Authority</li> <li>• Natural England,</li> <li>• Environment Agency</li> <li>• Sustrans</li> <li>• Canal &amp; Rivers Trust</li> <li>• TfL</li> </ul>	£40 million (estimated)	<ul style="list-style-type: none"> <li>• GLA/TfL</li> <li>• Government / arm's length agencies</li> <li>• National Lottery</li> <li>• Heritage Fund</li> <li>• Capital programme</li> <li>• Developer contributions</li> <li>• Community grants</li> </ul>	Important	Costs of the scheme will be subject to further feasibility and financial appraisal
<b>Enfield Town</b>	<p>A two-way segregated cycle lane along Cecil Road and London Road, connecting with existing routes</p> <p>Improvements will also require the Church Street carriageway to be narrowed (connecting Market Square and the shopping centre) and existing junctions will be redesigned to improve pedestrian and cycle safety and access to Enfield Town Overground station.</p>	Short term: 2020/2021-2023/2024	<ul style="list-style-type: none"> <li>• TfL</li> <li>• LBE</li> <li>• Better Streets for Enfield</li> <li>• Sustrans</li> </ul>	Unknown	<ul style="list-style-type: none"> <li>• Liveable Neighbourhoods</li> </ul>	Important	
<b>Cycle Enfield / healthy streets programme</b>	<p>Proposed new cycleways include:</p> <ul style="list-style-type: none"> <li>• Ponders End to Enfield Wash</li> <li>• A1010 to North Middlesex Hospital / A406 Angel Walk</li> <li>• Enfield Town to Broxbourne (New River Path)</li> <li>• William Girling via River Lee diversion to King George V (Chingford Reservoirs)</li> </ul>	Short term	<ul style="list-style-type: none"> <li>• TfL</li> <li>• LBE</li> <li>• Better Streets for Enfield</li> <li>• Sustrans</li> </ul>	£42 million	<ul style="list-style-type: none"> <li>• Mayor's Outer London Fund</li> <li>• TfL</li> <li>• Capital programme</li> <li>• Liveable Neighbourhoods</li> </ul>	Important	Cycle parking hubs in town centres: Enfield Town & Edmonton Green
<b>Lee Navigation - towpath enhancements</b>	<ul style="list-style-type: none"> <li>• Improvements to the surfacing of the towpath as a shared space and access points to the Lee Valley Regional Park</li> <li>• Creation of a new section of towpath (as part of flood risk mitigation works at Meridian Water)</li> </ul>		<ul style="list-style-type: none"> <li>• LBE</li> <li>• Canal &amp; River Trust</li> <li>• Lee Valley Regional Park Authority</li> </ul>		<ul style="list-style-type: none"> <li>• Grants</li> <li>• Developer contributions</li> </ul>	Important	Ecological enhancements to improve biodiversity and the remodelling of hazardous section of the towpath.

	• Improved links to the River Thames Fatwalk						
<b>Programme of new or improved walking routes</b>	Improvements to Lee Navigation towpath, London Loop, Pymmes Brook & Salmons Brook trails  New routes, including: <ul style="list-style-type: none"><li>• A10 to A1010</li><li>• Angel Edmonton to Meridian Water</li><li>• Edmonton Marshes through to Pickett's Lock &amp; onto Haringey via Tottenham Marshes</li></ul>	Short to long term	• LBE • TfL • GLA		• HIF • Developer contributions	Desirable	
<b>Grey to green gateways</b>	A series of public realm interventions (e.g. sustainable drainage systems) along key routes leading into town centres and growth areas	Short to medium term		£15-17million (Enfield Town)	• LBE • Developer contributions	Desirable	

## 3.6 HIGHWAYS

### Where are we now

Enfield is bounded by the M25 motorway to the north and is dissected by two trunk roads: the A10 (London to Cambridge) and A406 (London's North Circular Road). These are supplemented by several key A-roads including the A1055 Bullsmoor Road/Mollison Avenue/Meridian Way (north south link), the A1010 Hertford Road (north south link) and the A110 (east west link).

Businesses reliant on bulk freight movement tend to be located in the east of the borough, particularly on key routes such as Mollison Avenue, Meridian Way and Great Cambridge Road.

Since 2013, levels of motor traffic entering and exiting the borough have been increasing year-on-year despite car ownership levels remaining relatively stable. Many parts of the borough suffer from significant congestion, with particular problems occurring on the A406, North Circular Road between Bounds Green to Green Lanes and A10, Greater Cambridge Road to Bounds Green. Regular congestion also forms on parts of A10, Greater Cambridge Road with vehicles regularly queuing as they enter the borough from junction 25 of the M25 in the AM peak and as they exit the borough via the same junction in the PM peak. Severe congestion often effects the junction immediately south of junction 25 of the M25, the A10 Great Cambridge Road / Bullsmoor Lane junction.

With few east-west links due to physical severance from reservoirs in the east of the borough, motorists wanting to cross the borough are directed towards the pinch point between the King George's and William Girling reservoirs where the A110 (Lea Valley Road) passes through.

### Risks & challenges

- Planned growth will require strategic and local capacity interventions (including junction improvements and traffic island upgrades) to overcome constraints with more emphasis on making space available to facilitate active travel and efficient public transport services.
- There is a lack of connectivity between strategic east-west and north-south highway links across the borough, which limit movement and access to jobs and services. Nearly half of individuals living in the borough travel to work by car, compared to 36% across all London boroughs.

### Key priorities

- Encourage a modal shift from car use to walking, cycling and public transport, in line with the Mayor of London's healthy streets approach (Enfield's residents make fewer public transport trips than the Outer London and Greater London averages)
- Reduce the impact of private vehicles on our streets (e.g. avoid traffic rat runs through residential areas in north east Enfield)
- Improve the safety and accessibility of the borough's hierarchy of streets, especially aimed at vulnerable road users
- Make more efficient use of existing road space (a bike takes up the fifth of the space that a car does)
- Exploit opportunities to shift freight from roads to rail/canal and reduce localised car journeys

- Minimise the environmental effects of future road schemes (as road traffic is the main source of air and noise pollution in Enfield).

## Planned provision

- Enfield LB will implement a package of road improvement measures including new signalling at junctions, road widening and new slip roads to prioritise sustainable transport and address existing issues with the operation of the strategic highway network, whilst facilitating development opportunities.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
M25 junction improvement scheme	<ul style="list-style-type: none"> <li>Extra lanes on the roundabout, widening of the A10 southbound approach &amp; M25 approaches &amp; allowing free-flow traffic to left turn from M25 clockwise to A10 north i.e. improve journey times at the junction, allow more capacity on exit slip roads &amp; reduce the likelihood of traffic queuing back onto the M25</li> </ul>	Short term (2020/21)	<ul style="list-style-type: none"> <li>Highways England</li> <li>Department for Transport</li> <li>Transport and Logistics Forum</li> <li>River &amp; Canals Trust</li> <li>British Waterways</li> </ul>	£25 to £50 million	Department for Transport	Critical	
Northern Gateway Access Project	<ul style="list-style-type: none"> <li>A comprehensive package of measures to improve accessibility &amp; movement for pedestrians, cyclists, public transport users &amp; freight in north east Enfield. This includes:           <ul style="list-style-type: none"> <li>a new slip road from Mollison Avenue to M25 to ease traffic along A1055 Bullsmoor Lane;</li> <li>improved access to local railway stations;</li> <li>replacement of West Anglia Main Line level crossings;</li> <li>restraint measures to limit general traffic growth &amp; discourage car trips, including A10 junction improvements</li> </ul> </li> </ul>	Medium to long term	<ul style="list-style-type: none"> <li>TfL</li> <li>Highways England</li> <li>Hertfordshire CC</li> <li>Essex CC</li> <li>Broxbourne DC</li> <li>Epping Forest DC</li> <li>LB Haringey</li> <li>LB Waltham Forest</li> <li>Lea Valley Regional Park</li> </ul>	No funding agreed	<ul style="list-style-type: none"> <li>TfL</li> <li>Highways England</li> <li>Other</li> </ul>	Critical	
Increase electric vehicle charging provision	1,900 new electric vehicle charging points including slow and rapid chargers	By 2030	<ul style="list-style-type: none"> <li>TfL</li> <li>LBE</li> </ul>	£6,65 million	<ul style="list-style-type: none"> <li>Government grant</li> <li>Third party funding</li> </ul>	Important	
Central Spine	<p>A new east-west link road (including associated bridges &amp; pedestrian/cycle routes) running across the whole site, forming the core spine around which the development will be delivered.</p> <p>New north-south routes: Argon Road to Leeside Road &amp; Conduit Lane to Leeside Road (new connection to Edmonton Green)</p>	Short term (project is underway)	<ul style="list-style-type: none"> <li>TfL</li> <li>LBE</li> <li>Private sector</li> </ul>	£87.3 million	HIF funding	Critical	The link will act as the truck route for servicing & subterranean infrastructure (e.g. gas & water)

## 4 ENERGY

### 4.1 INTRODUCTION

This section covers electricity, gas and renewable energy infrastructure.

### 4.2 ELECTRICITY

#### Where are we at now

The table below outlines the existing baseline situation with regards to the capacity and operation of the borough's electrical infrastructure network.

Responsibility	Organisation	Infrastructure	Capacity
Day-to-day operation & management of the electricity network at a distribution level	UK Power Network	<ul style="list-style-type: none"> <li>• 15 bulk supply points serve the borough's electrical infrastructure</li> <li>• Electricity cables and substations</li> </ul>	There is combined total of around 124MVA of spare capacity in the local distribution network.
Operation & maintenance of the local transmission system	National Grid	<ul style="list-style-type: none"> <li>• Grid supply points (GSPs)</li> <li>• Overhead high voltage transmission lines and underground cables</li> <li>• Major National Grid substation (Brimsdown)</li> </ul>	All GSPs operating in the borough have significant capacity to support further electricity distribution.

Electricity demand is expected to rise over time, due to increases in the use of electric vehicles, heat pumps, IT equipment and other electronic appliances.

## Risks & challenges

- Baseline results indicate that limited spare capacity is available in the borough's electrical network at the distribution level<sup>2</sup>. Substations such as Cockfosters and Ladysmith Road are almost operating at capacity and in general the entire local distribution network has limited spare capacity at present. In addition, the shifting electricity sector structure and markets will also introduce challenges that could either be beneficial or detrimental to growth in the borough depending on their alignment with the planned developments. However, regulations prevent distribution network operators from investing in infrastructure ahead of need.
- Electricity demand is expected to show a strong rebound as Enfield's economy recovers from covid 19 pandemic and then accelerate as the market shifts to more efficient technologies (e.g. electric vehicles) and the electrification of heat. This, in turn, will place heavy stress on grid and trigger several reinforcements across the network depending on the rate of uptake. London is expected to lead this uptake at a large scale. Careful consideration should be given to such demand pressure and its impact on future projects.
- Electricity consumption patterns are becoming more difficult to predict as new technologies and market forces emerge. London has high demand but low levels of electricity generation. Across London, power is almost exclusively imported from the north and west into the southeast and London. As such, the circuits entering from the north can be overstretched, especially in the winter peak months. London also exports power to mainland Europe via a series of interconnectors in the southeast, which also places stress on circuits. The high demand and power flows may also lead to voltage depression in London and the wider southeast.

## Key priorities

- Increase electricity consumption and production (as more vehicles and buildings are switching from fossil fuels to electric power sources)
- Maintain the safety and reliability of the borough's electricity network (e.g. avoid power cuts), especially during peaks and troughs
- Support fuel-poor and vulnerable customers (in the face of rising electricity prices and changing patterns of consumption)
- Install new low carbon and renewable generators (up to a quarter of the UK's power station capacity is reaching the end of its operating life and will need timely replacement)
- Ensure new developments have adequate connections to the electricity network, including power generators and underground cables
- Prevent overloading and voltage depressions (due to high demand and power flows from London and continental Europe)
- Increase the voltage capacity of existing electricity substations (e.g. Meridian Water) to accommodate higher levels of growth.

## Planned provision

In view of the capacity constraints, additional network reinforcement works will be required both in the short and longer term (including new substations) to increase delivery times and respond to growth energy demands arising from planned growth

<sup>2</sup> Baseline stage 1 review (AECOM, 2020)

in Enfield. These potential reinforcements should be carefully considered in the phasing and budgeting of future development programmes to ensure that existing infrastructure does not create a bottleneck to the development trajectory and adequate time is allowed for any reinforcement works.

Project Title	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
<b>Meridian Water</b>	<ul style="list-style-type: none"> <li>Pylons - provide electricity to the Meridian Water scheme</li> <li>New primary substation to supply 40MW demand and associated infrastructure (e.g. pylons) to serve the Meridian Water scheme</li> </ul>	Medium term (2026/27)	<ul style="list-style-type: none"> <li>LBE</li> <li>UK Power Networks</li> <li>Developers</li> </ul>	TBC	<ul style="list-style-type: none"> <li>Developer contributions</li> <li>Utility providers</li> </ul>	Critical	
<b>Upgrades &amp; reinforcement of electricity systems</b>	Upgrades and reinforcement of electricity systems (due to increased energy requirements arising from strategic developments)	Medium to long term (schemes are on hold until the demand is likely to be triggered).	<ul style="list-style-type: none"> <li>UK Power Networks</li> <li>TfL</li> </ul>	TBC	<ul style="list-style-type: none"> <li>Infrastructure providers</li> </ul>	Critical	Dependent on the implementation of Crossrail 2 & upgrades at Deepham's sewage treatment plant
<b>Enfield Power Station</b>	<p>GT26 HE (high efficiency) gas turbine platform upgrade Increase electricity generation capacity from 360MW to 450MW</p> <p>The scheme also will improve Enfield's competitive position compared with other gas generation plants in the U.K - the world's most advanced solution on a GT26 gas turbine</p>	Short term  Increase the operation life of the plant to 2040	General Electric Uniper	Unknown	<ul style="list-style-type: none"> <li>Private investors</li> </ul>	Critical	Long term options: combined heat and power through the future redevelopment of nearby industrial sites and carbon capture equipment
<b>Ladysmith Road - primary reinforcements</b>	33/11kV primary substation - capacity increase	Short term	<ul style="list-style-type: none"> <li>UKPN National Grid</li> </ul>	TBC	<ul style="list-style-type: none"> <li>UKPN</li> </ul>	Critical	<ul style="list-style-type: none"> <li>UKPN Regional Development Plan</li> <li>UKPN Business Plan 2015-2023</li> </ul>
<b>Upgrades and reinforcement of electricity systems</b>	<p>Upgrades and reinforcement of electricity systems (due to increased energy requirements arising from strategic developments)</p> <p>Dependent on the implementation of Crossrail 2 &amp; upgrades at Deepham's sewage treatment plant</p>	Medium to long term (schemes are on hold until the demand is likely to be triggered).	<ul style="list-style-type: none"> <li>UK Power Networks</li> <li>TfL</li> </ul>	TBC	<ul style="list-style-type: none"> <li>UKPN / National Grid</li> <li>Developers</li> </ul>	Critical	Future upgrades have been identified in the north Lee valley to the high voltage system but the schemes are on hold until the demand is likely to be triggered.

## 4.3 GAS

National Grid owns and operates the gas transmission network across the whole of the UK. The national transmission system directs gas from gas sources, such as storage sites and reserves, to local transmission systems which are operated by distribution companies. Approximately 85% of dwellings in the UK are connected to the network and use natural gas for space heating, water heating and cooking.

Gas supply and connection is currently unconstrained in Enfield as it benefits from several pipeline connections to the UK's high-pressure transmission network. The distribution network serving customers within Enfield are sufficiently resilient to supply all proposed developments that currently have planning consent. Cadent Gas forecasts minimal change in gas demand through to 2028 and is not planning any upgrades to the network within the borough.

As the energy industry continues to undergo the decarbonisation required to meet emission reduction commitments, future gas infrastructure planning will need consider low carbon and renewable solutions to gas boilers and traditional central heating systems, such as heat pumps.

## Risks & challenges

- Some of the development sites in the Lee Valley fall within the exclusion zones of high and medium pressure gas mains, which will require the diversion of existing gas pipes to accommodate new homes and businesses (e.g. Meridian Water)
- Minimising risk arising from major gas installations: there are number of major hazard sites in Enfield, including gasholders and gas supply pipelines
- Gas supply patterns are becoming more difficult to predict as new technologies and market forces emerge. As Enfield's population grows, the gas network will need to be able to cope with unexpected spikes in demand, due to exceptional weather conditions and transmission disruptions.

## Key priorities

- Increase the reliability and efficiency of the gas distribution network;
- Move away from low pressure natural gas to low carbon systems (e.g. bio-methane and hydrogen fuel cells)
- Maintain and increase network capacity
- Maximise the potential of gas vehicle refuelling infrastructure (Refuelling stations has been installed at distribution centres along Brancroft Way and G Park in Enfield)

## Planned provision

- Specific details around capacity or quality of gas infrastructure within the borough is currently unknown and therefore no upgrades or reinforcement works to the intermediate pressure and medium pressure network is currently planned. However, it is unlikely that the full burden of heating demand could be absorbed within the existing electrical grid without significant infrastructure upgrades in the medium term.
- Gas infrastructure will need to be planned prior to development to ensure that sites can be connected to existing pipelines and sub stations to enhance capacity / reduce pressure within growth / opportunity areas (e.g. Meridian Water). Future interventions will be expected to focus on energy efficiency improvements and replacement low-cost gas infrastructure (e.g. heat pumps).

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
Meridian Water	<ul style="list-style-type: none"> <li>New pressure reduction station (existing station will be decommissioned)</li> <li>Diversion of medium pressure gas pipes to facilitate the development</li> <li>Low pressure main upgrades</li> </ul>	Short term	<ul style="list-style-type: none"> <li>National Grid</li> <li>LBE</li> <li>Developers</li> </ul>	TBC	<ul style="list-style-type: none"> <li>S106 agreement</li> </ul>	Essential	
Gas supply infrastructure maintenance	Maintenance, renewal and replacement of gas supply infrastructure (e.g. old metal mains)	Unknown	<ul style="list-style-type: none"> <li>National Grid</li> </ul>	TBC	<ul style="list-style-type: none"> <li>National Grid</li> <li>UK Power Network</li> </ul>	Essential	

## 4.4 RENEWABLE & LOW CARBON ENERGY

### Where are we at now

Enfield has set ambitious carbon reduction targets including a commitment to becoming a carbon neutral council by 2030 and a carbon neutral borough by 2040. In terms of progress, there has gradual reductions of both council-estate emissions and borough-wide emissions over the past few years, due in part to the scaling-up of investment in low carbon energy technologies (e.g. solar energy) and carbon offsetting. Achieving these targets will require an acceleration of deployment of solar energy and green electricity technologies such as ground source heat pump installations tower blocks and installation of sustainable urban drainage.

The scale and viability of renewable technologies varies across the borough depending on the location and nature of the proposed development.

Type	Where	Reason
District heating networks	<ul style="list-style-type: none"> <li>Planned growth areas</li> <li>Central and eastern wards</li> </ul>	<ul style="list-style-type: none"> <li>High heat demand densities</li> </ul>

Solar (e.g. photovoltaics)	<ul style="list-style-type: none"> <li>All locations</li> </ul>	<ul style="list-style-type: none"> <li>Solar photovoltaic systems account for the majority of installations but contribute only around 5.15 MW (8.5%) of the installed generation capacity in Enfield.</li> <li>Greater take-up of solar PV is predicted in response to increasing demands and electricity costs. Solar farms are now becoming viable without subsidies. Solar thermal is likely to become more common in both new and existing buildings, where heat pumps are used (due to the higher price of electricity and lower performance where generating higher temperatures).</li> </ul>
Plant biomass	<ul style="list-style-type: none"> <li>Rural north (e.g. Enfield Chase)</li> </ul>	<ul style="list-style-type: none"> <li>Large resource / land availability (e.g. energy crops)</li> <li>Poor air quality may constrain demand.</li> </ul>
Wind	<ul style="list-style-type: none"> <li>Small-scale wind power opportunities within large scale developments [e.g. Meridian Water]</li> </ul>	<ul style="list-style-type: none"> <li>Enfield has relatively good wind speeds</li> </ul>
Municipal solid waste	<ul style="list-style-type: none"> <li>Edmonton EcoPark<sup>3</sup>.</li> </ul>	<ul style="list-style-type: none"> <li>The largest renewable installation (80% of total identified capacity in the borough) is the 50MW municipal solid waste energy plant, which burns waste from several London boroughs and provide electricity to the National Grid.</li> </ul>
Electric charging points	<ul style="list-style-type: none"> <li>Priority locations along the road transport network</li> </ul>	<ul style="list-style-type: none"> <li>Existing charging points are not well used at present and installing new refilling stations when there is limited demand could have a knock-on impact on parking capacity in Enfield</li> </ul>
Other (e.g. anaerobic digestion & hydropower)	<ul style="list-style-type: none"> <li>Industrial locations and large watercourse</li> </ul>	<ul style="list-style-type: none"> <li>Some opportunities exist but are likely to be limited and very site specific.</li> </ul>

Enfield LB has set up its own energy company (Energetic) to oversee a series of high quality heat networks to supply low carbon heat and hot water to regeneration areas across Enfield. Heating is supplied through four heat networks (Arnos Grove, Ponders End, Oakbrook and Meridian Water) consisting of energy centres connected to insulated pipes that transport heat to homes and businesses in Enfield. These networks use different heat sources, including waste heat from the Edmonton waste recovery plant.

The heat network is forecast to save around 500,000 tonnes of carbon dioxide when compared to gas-fired heating, which is the equivalent of over 40,000 London buses or the planting of over a million trees.

## Risks & challenges

- Cumulative impact of renewable energy development (e.g. landscape/visual appearance from onshore wind development)
- Measures such as reducing demand (e.g. smart meters), increasing energy efficiency (e.g. heat pumps and waste recovery technologies) and using storage systems will be necessary to mitigate potential future impacts on existing infrastructure
- Renewables only make up around 2.74% of the borough's total electricity production per annum. Delivering 100% local renewable electricity to meet current demand would require at least 1,000 GWh of additional renewable electricity generation per annum, assuming that no demand reduction measures are implemented. However, this gap is growing and there is a risk of placing additional pressure on existing grid infrastructure.

## Key priorities

- Moving from centralised to more decentralised energy systems (e.g. Lee Valley Heat Network) to supply low carbon heat to homes, businesses and services within priority locations (e.g. areas of poor fuel poverty and social disadvantage)
- Exploit opportunities to future-proof energy infrastructure to meet increasing energy demands and technological advancements
- Reducing fuel poverty and disadvantage (one-in-11 households in Enfield are classed as fuel poor)
- Improve the energy efficiency of exiting housing and commercial stock

<sup>3</sup> This facility will be replaced with a new 70MW waste incineration plant as part of the North London Heat and Power Project.

- Optimise renewable and low carbon technologies (e.g. wind and solar)
- Ensure energy infrastructure projects are commercially viable, cost effective and sustainable
- Make the best use of locally based renewables, such as wind power and ground source heating.

## Planned provision

- Continued expansion of the borough's energy network to supply low carbon heat and hot water to over 30,000 homes and business in the Lee Valley area, where opportunities exist through new development, especially within areas of poor fuel poverty and social disadvantage
- Retrofit / refurbishment schemes (e.g. solar PV and biomass) within the public estate and area of high demand

Project Title	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
Decarbonise heat through connecting new homes to Energetik	<ul style="list-style-type: none"> <li>Expansion of the decentralised network (including heat and hot water connections to serve over 30,000 customers) in response to current &amp; future heat demands at the following locations:           <ul style="list-style-type: none"> <li>· Arnos Grove</li> <li>· Oakwood</li> <li>· Ponders End</li> <li>· Meridian Water</li> <li>· Alma Road</li> </ul> </li> <li>Installation of underground pipelines to distribute heat and hot water to serve the Meridian Water development</li> </ul>	Short to medium term - linked to development phasing (from 2022 onwards)	<ul style="list-style-type: none"> <li>Energetik</li> <li>LBE</li> <li>Developers &amp; landowners</li> </ul>	• £49m of loans & grants to serve 19,750 customers	<ul style="list-style-type: none"> <li>• Mayor of London's Energy Efficiency Fund</li> <li>• Public borrowing</li> <li>• Other sources (e.g. Heat Networks Investment Project)</li> <li>• Developer contributions</li> </ul>	Critical	<p>Pilots underway to determine more accurate costs including for different types and tenures</p> <p>Alma Road costing £5.850 million</p>
North London Heat & Power Project	<ul style="list-style-type: none"> <li>Construction of a new 70MW waste-to-energy plant, generating over 50 megawatts of electricity per year, enough to power over 30,000 new homes.</li> <li>Heat from the plant will be captured and transferred to a new energy centre in the eco-park, which will provide low carbon energy to the Meridian Water heat network</li> </ul>	<ul style="list-style-type: none"> <li>Medium to long term (by 2031)</li> <li>Plant will be installed in a phased manner to meet customer heat demands</li> </ul>	<ul style="list-style-type: none"> <li>LBE</li> <li>North London Strategic Alliance</li> <li>Energetik</li> </ul>	£1.2 billion	<ul style="list-style-type: none"> <li>• Public borrowing</li> <li>• Contingencies - use of CPOs &amp; land assembly powers</li> <li>• Alternative funding sources (Energy Company Obligations Scheme &amp; Renewable Heat Incentive)</li> </ul>	Critical	<p>Long-term potential to connect the park to a 'London-wide' network, including the Thames Gateway heat network</p>
RE:FIT/Refit:London	<p>Green recovery / good growth housing retrofit programme - aims to achieve EPC B or equivalent by 2030; also net zero scenario.</p> <ul style="list-style-type: none"> <li>Installation of solar panels, LED lighting, heat pumps, double glazing, insulation, light &amp; heat controls to council buildings (e.g. schools)</li> <li>Retrofit all 85 council-owned buildings with the highest energy use. Works will include the installation of solar panels, LED lightning and insulation, as well as optimising water heating and cooling pumps.</li> </ul>	Short to medium term	<ul style="list-style-type: none"> <li>GLA</li> <li>LBE</li> </ul>	1 million	<ul style="list-style-type: none"> <li>• GLA</li> <li>• European Regional Development Fund Council funding</li> </ul>	Essential	<p>The heat network is forecast to save around 500,000 tonnes of carbon dioxide when compared to gas-fired heating, which is the equivalent of over 40,000 London buses or the planting of over a million trees.</p>

<b>Council housing retrofit programme</b>	Integrated programme of new cladding, fire safety works, environmental / fabric improvements, lower carbon heat sources to council housing	Short term	• LBE	15 million	• Social Housing Decarbonisation Fund • Council funding	Important	Edmonton & other pilot areas
<b>Meridian Water pipelines (Energetik)</b>	80MW energy centre and installation of 24km trench length of underground pipelines to distribute heat and hot water to homes and businesses across the area	Short term, but branch connections to developments to 2040	• Developers & landowners • Infrastructure providers • LBE Energetik	£80 million	• Public borrowing • Mayor's Energy Efficiency Fund • BEIS (HNIP) Developer Contributions	Critical	
<b>Increase solar PV provision on commercial buildings</b>	18 installations (Edmonton & other pilot areas)	By 2030	• Energetik • LBE Developers & landowners	£4.5 million	• Government grants and other support (e.g. S106)	Critical	Based on assessment of installation capacity and cost of an average sized commercial unit
<b>Rolling programme of electric charging</b>	<ul style="list-style-type: none"> <li>Installation of new fast-charging points on arterial routes and in locations with high numbers of car trips</li> <li>Publicly available charging points on private sites</li> </ul>	250 charging points by 2025  Long term: Ongoing	• LBE • Blueprint London (London Network) • Electric Vehicle Infrastructure Taskforce	TBC	• Management & maintenance (Chargemaster) • Council funding • Developer contributions (long term)	Critical	Priority locations (e.g. Ultra-Low Emission Zone)
<b>Retrofit council corporate buildings</b>	Range of corporate buildings focusing on highest emitters to meet minimum 75% reduction in council direct emissions	By 2030	• LBE	£36.5 million	• Government grants • Council capital programme	Critical	Based on assessment of current programme cost and carbon reduction benefits
<b>Retrofit grant maintained schools</b>	43 grant maintained schools (75% of current total to allow for academisation)	By 2030	• LBE • Department of Education	£28.7 million	• Government grants • Council capital programme	Critical	Same as above
<b>Retrofit of all housing stock to be an average of EPC B</b>	Works to circa 118,000 properties including applicable local authority stock	By 2030	• GLA • LBE	£1.7 million	• Government grants (GHG, LAD, HUG) • Council (mainly HRA) • Owner occupier & private sector landlord investment	Critical	Based on housing stock analysis and pathways to interim target of EPC B average by 2030

## 4.5 WATER (SUPPLY & DEMAND)

### Where are we at now

Enfield is an area of serious water stress, as a result of lower than average rainfall and higher than average temperatures. The major water sources that supply the borough are the River Lee, River Thames and the Chalk aquifer beneath London. The public water supply sources in the Lower Thames and Lee rivers make up over two thirds of total freshwater abstracted in London. However, these water sources continue to suffer damage from over-abstraction and droughts.

Type	Responsibility	Facilities	Source	Capacity
Portable water	<ul style="list-style-type: none"><li>Thames Water Utilities Limited (TWUL) is the main supplier of portable water in Enfield</li><li>Affinity Water Limited (AWL) covers a small area in the south west of the borough</li></ul>	<ul style="list-style-type: none"><li>Underground pipes &amp; associated infrastructure</li></ul>	<ul style="list-style-type: none"><li>London Water Resource Zone (WRZ)</li><li>Central Region WRZ3-Lee</li></ul>	<ul style="list-style-type: none"><li>Population growth and climate change present significant challenges in terms of meeting the water demand within Enfield. When assessing the supply/demand balance forecasts under dry year annual average scenarios, an existing supply deficiency is shown across both WRZs. Without intervention, these deficits will increase over time.</li></ul>
Sewage:	<ul style="list-style-type: none"><li>TWUL</li></ul>	<ul style="list-style-type: none"><li>Treatment works, pumping stations &amp; the wastewater network</li></ul>		<ul style="list-style-type: none"><li>All flows and loads within the borough's network are treated at the wastewater treatment plant at Deepham.</li></ul>

### Risks & challenges

- GLA have indicated that London's water supply is close to capacity and there are likely to be supply problems by 2025 and serious shortages by 2040. Dense developments could intensify pressures on limited water supplies.
- Review of the Thames River Basin Management Plan and the Environment Agency's Catchment Data Explorer shows that no surface water bodies within the borough are rated as having 'good' status. Sources of pollution to water bodies are shown to include wastewater (intermittent and continuous discharges), urbanisation and transport drainage.
- In 2050, based upon a bi-annual median rainfall event and current infrastructure provision, the modelling suggests that Enfield's sewer network will be close to capacity due to pressures from population growth and climate change, especially in the Upper Lee Valley area - thus increasing the risk of surface water flooding and water spillages without significant infrastructure upgrades and sustainable drainage measures.

### Key priorities:

- Provide high quality, safe and reliable water and wastewater services, whilst limiting the impact on the environment
- Make the supply of water more resilient to severe drought<sup>4</sup>
- Improve water quality and tackling pollution within the River Lea catchment area;
- Manage and reducing water abstraction
- Increase sewer/drainage capacity within the Lee Valley area
- Improve connections to existing water mains along the A10 and North Circular Road.

### Planned provision

- Potable water deficits in the borough should be effectively managed through the coordination of demand management measures (e.g. smart metering, leakage reduction retrofitting) and supply of new infrastructure (e.g. optimisation of existing groundwater abstractions)<sup>5</sup>
- Deephams wastewater treatment works has recently been upgraded to improve final effluent water quality, increase treatment capacity and reduce odour emissions. However, there will be a requirement to increase process capacity as it is expected to exceed 85% of the discharge permit condition between 2025 and 2034. Improvements to water supply infrastructure will be required to manage the expected flows (Thames Water will need to undertake further modelling of the development scenarios to determine the full extent of this shortfall).

<sup>4</sup> The North London Artificial Recharge Scheme uses a chalk aquifer beneath Enfield, Haringey and the Lee Valley to top up treated water when rainfall is plentiful as well as provide a back-up resource to boost supplies during droughts)

<sup>5</sup> Source: Water resource management plans (TWUL and AWL)

- Sewer capacity investment will also be required to accommodate development options to the wastewater network (Beckon and Deepham treatment plants) and potential abstraction opportunities from rivers and canals should be explored to deal with heating and cooling demands, particularly within the Lee Valley area.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
<b>Waste water and sewage</b>							
Deephams Sewage Works Edmonton	<ul style="list-style-type: none"> <li>• Effluent quality improvements and redevelopment of existing works to provide enhanced treatment infrastructure</li> <li>• Convert sewage into clean drinking water for use during times of projected or actual drought.</li> </ul>	<p>Short to medium term (up to 2030)</p> <p>Long term (2035 onwards)</p>	Thames Water	• £160 million	<ul style="list-style-type: none"> <li>• Private investors</li> </ul>	Critical	
New foul pumping station	Wastewater treatment services to support the Meridian Water development	Short to medium term	<ul style="list-style-type: none"> <li>• LBE</li> <li>• Thames Water</li> </ul>		<ul style="list-style-type: none"> <li>• Thames Water</li> <li>• Developer contributions</li> </ul>	Critical	
<b>Portable water - demand and supply management</b>							
Mains distribution infrastructure	Installation of new distribution boards to serve development sites to the west of King George's Reservoir, William Girling Reservoir & Lee Navigation	Long term (subject to the re-emergence of Crossrail 2)		Thames Water	<ul style="list-style-type: none"> <li>• Thames Water</li> <li>• Developer contributions</li> </ul>	Critical	
Water resource schemes	Beckton reuse scheme & Teddington Direct river abstraction scheme: water will be pumped to the Lee Valley reservoirs	Short to medium term (2020-2030)	<ul style="list-style-type: none"> <li>• Thames Water</li> </ul>		<ul style="list-style-type: none"> <li>• Thames Water</li> </ul>	Critical	
Retrofitting water efficient fixtures & fittings	Smart metering, leakage reduction, water efficiency measures and reward-based incentive schemes (e.g. council owned / social rented properties)	Short to long term	<ul style="list-style-type: none"> <li>• LBE</li> <li>• Social housing providers</li> </ul>		<ul style="list-style-type: none"> <li>• TWUL</li> <li>• AWL</li> <li>• WRMP</li> </ul>	Critical	
River abstraction schemes	Water will be pumped to the Lee Valley reservoirs (Beckton & Teddington)	Short to medium term (2020-2030)	<ul style="list-style-type: none"> <li>• Thames Water</li> </ul>		<ul style="list-style-type: none"> <li>• Thames Water</li> </ul>	Critical	

## 4.6 FLOOD RISK & WATER MANAGEMENT INFRASTRUCTURE

### Where are we at now

The number of properties at risk of flooding is high compared to most other local authorities due to the presence of several watercourses, which drain from the western part of the borough to the River Lee and onto an area of historic marshland in the east. The underlying pattern of geology and the effects of urbanisation mean that Enfield is susceptible to fluvial, surface water and groundwater flooding<sup>6</sup>.

The River Lee Flood Relief Channel is the main flood defence system in the borough. However, the level of protection it provides has been reduced following extensive development and growth that has subsequently taken place in the Upper Lea catchment area.

Enfield LB has recently delivered a range of award-winning retrofit sustainable drainage systems (SuDS) to reduce surface water runoff rates and volumes, promote infiltration and contribute to a reduction in fluvial flood risk from the ordinary watercourses and main river systems. In particular, it investigates opportunities to install retrofit systems in conjunction with the other functions and services which it provides, including:

- regeneration projects, traffic calming and footway schemes: through enhancements to public space and highway verges and changes to raised planted areas (e.g. installation of permeable paving, and introduction of rain gardens);
- refurbishment of large estates; and

<sup>6</sup>In Enfield, the main sources of flooding are from main rivers and surface water. Further risks of flooding include ground water, sewers and artificial bodies of water (e.g. New River and Chingford reservoirs).

- school projects (installation of measures in extensive external spaces and hard standing areas, providing additional educational benefit).

## Risks & challenges

- Future growth will be directed towards areas that contain zones of high flood risk (particularly along the A10 and A406)
- Water pollution (Salmons Brook, Pymmes Brook and Turkey Brook) from misconnected plumbing, sewage overflows and pollutants from roads
- Future proofing and resilience to unexpected events (e.g. storms and floods)

## Key priorities

- Promote flood resistance and resilience measures to properties at risk of flooding where an adequate standard of protection cannot otherwise be achieved
- Maintain and improve existing flood defences, whilst moving towards more sustainable practices across the catchment area (e.g. restored and naturalised river corridors and flood storage areas)
- Reduce / slow down the flow of surface water to the drainage system (e.g. harvesting watercourses)
- Maximise opportunities to reduce the overall level of flood risk through the future regeneration and redevelopment of the Lee Valley area (e.g. Meridian Water)

## Planned provision

- Flood management and sustainable drainage system interventions will be focussed on using nature-based approaches that reduce surface water runoff rates and volumes, promote infiltration and contribute to a reduction in fluvial flood risk from ordinary watercourses in the Lee catchment
- Enfield LB will be implementing a range of natural flood management measures (including woodland planting, buffer zones and retrofit sustainable drainage systems) to restore existing watercourses, floodplains

Project Title	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
Rolling programme of SuDS and nature based solutions	Delivery and construction of identified solutions for flood alleviation such as wetlands, rain gardens and other SuDS measures in the public realm such as parks & open spaces, highways, housing areas and schools.	Ongoing	<ul style="list-style-type: none"> <li>• Thames 21</li> <li>• GLA</li> <li>• Environment Agency</li> <li>• Canal &amp; Rivers Trust</li> <li>• Commercial partners (e.g. Coca-Cola)</li> <li>• Defra</li> <li>• Natural England</li> <li>• Local friends / community groups</li> </ul>	Ongoing with funding from multiple sources	<ul style="list-style-type: none"> <li>• GLA (Greener City Fund)</li> <li>• Environment Agency</li> <li>• Canal &amp; Rivers Trust</li> <li>• Commercial partners (e.g. Coca-Cola)</li> <li>• Defra</li> <li>• Natural England</li> <li>• Thames Water</li> </ul>	Essential	Multiple benefits such as water quality improvement, biodiversity, amenity and health
Flood alleviation measures	Flood alleviation measures and compensatory flood storage scheme	Short to medium term	<ul style="list-style-type: none"> <li>• Thames Water</li> <li>• Developers</li> <li>• LBE</li> </ul>	TBC	<ul style="list-style-type: none"> <li>• Developer contributions</li> <li>• HIF</li> </ul>	Essential	Flood development in Meridian Water to be in place ahead of development
Salmons Brook Natural Flood Management Project	Implementing natural flood management measures such as creating ponds, wetlands, leaky dams and woodland to reduce flood risk in the Salmons Brook catchment area.	<ul style="list-style-type: none"> <li>Short term (runs to 2022)</li> <li>Long term (depends on feasibility study)</li> </ul>	<ul style="list-style-type: none"> <li>• Defra</li> <li>• Environment Agency</li> <li>• Thames Water</li> </ul>	£343k	<ul style="list-style-type: none"> <li>• Thames Regional Flood and Coastal Committee</li> <li>• Environment Agency</li> </ul>	Essential	Additional external funding will be sought to expand the scope of the project.
Albany Park River Restoration & Flood Alleviation Scheme	<ul style="list-style-type: none"> <li>• Restoration of up to 350 metres of the Turkey Brook and a new flood storage area that will reduce flood risk to over 200 properties, creating new wetlands and meadow habitats.</li> <li>• Improvements to footpaths and</li> </ul>	Short term	<ul style="list-style-type: none"> <li>• Thames 21</li> <li>• LBE</li> <li>• GLA</li> </ul>	TBC	<ul style="list-style-type: none"> <li>• Mayor of London's Greener City Fund (£346k)</li> <li>• LBE (£250k)</li> <li>• Other contributions (e.g. Environment Agency)</li> </ul>	Essential	

	cycleways, woodland restoration, new entry points into the park and a community and social hub						
River Restoration and de-culverting projects	<ul style="list-style-type: none"> <li>Renaturalisation of Salmons Brook headwaters to incorporating river restoration</li> <li>De-culverting projects as they arise as part of other development measures</li> </ul>	Medium term	<ul style="list-style-type: none"> <li>Environment Agency</li> <li>Developer contributions</li> </ul>	TBC	<ul style="list-style-type: none"> <li>Environment Agency to explore feasibility</li> <li>Developer contributions</li> </ul>	Essential	
Restoring Enfield's Rivers	A series of measures linked to SuDS and the Enfield Chase restoration, including delivery of further natural flood management projects and community involvement in maintenance of wetlands, woodlands and other water-based spaces	Short term	<ul style="list-style-type: none"> <li>Thames 21</li> <li>Defra</li> <li>Environment Agency</li> <li>National Lottery Heritage Fund</li> <li>Natural England</li> </ul>	TBC	<ul style="list-style-type: none"> <li>Environment Agency to explore feasibility</li> </ul>	Essential	
Lee 2100	Integrated & sustainable programme of capital works in the lower Lee section of the river catchment to implement a series of flood risk management schemes to properties at risk of flooding	Short to long term	<ul style="list-style-type: none"> <li>Thames Water</li> <li>Environment Agency</li> <li>London Councils</li> <li>Lee Catchment Partnership</li> <li>Thames 21</li> </ul>	Unknown	<ul style="list-style-type: none"> <li>Various</li> </ul>	Essential	
New wetlands	<ul style="list-style-type: none"> <li>12 additional constructed wetlands to increase capacity and reduce surface water flows</li> <li>Several locations within the lower reaches of the Salmons Brook, Pymmes Brook and Turkey Brook</li> </ul>	Medium to long term (by 2030)	<ul style="list-style-type: none"> <li>Thames 21</li> <li>GLA</li> <li>Environment Agency</li> <li>Natural England</li> </ul>	TBC	<ul style="list-style-type: none"> <li>To be determined</li> </ul>	Essential	

## 4.7 DIGITAL

### Where are we at now

Enfield has some of the fastest broadband (high-speed internet) connections in the UK, with an average download speed of 22.6mbps<sup>7</sup>. Coverage is 96.9%, which is 0.5% higher than the UK coverage average. Openreach and VirginMedia are the two dominant suppliers of broadband infrastructure within the borough.

The overall picture is, however, more mixed: broadband speeds are generally faster in more urban locations, such as town centres and residential areas, but lower in more remote locations (e.g. Green Belt and parts of the Lee Valley area).

Cellular coverage in the borough tends to be associated with transport routes and densely populated areas of the borough. Data from Ofcom shows that cellular voice reception and enhanced data coverage is likely to be reliable across the whole of the borough on all four main service providers Vodafone, O2, EE and Three. Results from user tests show that EE has the most coverage of LTE (long-term evolution) mobile technology within the borough and is the only supplier that can provide 5G connections. Across all four main providers, cellular coverage is much weaker and less reliable in the north west of the borough, particularly around Enfield Chase and Crews Hill.

### Risks & challenges

- The physical distribution of digital networks needs to be integrated and managed in a way that supports and enables connectivity and data sharing. This puts some areas of the borough at a comparative disadvantage and in this respect, less attractive for development.

<sup>7</sup> Which broadband data, 2018].

- 5G deployment will require significant investment from mobile network operators and other stakeholders, which still presents commercial risks and uncertainties as applications and business cases develop.

## Key priorities

- Increase the speed, reliability and coverage of high-speed broadband
- Reduce installation costs (e.g. availability of innovative technology)
- Promote the use of public realm and street furniture to accommodate digital infrastructure.
- Ensure new equipment (e.g. telecommunication masts) does not have a detrimental impact upon safety, public health and the amenity of surrounding areas
- Maintain the reliability of cellular voice reception and data coverage across the whole borough, especially within remote locations (e.g. Enfield Chase)
- Reduce the digital divide so that residents and business can benefit from the latest digital technologies and supporting services and have the right skills in place to seize on future opportunities and drive local enterprise.

## Planned provision

- Digital and media industries will be encouraged to cluster together to encourage collaboration, cross fertilisation and specialist niches (including anchor tenants). Co-working space and incubator units will be provided in suitable locations to develop business start-ups (e.g. Innova Park, Meridian Water and Enfield Town)
- Support the roll-out of next generation mobile technology (e.g. 5G) and full-fibre broadband connections, especially within new developments (through, for example, fibre optic cables, rooftops and mobile small cells);
- Enfield LB will achieve higher digital connectivity standards than the building regulations to ensure that sufficient ducting space is provided to connect new developments and meet future telecommunication requirements.
- Enfield LB has a long term aspiration to develop a high-tech cluster of manufacturing and hard-tech firms associated with sub-sectors (e.g. telecommunications and creative media) in collaboration with universities and further education providers.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
5G super-fast broadband roll-out programme	<ul style="list-style-type: none"> <li>• Roll-out of fibre-optic 5G broadband (including installation of transmitters and powered base stations across existing 4G sites and new masts)</li> <li>• 1Gbps capable connection</li> </ul>	• Short to medium term (2020-2027)	<ul style="list-style-type: none"> <li>• 5G Nation: the UK 5G Ecosystem</li> <li>• Mobile network providers (Openreach &amp; Virgin Media)</li> </ul>	UK: £5 billion	<ul style="list-style-type: none"> <li>• BT</li> <li>• Local London (fibre-optic broadband)</li> </ul>	Critical	
Enfield Digital Programme	<ul style="list-style-type: none"> <li>• New ICT infrastructure &amp; cost-saving measures</li> <li>• Improve customer experiences (early engagement and multiple languages)</li> </ul>	• Short term	<ul style="list-style-type: none"> <li>• LBE - Enterprise Enfield</li> <li>• London Councils</li> </ul>	• £17 million	<ul style="list-style-type: none"> <li>• Local London grant award</li> </ul>	Desirable	<p>Council Plan: 2020-2022 aims to ensure that new homes and places are digitally connected</p>

# 5 BLUE & GREEN INFRASTRUCTURE

## 5.1 INTRODUCTION

This section on blue and green infrastructure covers:

- green space (parks & gardens)
- trees and woodlands
- green links and corridors
- biodiversity & urban greening
- public realm
- burial spaces

- water spaces.

Please note that flood risk and water management infrastructure is addressed in separate sections.

## 5.2 STRATEGIC CONTEXT

Enfield is recognised as one of the greenest places to live and work and visit in London. Over half of its land area is classed as 'blue' (e.g. reservoirs, lakes and waterways) and green e.g. parks, open spaces, playing pitches and street trees).

40% of the borough is Green Belt and Metropolitan Open Land, which includes large country parks in open countryside and a range of natural and semi-natural green spaces. The Lee Valley Regional Park (London's largest open space) runs along the eastern edge of the borough, providing a 'green wedge' separating more urban areas.

Enfield's waterways include Pymmes Brook, Salmons Brook, Turkey Brook and their tributaries, which flow onto the River Lee along its eastern edge. The borough also contains a large section of the New River, which runs from Hertfordshire to North London, and is home to the Chingford Reservoirs.

## 5.3 PUBLICLY ACCESSIBLE GREEN SPACES (PARKS AND GARDENS)

### Where are we at now

Enfield has a wealth of parks and open spaces ranging from large country estates (e.g. Trent Park) and major regional parks (e.g. Lee Valley Regional Park) through to small pocket parks and incidental open space (road verges and green amenity space). These spaces attract around 13 million visits per year and house a range of assets such as landscaped gardens, meadows, wetlands and historic monuments and buildings.

### Risks & challenges

- Significant disparities exist between the west and east of the borough in terms of the quality, quantity and accessibility of parks and open spaces (e.g. Edmonton and Ponders End suffer from poor access to public-owned parks and lacks natural or semi-natural greenspace)
- Uneven distribution of children's play provision and public parks
- Limited opportunities to incorporate major new areas of accessible open space within densely built-up areas
- Long term maintenance and management of open spaces (in the face of budgetary constraints)

### Key priorities

- Protect and enhance the open character of existing parks and open spaces (e.g. allotments)
- Maximise the accessibility, visibility and amenity value of Enfield's green spaces, linking major attractions (e.g. Town Park, Trent Park and Whitewebbs Park) and town centres;
- Improve the quality of existing open spaces to provide different types of use and activities;
- Promote innovative and creative approaches to delivering publicly accessible open space (e.g. roof-top gardens and greenhouses) and tourism;
- Raise awareness of open spaces and recreational opportunities through promotion and directional signage
- Improve the standard of active management and maintenance, including the safety and security of open spaces (e.g. festival/events).

### Planned provision

- Future greenspace interventions (including consolidated areas of open space, pocket parks, play areas and linear verges) will be directed towards areas of deficiency and opportunity areas (as defined in the Enfield Blue and Green Strategy) to meet existing and future needs in line with the latest standards, which provide good connections to the wider blue-green infrastructure network
- Where appropriate, avoidance and mitigation measures will be implemented (SANG provision) to offset the impacts of development on the Epping Forest Special Area of Conservation from recreational pressure

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
<b>Meridian Water public spaces</b>	14,000 square metres of new public open space, including: <ul style="list-style-type: none"><li>• Brooks Park</li><li>• Edmonton Marshes</li><li>• Green Loop</li></ul> 3,800 square metres of children's play space	• Medium to long term	• GLA <ul style="list-style-type: none"><li>• TfL</li><li>• Developers</li><li>• LBE</li></ul>	TBC	• Developer contributions	Critical	
<b>Colosseum Retail Park</b>	Mixture of new open spaces (e.g. pocket parks and landscaped areas) as part of a mixed-use schemes	TBC	• Developer (NEAT) <ul style="list-style-type: none"><li>• LBE</li></ul>	TBC	• LBE <ul style="list-style-type: none"><li>• In-kind developer contributions</li></ul>	Critical	
<b>Moore Brook Green Walking Link</b>	Creation of a series of rain gardens along the route of the Moor Brook and wetlands (including landscape and access improvements)	Short term (2020/2021)	• LBE	TBC	• LBE	Important	
<b>Enfield Town - Healthy streets</b>	Open space improvements to Little Park Gardens and Town Park	Short term	• GLA <ul style="list-style-type: none"><li>• TfL</li><li>• LBE</li></ul>	TBC	• Liveable Neighbourhoods	important	
<b>Grovelands Park, Broomfield Park and Trent Park</b>	Grovelands Park and Broomfield Park: Projects have been identified in the management plans and costed. Options presented.  Further financial appraisal/feasibility will be required at Trent Park	2031 and beyond	• Historic England <ul style="list-style-type: none"><li>• Gardens Trust</li><li>• Private owners (Groveland, Forty Hall and Trent Park).</li></ul>	Broomfield Park - up to £5million	• National Heritage Lottery Fund, <ul style="list-style-type: none"><li>• Heritage of London Trust</li><li>• Historic England,</li><li>• Natural England</li><li>• Developer Contributions</li></ul>	Important	Trent Park & Grovelands Park are long term aspirations (land currently in dual ownership)
<b>Replacement of the Lee Valley line level crossings</b>	Replacement of the Lee Valley line level crossings (as part of enhancements to West Anglia mainline) to provide off-grade bridges and subways associated with the closure of level-crossings	Short to medium term (development phases 1-8)	• LBE	TBC	• LBE will be required to fund any consequential restructuring needed to the road network <ul style="list-style-type: none"><li>• Funding gap identified</li></ul>	Critical	
<b>North-south strategic</b>	North-south strategic connection through Lea Valley to the River Thames Fatwalk	Short to medium term	• LBE <ul style="list-style-type: none"><li>• Lea Valley Regional Park Authority</li></ul>	TBC	• TBC	Important	
<b>Enhanced green links</b>	Enhanced green links and connections at Banbury reservoir to South Chingford and Hingham Hill	Short to medium term	• Thames Water <ul style="list-style-type: none"><li>• London Borough of Waltham Forest</li><li>• Lea Valley Regional Park Authority</li><li>• LBE</li></ul>	TBC	• TBC	Important	Ensuring safe public access whilst maintaining the structural integrity and function of the asset
<b>Meridian Water towpath</b>	A new section of the towpath along the Lee Navigation (as part of the wider flood mitigation strategy), ecological enhancements to improve biodiversity and the remodelling of hazardous section of the towpath.	Short to medium term (development phases 2-7)	• LBE <ul style="list-style-type: none"><li>• Canal &amp; River Trust</li><li>• Lee Valley Regional Park</li></ul>	TBC	• Developer contributions	Essential	

## 5.3 WATERSPACES - RECREATION & LEISURE

### Where are we at now

Enfield has more expanse of water than anywhere else in London. This includes an extensive network of rivers (e.g. River Lea) and waterways (e.g. Lee Navigation) and a series of reservoirs (King George V, William Girling, Grovelands Park, Trent Park and Cockfosters) and freshwater lakes. This reservoir chain supplies much of London's drinking water which is collected from the River Lea.

Much of this network is, however, hidden from view (due to culverts or diversion into underground sewers) and remains inaccessible to the public.

### Specific risks & challenges

- Shortage of permanent and visitor moorings along the Lee Navigation and Enfield Lock
- Polluted watercourses along Salmons Brook, Pymmes Brook and the River Lea (due to road run-off and sewage discharge). Some of these watercourses remain in culvert.
- Recreational disturbance on sites of ecological importance, including the Chingford Reservoirs SSSI and Lee Valley Special Protection Area (Walthamstow Reservoirs)

### Key priorities

- Protect and enhance the district open character and heritage of the borough's waterways
- Improve connectivity to Lee Valley Regional Park
- Increase the use and enjoyment of the borough's waterway corridors
- Enhance the ecological, biodiversity and aesthetic quality of the borough's waterspaces, taking account of the design and landscaping of adjacent areas
- Explore opportunities to promote continuous public access (e.g. towpaths and riverside walks) and more active water-related uses and improved signage, especially within areas of deficiency (e.g. Ponders End).
- Increase the number and range of boating and mooring facilities to meet future demand and relieve pressure on the Lea Navigation in association with developments (e.g. Meridian Water)
- Make better use of river and canal barges and other forms of water-based transport (e.g. Meridian Water)
- Celebrate and restore Enfield's underutilised waterways (e.g. River Lea and Picketts Lock)

### Planned provision

- Significant investment will be required to encourage a wide range of water-dependent activities and uses along Enfield's nationally important waterways such as sport and leisure facilities, life-saving equipment, barges, moorings, walkways, slipways, bridges and tunnels (e.g. across the River Lea).
- Long-term mooring opportunities as part of major developments (e.g. Meridian Water)

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
Sustainable drainage systems	Wetlands - 18,000sqm Rain gardens - 9,000sqm	Ongoing	• LBE	£7.2 million	• Government grants and other support (e.g. S106)	Essential	
Picketts Lock	New / improved sport and recreation facilities	TBC	• EBC • Lee Valley Regional Park Authority	TBC	TBC	Important	Picketts Lock is identified as a priority site in the Park Development Framework
Banbury reservoir	New boating and water sport facilities to create a leisure destination	TBC	• LBE • Developers • Lee Valley Regional Park Authority	TBC	TBC	Important	Delivery is associated with the Meridian Water development
Salmon's Brook, Pymmes Brook Turkey Brook	An ongoing programme of wetland projects to restore Enfield's urban rivers & re-naturalise the water system across the Lea catchment area.	Medium term	• LBE River & Canal Trust	TBC	• LBE	Important	Salmons Brook, Pymmes Brook & Turkey Brook

## 5.4 TREES & WOODLAND

### Where are we at now

The proportion of woodland and scrubland in the borough is higher than the regional and national average. Enfield is ranked 7th out of 33 boroughs in London in terms of woodland coverage, with some 664 hectares (Source: Forestry Commission). However, less than 3% of this resource is actively managed.

Enfield has over 20,000 street trees and 365 tree preservation orders. Survival rates of newly planted trees are among highest in London.

There are also nationally significant areas of ancient and semi ancient woodland within the Lee Valley Regional Park, Whitewebbs Park and Trent Park.

Work has already begun to plant around 300 hectares of publicly accessible woodland (predominately native species) at Enfield Chase in the north and north west of the borough, which will capture around 3.9 tonnes of carbon dioxide (per hectare) per annum.

### Risks & challenges

- Conversion of woodland and farmland into active management
- Land use and climatic pressures (e.g. hot summers)
- Poor public transport access to the borough's woodland estate from the urban area and relatively few active travel routes.

### Key priorities

- Protect and maintain existing trees and woodland areas, especially veteran trees and ancient woodland
- Establish new woodlands in appropriate locations (from the M25 motorway to Trent Park, Whitewebbs Park and the Lea Valley Regional Park) to create recreational opportunities and wildlife habitats
- Restore appropriate management to previously neglected woodlands
- Remove and replace trees which are declining, hazardous or surplus to requirements
- Increase tree and woodland cover in both urban and rural areas, in line with the Mayor of London 2050 target

### Planned provision

- Expansion of the borough's woodland resource from the M25 motorway to Trent Park and Whitewebbs Park
- Rewilding opportunities through woodland creation from Salmons Brook to Crews Hill
- Street-lined trees and other urban greening interventions (e.g. mini forests) will be sought within major new developments, especially within proximity to key public spaces and buildings

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
Enfield Chase Restoration Project	Restoration of landscape and habitat through woodland creation involving tree planting and natural regeneration alongside the creation of wetlands, access improvements, interpretation and amenity features as well as carbon offsetting	Short to medium term (future phases to be determined.  Initial 60 hectares of woodland created in first 2 years with future phases in planning (target: 300 hectares)	• GLA • Thames 21 • Forestry Commission • Tenant Farmers	£25 million (estimate)	• GLA • Forestry Commission • Council funding (e.g. S106) • Green Recovery Challenge GLA • Thames 21 • Forestry Commission • Environment Agency	Important	The woodland will be income generating, have carbon funding credits, improve the local landscape and increase public access with permissive footpaths and parkland areas  30 hectares of publicly accessible woodland per year on average
Enfield healthy streets	• 500 street trees will be planted each year • Replace lost or damaged trees	Short to medium term	GLA / Mayor London LPA TfL		• GLA / Mayor London • LPA • TfL	Important	

## 5.5 PUBLIC REALM

### Where are we at now

Enfield's town centres and other key gateways (e.g. Southbury) are fragmented in places and inaccessible from the public realm, especially around existing traffic islands/gyratorys). Enfield Town, Edmonton and Southgate are under performing, in part due to the lack of a distinct public realm and clear urban form.

### Specific risks & challenges

- Loss of planning control (e.g. permitted development rights, growing privatisation of open spaces and changes to use classes)
- Development blight and site-specific constraints (e.g. gyratory systems, street clutter and traffic bottlenecks)

### Key priorities

- Achieve design excellence in the public realm across the borough (through the innovative use of street furniture, shopfront design and architectural detailing)
- Create healthier, safer and more vibrant street environments that promote cleaner air, less noise, safer streets and less traffic-related injuries/accidents (e.g. safe crossings and neighbourhood zones)
- Increase street activity and footfall within town centres and widen access to surrounding open spaces
- Reduce the impact of passing traffic and on-street parking (e.g. town centres and existing residential areas)
- Enhance the setting of historic townscape and important views / vistas (including traditional shopping parades)
- Introduce design and public realm measures to promote natural surveillance (e.g. low landscaping) and reduce impact of expected changes in climate, including permeable surfaces, with clear delineation between public and private spaces
- Increase the vibrancy and attractiveness of the borough's town centres and gateway locations, with a more distinct identity and sense of arrival, particularly from rail and bus interchanges
- Optimise available resources to promote strong strategic and local partnership approaches, community engagement, better leisure/cultural activities through suitable funding and delivery mechanisms

### Planned provision

- Public realm improvements (including new squares, civic/performance spaces, junction-upgrades and new public art installations) will be delivered at existing stations, local centres and other gateway locations, especially where pedestrian and cycle activity is focused. This, in turn, will enhance sense of arrival and movement experience through Enfield. This will also improve the image and distinct identity of these areas.
- Major arterial routes (e.g. A10, A406 and A101) and waterways will form an integral element of the public realm network.
- The redevelopment of existing housing estates (e.g. Edmonton Green, Joyce and Snells and Ladderswood Estate) will involve a phased programme of public realm works and associated improvements.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation:	Notes
Meridian Water public realm works	A long term programme of public realm works across the site, including: <ul style="list-style-type: none"><li>• enhanced frontages;</li><li>• a new public square around the new railway station;</li><li>• demolition of buildings along the proposed Central Spine routes;</li><li>• upgrades to existing streets and environmental improvements</li></ul>	• Short, medium and long term (development phases 1-8)	• LBE • Developers / landowners	TBC	• Developer contributions • Other sources (e.g. grants)	Critical	
Enfield town redevelopment	Public realm and gateway improvements to key sites (Market Square, Enfield Town station, Civic Centre, Little Park Gardens, Enfield Town Library). Proposed interventions include: a new public	• Short term	• Network Rail (landlord) • LBE landholdings • Developers	£15-17 million	• £6 million - Transport for London • £1million from capital & £1.5m from capital programme • Other (e.g. S106/CIL)	Critical	

	space (Saddlers Mill Square), enhanced crossings, cycle facilities, junction configurations, footpath widening and carriageway narrowing (Church Street)						
<b>Southgate town centre</b>	A series of coordinated public realm works (including junction and shopfront improvements) to improve the sense of arrival from the station approach and pedestrian connectivity to high street shops and development sites at a key traffic bottleneck (B1452)	• Short and medium term	• TfL • Developers • GLA	TBC	• Developer contributions • TfL	Critical	
<b>Public realm improvements to Edmonton, Ponders End and Palmers Green</b>	Public realm improvements to enhance the vitality and viability of the town centres in Edmonton, Ponders End and Palmers Green	• Short and medium term	• LBE • Developers	TBC	• Developer contributions • Funding bids (alternative sources)	Critical	
<b>Estate regeneration - public realm works</b>	<ul style="list-style-type: none"> <li>• Alma Estate, Ponders End (including the creation of a 'public plaza' along South Street and a tree-lined green boulevard to Lee Valley Park)</li> <li>• Joyce Avenue and Snell's Park</li> <li>• Fore Street (e.g. improved connections to Silver Street station)</li> <li>• Montmorency Park / New Ladderwood</li> <li>• New Avenue, Oakwood</li> </ul>	Short and medium term	<ul style="list-style-type: none"> <li>• LBE</li> <li>• Joyce Avenue &amp; Snell's Park (HTA Design LLP)</li> <li>• Countryside (New Avenue &amp; Alma Estate)</li> <li>• One Housing &amp; Montagu (New Ladderwood)</li> </ul>	TBC	<ul style="list-style-type: none"> <li>• Developer contributions</li> <li>• Future High Streets Fund (e.g. Silver Street)</li> <li>• Sexual health centre - vacation (Silver Point on Forth Street)</li> </ul>	Critical	<ul style="list-style-type: none"> <li>• Alma Estate (phase 2 planning permission)</li> <li>• New Ladderwood (to be completed in 2023)</li> <li>• Joyce Avenue &amp; Snell's Park (feasibility stage)</li> </ul>
<b>Public realm improvements to A406 North Circular Road</b>	Public realm improvements to address severance and air quality issues along the A406 North Circular Road (New Southgate) and free-up development opportunities around the existing industrial estate	• Long term aspiration (2025 onwards)	<ul style="list-style-type: none"> <li>• TfL</li> <li>• Mayor of London</li> <li>• LB Haringey</li> <li>• LB Barnet</li> <li>• Highways England</li> </ul>	TBC	<ul style="list-style-type: none"> <li>• Unfunded (TfL has carried out a feasibility study of the scheme but consultation has not yet taken place).</li> <li>• Potential sources: S106, business rates from uplift in land values &amp; Mayor of London</li> </ul>	Critical	
<b>Urban realm improvements around London Underground stations (Piccadilly line)</b>	Urban realm improvements around listed London Underground stations to improve the sense of arrival from the station approach and pedestrian connectivity to high streets and development sites	Short to medium term (2022/2023)	<ul style="list-style-type: none"> <li>• TfL</li> <li>• Developers</li> <li>• LBE</li> </ul>	TBC	<ul style="list-style-type: none"> <li>• Developer contributions</li> <li>• TfL (landholdings)</li> <li>• Land Release Fund - bid</li> </ul>	Essential	
<b>Public realm improvements - Railway Station</b>	Public realm improvements around existing railway stations (Brimesdown, Enfield Chase, Enfield Lock, Ponders End, Southbury and Turkey Street)	• Medium to long term	<ul style="list-style-type: none"> <li>• Greater Anglia</li> <li>• Network Rail</li> <li>• TfL</li> </ul>	TBC	• Developer contributions	Essential	
<b>Small-scale public realm improvements around existing local and</b>	Small-scale public realm improvements around existing local and neighbourhood centres	• Short and medium term	<ul style="list-style-type: none"> <li>• LBE</li> <li>• Developer</li> <li>• Local community groups</li> </ul>	TBC	<ul style="list-style-type: none"> <li>• Developer contributions</li> <li>• Other sources (e.g. match funding)</li> </ul>	Essential	

<b>neighbourhood centres</b>	<ul style="list-style-type: none"> <li>• Haselbury</li> <li>• Enfield Highway (Hertford Road)</li> <li>• Enfield Wash</li> </ul>						
<b>Public realm improvements - High streets</b>	High impact place making at key sites to enhance the vitality and viability of the high street	• Short and medium term	• LBE • Developers	TBC	<ul style="list-style-type: none"> <li>• Developer contributions</li> <li>• Funding bids (alternative sources)</li> <li>• Good Growth Fund (Fore Street)</li> <li>• Major Streets Programme (TfL)</li> </ul>	Important	Angel Edmonton Ponders End Palmers Green
<b>Redevelopment of Edmonton Green shopping centre</b>	New replacement market, new civic squares, enhanced library, new connections, community gardens, & other open space enhancements (e.g. The Broadway)	Short term: First phase (2023)  Medium to long term (10-15 years)	Developer (Crosstree)	TBC	• Developer contributions	Critical	Subject to planning permission

## 5.6 SPORT & LEISURE (INDOOR & OUTDOOR)

### Where are we at now

Although steadily increasing, levels of physical activity and sport participation in the borough remain below the London and national averages<sup>8</sup>. However, latent demand remains high and presents opportunities to increase participation across the borough.

Sports and leisure activity in the borough consists of:

- 6 sport and leisure centres including bowls facilities, swimming and fitness suites;
- over 150 sports clubs with relevant accreditation;
- a broad range of outdoor sport pitches (hockey: 8 artificial pitches; rugby: 22 pitches; cricket: 34 cricket squares, 282 grass wickets and 8 non-turf wickets; tennis: 7 tennis clubs and 11 public park sites; football: 44 secured community use pitches, education sites and 184 adult and junior pitches), mostly in community use;
- 5 youth clubs providing positive activities;
- physical education programmes within schools and colleges;
- sport events and dance festivals; and
- ancillary sport facilities (Enfield's open spaces have a relatively high proportion of multi-use games areas, outdoor gyms, play areas, tennis courts, running and walking circuits)

Enfield's indoor sports capacity has increased significantly over the past decade as a result of improvements to the quality and accessibility of existing leisure centres and associated facilities. Attendance records have risen in response to increasing demand, but notable gaps remain (specifically in relation to swimming pool capacity and sports halls).

Levels of obesity and excessive weight in the borough are higher than the London average and there are stark inequalities between different groups and neighbourhoods (for instance, children from low income households are more than twice more likely to be obese than those in higher income households).

### Risks & challenges

- Significant shortfall of outdoor rugby and football pitches (especially at the junior level) and associated changing facilities.
- Deficit of indoor sports provision within growth areas (e.g. Meridian Water)
- Ongoing security and maintenance costs
- Lack of capital and revenue funding

<sup>8</sup> Enfield has the ninth highest proportion of adults engaging in less than 30-minutes of physical activity a week in London. The proportion of Enfield adults engaging in the recommended 150-minutes of physical activity a week is 60%.

## Key priorities

- Protect the supply of existing playing pitches and indoor sport facilities from future loss, especially at priority sites (cricket, rugby, hockey and football)
- Secure new or improved sport and leisure facilities in the right locations to meet existing and future demand and address obesity/inactivity levels, in line with the Playing Pitch Strategy
- Meet the needs and requirements of different users, especially hard-to-reach communities
- Increase the quality and capacity of existing playing pitches and ancillary facilities (e.g. floodlighting, car parking and changing rooms)
- Improve access to sport and training facilities (e.g. schools and community halls)
- Revitalise sport and leisure activities at the waterside (e.g. Chingford reservoirs, Picketts Lock and Ponders End)

## Planned provision

- Enfield LB will work with its partners to ensure that sports and leisure facilities are developed and modernised to meet the changing needs of our residents and reflect the new approaches to the delivery of services.
- In line with the objectives of the Playing Pitch Strategy and Blue and Green Strategy, future investment will be directed towards priority hub locations (Firs Farm, Enfield Playing Fields and Hotspur Way) to facilitate active sport and leisure participation and community engagement within areas of deprivation in line with wider social/health outcomes. New sites, including 3G pitches and floodlight surfaces, also need to be identified.
- Underused and poor-quality sites should also be protected from development or replaced as there is a requirement to accommodate more pitches to meet the identified shortfalls.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
Sports and recreation hubs at existing playing fields at Carterhatch and Firs Farm	Priority investment sites - develop sports and recreation hubs at existing playing fields at Carterhatch and Firs Farm, including the provision of new artificial grass pitches (3/4G) and associated facilities	Subject to the impact of the Haringey Parklife project at Bull Lane	• Sport England & other national sports authorities • LBE	TBC	• Developer contributions	Important	
Brimsdown Sports & Social Club	2 new artificial pitches, new changing accommodation and pitch improvements to address identified demand from junior and youth football	Short term	• LBE • Community organisations	TBC	• Section 106 (off site payments)	Desirable	
Enhancements to existing cricket facilities	Cricket square maintenance improvements at Brimsdown Sports & Social Club and Hazelwood Recreation Ground	Short term	• LBE • Community groups	TBC	• Section 106 (off site payments)	Desirable	
Resurface, replace or rebuild existing courts/pitches at various locations	Resurface, replace or rebuild existing courts/pitches at Craig Park, Conway Lawn & Tennis Club, Bush Hill Park, Ark John Keats Academy, Nightingale Academy, Hazelwood Recreation Ground, Highlands School and other locations	Short term	• Education institutions • LBE	TBC	• Section 106 (off site payments)	Desirable	
Floodlights at key locations	Installation of floodlights at key locations to improve accessibility throughout the year and improve sustainability of key park sites (including Hazelwood Academy, Highland School, Conway Lawn &	Short term	• Education institutions	TBC	• Section 106 (off site payments)	Desirable	

	Tennis Club and Craig Park)						
Floodlights at key locations	Installation of floodlights at key locations to improve accessibility throughout the year and improve sustainability of key park sites (including Hazelwood Academy, Highland School, Conway Lawn & Tennis Club and Craig Park)	Short term	• Education institutions	TBC	• Section 106 (off site payments)	Desirable	

## 5.7 BURIAL SPACES

### Where are we at now

Like many other London boroughs, Enfield is facing serious shortage of burial space - a situation which will exacerbate as the population increases and the lack of funeral space drives up costs<sup>9</sup>.

Cemetery space is running out due to land shortages and rising burial demand (Enfield Crematorium, for instance, is close to capacity).

In addition, there are four Jewish cemeteries in the borough: the Western Synagogue Cemetery in Edmonton, the Federation of Synagogues Cemetery in Edmonton, Adath Yisroel Cemetery in Enfield and the Bulls Cross and Western Synagogue Cemetery). Muslim burials mainly take place at the Tottenham Cemetery in Edmonton. Eco-friendly options (e.g. natural and woodland burials) are growing in popularity but there are no such provisions in Enfield.

### Risks & challenges

- Significant shortfall of burial space over the medium to long term (up to 2042)
- Lack of suitable religious-based facilities (especially Muslim burial plots)
- Impact of covid-19 on burial capacity in the short term

### Key priorities

- Provide new burial space in the right locations to meet both current and future demands
- Prioritise the needs and requirements of specific religious groups, preferably close to where they live.
- Explore opportunities to extend or redevelop existing burial grounds (e.g. churchyards and cemeteries) and adjoining virgin land
- Ensure new or extended burial spaces are of a high-quality design and provide a range of wider benefits including amenity and ecological value
- Manage and maintain burial spaces including site improvement works and general upkeep

### Planned provision

- Meeting existing and future burial capacity will require a combination of approaches: intensification and extension of existing sites, the identification of new sites and the re-use of graves under burial law.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
Edmonton Cemetery (Great Cambridge Road)	Expansion of the existing cemetery to include 2137 new burial plots	Short term	LBE	TBC	• £1.1 million (capital programme) • Cemetery charges	Important	Planning permission (17/03256/RE4)
Southgate Cemetery	Expansion of the existing cemetery - mausoleum and vaulted graves	Short term	LBE	TBC	• £1.1 million (capital programme) • Cemetery charges	Important	

<sup>9</sup> <https://new.enfield.gov.uk/services/planning/enfield-burial-needs-assessment-2020-planning.pdf>

New burial space	New burial space sites	Medium to long term	LBE	TBC	TBC	Important	Locations to be determined through the new Local Plan
------------------	------------------------	---------------------	-----	-----	-----	-----------	---

## 5.8 BIODIVERSITY & URBAN GREENING

### Where are we at now

Enfield is home to some important populations of nationally and internationally scarce plant and animal species (e.g. great crested newt and black redstart) and some nationally scarce habitats (e.g. acid grassland). There are 41 sites of nature conservation value across the borough (e.g. King George's and William Girling reservoirs are designated as a Site of Special Scientific Interest for their nationally important populations of wildfowl and wetland birds. Nevertheless, access to nature varies considerably across the borough between affluent wards in the west and deprived wards in the east.

### Risks & challenges

- Poor or unequal access to nature (39% of the borough is deficient in terms of proximity to nature conservation sites<sup>10</sup>)
- Several priority species are under threat of extinction, especially amphibians (e.g. great crested newts) and migratory birds (e.g. bitterns)
- Presence of invasive species, chemicals, pests or diseases, especially along river corridors (e.g. Himalayan Balsam, Giant Hogweed and Japanese Knotweed)
- Water pollution: Poor ecological status of the majority of Enfield's waterways
- Impact of air pollutants on biodiversity and ecosystem services (the whole of the borough is identified as an air quality management area, mainly due to road traffic emissions)
- Absence of greenery (e.g. Edmonton Green and Southgate) and remote industrial areas

### Key priorities

- Improve access to natural and semi-natural green spaces within identified deficient areas (e.g. deprived wards)
- Reduce the spread of invasive species, chemicals, pests and diseases that affect trees, meadows and scrubs across the borough's river corridors through enhanced management
- Explore opportunities to deculvert Enfield's underground rivers (e.g. Salmon Brook and Pymmes Brook) and improve river channels/banks (e.g. reedbeds) to enhance the connectivity and functionality of the ecological network
- Explore wetland creation and re-wilding opportunities to enhance the water quality of Enfield's watercourses, especially where they border or pass through existing open spaces (e.g. sports and recreation grounds)
- Enhance biodiversity within buildings (e.g. bird boxes and living walls) and along neglected and under-used spaces, such as major road verges (e.g. North Circular and A10), railways and watercourses, through tree planting and species-rich meadows, acting as wildlife corridors or spurs to other nature conservation sites
- Support the creation and restoration of priority habitats and species (e.g. water voles, beavers and storks)

### Planned provision

- Urban greening interventions (including SuDS and street-lined boulevards) will be prioritised along road verges, areas of underused land and key gateways leading into town centres and key destinations, in line with the targets set out in the London Plan
- Biodiversity net gain: Projects will be focussed within areas of nature deficiency (e.g. Enfield Chase and Chingford Reservoirs), sites of nature conservation importance, riparian corridors (e.g. New River) and the bug life B-line.
- Multi-user and active routes (including long distance footpaths and national cycle lanes) can also function as wildlife corridors to facilitate the migration of species and habitats, particularly within highly urbanised settings

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
<b>Biodiversity improvements to existing wetland areas</b>	Biodiversity improvements to existing wetland areas (e.g. Ramme Marsh & Swan & Pike Pool) and development sites in the Lea river catchment area	Ongoing	<ul style="list-style-type: none"> <li>Natural England</li> <li>Thames and London Waterways Forum</li> <li>Canal &amp; Rivers Trust</li> <li>Lee Valley Regional Park Authority</li> <li>Inland Waterways Association</li> </ul>	TBC	<ul style="list-style-type: none"> <li>Site-based enhancements</li> <li>Developer contributions (e.g. Meridian Water)</li> <li>LBE</li> </ul>	Essential	<ul style="list-style-type: none"> <li>Creation of new habitat and features such as rain gardens and planters</li> </ul>

<sup>10</sup> Areas of nature deficiency are those areas in London where people have to walk more than 1km to reach a site of importance for nature conservation (SINC) of at least borough importance.

<b>Upgrades or extensions &amp; designation of new sites (sites of importance for nature conservation)<sup>11</sup></b>	<ul style="list-style-type: none"> <li>Jubilee Park</li> <li>Tatem Park</li> <li>Bush Hill Golf Course</li> <li>Crews Hill Golf Course</li> <li>Plumridge, Vault Hill and Little Beechill Woods</li> <li>Forty Hall</li> </ul>		<ul style="list-style-type: none"> <li>LBE</li> <li>Natural England</li> </ul>		<ul style="list-style-type: none"> <li>Site-based enhancements</li> <li>Developer contributions</li> </ul>	Essential	<ul style="list-style-type: none"> <li>Specific interventions to be identified through the development process</li> </ul>
<b>Enfield Chase rewilding programme</b>	500ha of land rewilded, including woodlands, meadow and wetland	By 2030	<ul style="list-style-type: none"> <li>LBE</li> <li>Thames 21</li> <li>GLA</li> <li>Natural England</li> <li>Landowners</li> </ul>	£8 million (est)	<ul style="list-style-type: none"> <li>Government grants (Department for Environment, Food &amp; Rural Affairs)</li> <li>Forestry Commission</li> <li>Mayor of London</li> <li>Council funds</li> </ul>	Essential	<ul style="list-style-type: none"> <li>Based on current programme and draft submission for additional grant funding</li> </ul>

## 6 EDUCATION

### 6.1 INTRODUCTION

This section covers education across:

- early years;
- primary;
- secondary;
- special educational needs and disabilities; and
- further and higher education.

### 6.2 STRATEGIC CONTEXT

There are significant disparities in the borough, including in access to education. Amongst other factors, these inequalities contribute to discrepancies between life expectancy and poverty rankings between east and west of the borough.

Current forecasts are based on future pupil projections from the Greater London Authority (GLA) which show where school place demand within different areas of the borough will exceed the planned provision. Enfield LB's current school places programme is focussed on expanding specialist education and providing new and improved school buildings with modern facilities, such as specialist sensory rooms and life skills teaching accommodation.

### 6.3 FURTHER & HIGHER EDUCATION

#### Where are we now

Further education refers to any study taken after the age of 16 that does not form part of a higher education programme at undergraduate or post graduate level, from basic skills training to vocational qualifications (e.g. apprenticeship and foundational degree). Further education is usually undertaken in a sixth form secondary or college setting.

There are 17 sixth forms across the borough. Two large colleges in the borough (The College of Haringey and North East London, and Barnet and Southgate College) provide further education through a wide range of vocational courses, apprenticeships and A-Level courses. Secondary schools with sixth forms are distributed fairly evenly across the borough.

Higher education refers to degree-level education provision, which is usually undertaken in a university setting. There are no formal universities offering higher education with the borough. However, the College of Haringey and North East London,

<sup>11</sup> These sites have been identified as having the potential to support habitats of higher quality, variety and value than previously identified and/or are of sufficient size to provide valuable opportunities for wildlife in an urban setting and to contribute to the strategic ecological corridors in the borough (Review of Sites of Importance for Nature Conservation, 2021).

and Barnet and Southgate College both offer higher education qualifications (NVQ level 4+) including higher diplomas, foundation degrees and teacher training courses. These colleges have campuses in Enfield Town, Southgate and Edmonton.

The College of Haringey, Enfield and North East London attracts over 12,000 students of all ages from London boroughs, the majority of whom are from deprived communities.

There is a growing number of young people (post-16) who are continuing to study at higher education facilities in Enfield. However, there are no plans to expand or redevelop existing higher education facilities in the borough and the evidence suggests that sufficient capacity exists to absorb the influx of new pupils in the short and medium term.

### Risks & challenges

- Across London, demand is projected to rise as large cohorts of children move from secondary education into further education. Meeting this growing demand will require strategic planning and working across boroughs.

### Key priorities

- Increase participation rates, especially among under-represented groups
- Consolidate and improve the quality of existing services and facilities (e.g. College of Haringey, Enfield and North East London)
- Meet and respond to changing student demands and behaviours (New higher education facilities will need to meet the needs of the next generation of students and the requirements of smart and collaborative learning, such as digital technologies)
- Increase the performance and number of sixth forms and colleges
- Increase access to higher education opportunities, particularly in areas of acute socio-economic deprivation

### Planned provision

- Further education in the borough will be primarily be provided through the expansion of sixth form colleges, academies and secondary schools to meet forecast demand over the plan period.
- Enfield LB will support upgrades to existing higher education facilities (including energy efficiency and technology advancements) and new built projects to improve the learning environment and increase the intake of new pupils to meet identified demands.
- In the longer term, the aspiration is to develop higher education facilities at the cutting edge of research and learning, aligned with the borough's sectoral strengths (e.g. digital media, logistics, food and drink and renewable energy).

## 6.4 SPECIAL EDUCATIONAL NEEDS & DISABILITIES

### Where are we now

Special education and disabilities provision (SEND) is required where children are unable to be supported in mainstream schools with universal services. Children with SEND may attend specialist schools or mainstream schools with additionally resourced provision, which provide support to those pupils with specific needs, such as autism, sensory impairment, complex needs and speech and language (this is known as additional resourced provision)

In total, 7 special schools and 12 mainstream schools with additionally resourced provision provide SEND education in the borough. These facilities are distributed evenly across the borough

School expansions have recently been completed at West Lea Special School (St Johns Hall and Swan Centre) and Durants Special School to accommodate pupils with complex and specialist needs.

Despite the new and ongoing developments, current efforts are not considered sufficient to meet the rising demand in relation to SEND school places over the short, medium and long term

### Risks & challenges

- Out of borough placements - risk of separation, disruption and higher costs
- Pressure on existing capacity due to rising levels of need

### Key priorities

- Ensure that as many young people with SEND as possible can meet their educational needs at their local school
- Increase the amount of additionally resourced provision within mainstream schools
- Increase rates of attendance; reduce absences and exclusions

- Facilitate the transition from SEND schools to further and higher education and paid employment
- Improve access to education, training and employment pathways including work experience and supported internship opportunities
- Create an inclusive, safe and secure learning environment in which SEND pupils can thrive, prosper and grow.

### Planned provision

- SEND provision will be addressed through mainstream schools With universal or targeted services and the building of new specialist schools where demand exists over the course of the plan period.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
<b>Redevelopment of the former Minchenden school site</b>	Redevelopment of the former Minchenden school site to provide key stage 4 & 5 education for 126 pupils with autism a	Short term (2020/2021)	• LBE • Department for Education	• £11 million	• Capital programme	Essential	
<b>Fern House Special School</b>	• Increase the availability of SEMH special school places to 60 (additional 12 places). • Facilities will include all-weather five-a-side football pitch	Short term	• LBE • Department for Education		• Capital programme	Essential	The facilities will be open to community groups outside of school hours.
<b>Salmon's Book Special Free School</b>	Construction of a SEMH special school to create 70 new places (children aged 11-18)	Short term (2022/2023)	The new school will be based on the vacant Bell Lane site.		• Capital programme	Essential	Planning permission has been granted

## 6.5 EARLY LEARNING

### Where we are now

Early year facilities provide education provision to children of pre-school age (0-4), although attendance is not a mandatory requirement. Early learning education/childcare across the borough is mostly provided through privately-run pre-schools and nursery groups, as well as a mix of nursery classes at local schools and children's centres. Most children's centres are located in the east and south of the borough, with none are located in Southgate or Enfield town centres. Private nurseries are distributed evenly across the borough.

### Specific risks & challenges

- Future school provision will increasingly require innovative approaches to the use of land and floor space (e.g. multiple levels and co-located services).
- Future school roll projections will need to take account of the emerging growth targets set out in the new Local Plan to ensure accurate forecasts of future supply and demand.

### Key priorities

- Provide sufficient childcare and early education places to meet rising demand (including specialist provision) over the period to 2039;
- Support the development of children and family learning
- Co-location / integration of early years and primary school facilities and associated ancillary facilities (e.g. offices)
- Secure the provision and take-up of early education (0-4 years) in high quality settings;
- Direct early education facilities to areas of deficiency to help close the gap between the outcomes of disadvantaged learners and their peers.

### Planned provision

The provision of early year facilities will contribute towards reducing Enfield's below-average levels of achieving good cognitive development at age 5 and enable greater employment rates amongst parents in line with our statutory duty to

provide childcare to some 2-year-olds and all 3-and-4-year-olds). All primary schools are now expected to include nursery provision.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
<b>Joyce &amp; Snell's Park</b>	Relocation of the existing nursery (Florence Haye) to nearby site (as part of	Short term	• LBE • Early years providers	TBC	• Department of Education • LBE	Essential	Estate regeneration programme)
<b>Primary schools</b>	Early education infrastructure (e.g. nurseries) within new or expanded primary schools	Ongoing	• LBE • Early years providers • Department of Education	TBC	• Department of Education • LBE	Essential	
<b>Florence Haye</b>	Relocation of nursery to nearby site	Short term	• Department of Education • LBE • Early years providers	TBC	• Department of Education • LBE	Essential	
<b>Meridian Water</b>	Nursery places in the development will be provided through a mix of day care centres, children's centres, and community nurseries	Short-long term	• Department of Education • Private enterprises • LBE	TBC	• Department of Education • LBE	Essential	

## 6.6 PRIMARY

### Where we are now

Enfield currently has a surplus of primary school places (5-11 year olds) but a shortage is expected within the next ten years as a result of new housing developments and population growth.

There are marked differences in terms of primary school capacity between different parts of the borough (for instance, schools within Bush Hill Park, Chase Side, Enfield Town and Edmonton currently have an oversupply of primary school places, whereas the west and south west of the borough is coming under pressure to accommodate pupils due to rising birth rates).

### Risks & mitigation

- Future school provision will increasingly require innovative approaches to the use of land and floor space (e.g. multiple levels and co-located services).
- Future school roll projections will need to take account of the emerging growth targets set out in the new Local Plan to ensure accurate forecasts of future supply and demand.

### Key priorities

- Make sure sufficient school places are available to meet rising and falling demand over the short, medium and long term
- Improve attainment levels, especially at key stage 2 (Enfield's performance is steadily improving but remains below the national average)
- Exploit opportunities to reuse/redevelop existing sites and redundant land (taking account of the impact of expansion on the capacity of existing infrastructure and services)
- Improve social mobility in the transition from primary to secondary education (especially within those areas which suffer from high levels of low pay and poor connectivity)
- Secure adequate provision within mainstream schools and existing special schools to meet the needs of SEND pupils, in response to rising demand.

### Planned provision

Enfield LB will deliver a long term programme of investment to provide a combination of new primary schools and enhanced learning provision in existing schools within areas of planned growth to support the needs of the borough's growing population, in the face of increasing diversity, social mobility and parental choice.

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
2 new primary schools (2 forms of entry)	2 new primary schools (2 forms of entry) at Meridian Water	Short to medium term (phases 2-8)	• LBE • Department for Education	TBC	• LBE • Department for Education	Essential	
One Degree Academy	New primary school at Chase Farm Hospital (630 primary places and 90 nursery places)	Short term	• Department for Education	TBC	• LBE • Department for Education	Essential	
Limes Academy	New 3FE primary school in north Enfield	Short term	• ESFA • Department for Education	TBC	• LBE • Department for Education	Essential	
Redevelopment of the former Minchenden school site	Redevelopment of the former Minchenden school site to provide key stage 4 & 5 education for 126 pupils with autism	Short term (2020/2021)	• LBE • Department for Education	• £11 million	• LBE • Department for Education	Essential	
Enfield primary expansion programme	7 existing primary school sites will be redeveloped to accommodate 9FE	Short term	• LBE • Department for Education	• £20 million	• LBE • Department for Education	Essential	

## 6.7 SECONDARY SCHOOLS

### Where we are at now

Secondary schools within the borough currently provide a small surplus of places, with capacity to accommodate 11-to-18 years old pupils in the short to medium term. However, there is a large and growing primary school population in the borough<sup>12</sup>. As successfully larger cohorts of primary age children enter into secondary education, there will be inevitable pressure on existing secondary provision, notably in the west of the borough (e.g. xx and xxx) and Enfield town centre, where existing spaces are very limited.

### Risks & mitigation

- Future school roll projections will need to take account of the emerging growth targets set out in the emerging Local Plan to ensure accurate forecasts of future supply and demand.
- Land acquisitions will increasingly be required to accommodate secondary school expansions as the amount of available space is diminishing. Enfield's schools only have limited capacity to accommodate expansions or refurbishments to meet increased demand. Creative design solutions, such as raised play desks and flexible learning space, will also be required in dense built-up-areas.

### Key priorities

- Provide sufficient secondary school places in the right locations at the right time to meet the growing population of school age children<sup>13</sup>
- Maximise the value and efficiency of secondary school sites (e.g. co-location / re-location opportunities and shared facilities)
- Maximise the accessibility and capacity of existing secondary schools and associated spaces to accommodate new pupils;
- Improve the quality of the teaching and learning environment
- Provide greater choice and specialist opportunities to meet the diverse needs of the school age children (e.g. academies and free schools)

### Planned provision

- Develop a new schools programme including new classrooms and expansions of existing schools through the safeguarding and allocation of land to meet the changing patterns of demand over the short, medium and long term (taking account of future leakage to private/home schooling).

<sup>12</sup> Enfield's Baseline Infrastructure Assessment (AECOM, 2020)

<sup>13</sup> School place demand projections (GLA)

Project name	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
<b>Wren Academy</b>	• 6FE secondary school and sixth form at Chase Farm Hospital site	• Short term (Opening date to be confirmed)	• LBE • Department for Education	TBC	• LBE • Department for Education	Essential	1200 students: 920 pupils in years 7-11 and 360 pupils in sixth form
<b>ARK John Keats Academy</b>	• Social, emotional & mental health special school (off Bell Lane)	• Short term.	• ESFA • DfE	TBC	• Department for Education	Essential	Up to 70 school places plus a sixth form (11-19)
<b>Meridian Water</b>	• 8FE secondary school (including sixth form)	• Short to medium term (phases 2-8)	• Department for Education • LBE	£35.6m shell and core £23.7m fit out	• LBE • Department for Education	Essential	
<b>Wren Academy</b>	• 6FE secondary school & sixth form at Chase Farm Hospital	• Short term (Opening date to be confirmed)	• LBE • Department for Education	TBC	• LBE • Department for Education	Essential	1200 students: 920 pupils in years 7-11 & 360 pupils in sixth form

## 7 HEALTH CASE AND EMERGENCY SERVICES

### 7.1 INTRODUCTION

This section covers:

- primary healthcare GPs, dentists and pharmacies);
- secondary healthcare (hospitals etc); and
- emergency services (police, fire and ambulance).

Demand on healthcare and emergency services in the borough is rising due to a range of factors, including a growing and ageing population, an increase in long-term health conditions and changes in patient preferences.

Health levels in Enfield are generally worse than the national average. Deprivation is particularly concentrated in the east and south of the borough where there is a stark difference in life expectancy and health status compared to the west of the borough.

Enfield LB will continue to work in partnership with health providers and voluntary organisations to enable the effective delivery of emergency service and primary care services across the borough.

### 7.2 HEALTHCARE INFRASTRUCTURE (PRIMARY AND SECONDARY)

#### Where we are now

In Enfield, different organisations and bodies oversee the provision and management of health care (primary and secondary provision) facilities, as described below.

Type	Numbers	Responsibility	Location	Current provision
Dentists	1 dentist per 1,607 persons	NHS England & private businesses	Most surgeries are located in the southern portion of the borough, with a concentration around Southgate.	Strong (The number of dentists are well below the HUDU's recommended maximum of 1 dentist per 2,000 patients)
GPS	1,979 patients per full time equivalent GP	NHS England & private businesses	All locations	Some facilities have significant spare capacity (e.g. Enfield Town and Cockfosters). However, the majority of GPs are heavily oversubscribed against recommended maximum of 1,800 patients per full time equivalent GP, particularly towards the east and south of the borough (e.g. Edmonton Leeside).
Mental health	29 in total	Barnet, Enfield and Haringey Mental Health NHS Trust but some mental	Mental health facilities are distributed across mostly the southern portion of the borough. Clusters of facilities exist around	There are no mental health facilities located in the north east or north west corners of the borough.

		health services are independently run.	Enfield Town, Edmonton and Southgate	
Hospitals - providing acute and community healthcare services.	5 in total	NHS trusts (Royal Free London NHS Foundation Trust and North Middlesex University Hospital NHS Trust) and independent / private healthcare organisations.	Hospital facilities are concentrated around Enfield town centre (e.g. Chase Farm and private facilities)  North Middlesex University Hospital (the only hospital in the borough with an accident and emergency department) is located on the southern border of the borough near to Edmonton.	Upgrades to North Middlesex University Hospital and investments across the Barnet, Enfield and Haringey Mental Health NHS Trust are set to bring benefits to the borough's population.
Older persons care facilities	76 residential care homes and 58 sheltered housing/retirement home facilities	Private sector, housing associations and Enfield London Borough Council	Older persons care facilities are distributed evenly across the borough, with some clusters existing nearby to Southgate.	The majority of facilities are adequate but some residential care facilities require improvement or in some cases significant interventions

## Risks and challenges

- Uneven distribution of GP practices
- Shortage of mental health facilities in the north east of the borough, which has a relatively large residential population
- Severe shortfall of nursing beds across London (numbers continue to fall year-on-year in care homes, in the face of increasing demand e.g. covid-19 pandemic. The principal barrier to the delivery of more nursing beds is the cost and availability of land)

## Key priorities

- Early prevention and intervention to improve health and well-being outcomes across the whole population, particularly in the most deprived areas
- Direct new primary health facilities to existing areas of deficiency and emerging growth areas to meet current and future needs
- Improve the overall quality, accessibility and capacity of Enfield's health and social care facilities to meet growing needs
- Promote co-location opportunities to promote linked trips in tandem with other primary care services (e.g. pharmacies and care centres) and community facilities
- Making best use of existing assets to achieve efficiencies/economies of scale to address supply gaps and constraints

## Planned provision

- New primary healthcare facilities will be required to ensure that all residents have access to good quality, local healthcare service, especially within areas of planned growth.
- Strategic and major new developments in the borough will be expected to contribute to primary health infrastructure where required.
- Consolidation and expansion of existing estates and the reuse of void space and surplus buildings will be sought at existing sites (e.g. North Middlesex Hospital and Chase Farm Hospital) through redevelopment to existing address supply gaps.

Project title	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
GP surgeries	• 1 or more new GP surgeries to serve the new community at Meridian Water	• Medium term - from 2027 onwards (due to influx of new residents from phase 1 and 2)	• GP-based • NHS	TBC	• Developer contributions	Essential	
North Middlesex Hospital, Edmonton	• Expansion and redevelopment of the hospital campus site (including the relocation of existing testing facilities, car parking and offices to facilitate the delivery of enhanced health care services and over 200	• Short term (construction of the new homes will begin before March 2022)	• Department of Education • Enfield Health & Well Being Board • Barnet, Enfield and Haringey NHS Trust	£12.8 million	• Mayor of London Land Fund	Essential	

	affordable homes. <ul style="list-style-type: none"><li>Expansion and redevelopment of accident and emergency services, neonatal and maternity services at North Middlesex Hospital and Barnet Hospital (including the development and expansion of midwife-led birthing units)</li></ul>		• Royal Free London NHS Trust				
<b>Primary health care facilities</b>	Primary health care facilities (as part of site allocations identified through the Local Plan)	• The timing of infrastructure will depend on the availability of funding and the delivery of new homes and other uses.	• GP-based • NHS	Not applicable	• In-kind contributions	Essential	Site locations to be determined through the Local Plan process
<b>Care Village</b>	200/300 new homes of mixed tenure, based on three models: retirement, extra care housing and nursing with a central community hub - cafes, activity rooms, hairdressers, pre-school classes, therapy rooms	Short term (with intention to run in tandem): <ul style="list-style-type: none"><li>Phase 1 - north of the borough</li><li>Phase 2 - Meridian Water</li><li>Phase 3 &amp; 4 (To be determined)</li></ul>	• LBE	TBC	• Council-owned site	Essential	
<b>Mental Health and Wellbeing Centre</b>	Re-provisioned community hub service (location to be determined)	• Short term	• LBE • CCG & the voluntary sector	£1.98 million	• Grant funding (Better Care Fund)	Essential	Capital programme

## 7.3 EMERGENCY SERVICES

### Where we are now

In Enfield, different organisations and bodies oversee the provision and management of the different targeted emergency services, as described below.

Type	Responsibility	Number of facilities	Location	Future capacity provision	Comments
<b>Ambulance services</b>	London Ambulance Service NHS Trust	3 ambulance stations	Edmonton, Ponders End and Chase Farm Hospital.	Unknown	Current facilities are outdated and would benefit from modernisation or replacement
<b>Firefighting and rescue services</b>	London Fire Brigade	3 fire stations	Enfield Town, Edmonton, and Southgate	Existing stations are well located to serve the needs of the borough and its planned growth.	For any fire or emergency that requires a larger fire brigade attendance than is available within Enfield, fire service provision can be drawn upon from surrounding boroughs.
<b>Police services</b>	Metropolitan Police	2 police response units	Enfield Town and Edmonton	Unknown	Smaller facilities have been closed due to pressure to combine and centralise police services, providing fewer localised services

### Risk & challenges

- Increasing pressures on emergency services (e.g. technological advancements and changing patterns of demand due to coronavirus and other factors e.g. winter flu)
- Shortage of public funding (As a result of austerity measures and public spending cuts, emergency services infrastructure in the borough has been streamlined, meaning that many smaller emergency facilities (e.g. police stations) have been closed and emergency services are now provided from more concentrated larger facilities within the borough's town and district centres).

### Key priorities

- Improve efficiency and resilience, particularly in relation to major incidents
- Removal of physical barriers (e.g. level crossings)

- Modernise and upgrade existing facilities
- Colocation of services (e.g. ambulance facilities with polyclinics)
- Integrate ‘designing-out crime / secure by design’ principles across large development sites (e.g. Meridian Water) as part of an integrated strategic approach to crime prevention including public spaces.
- Work with London’s emergency service providers to ensure that facilities are of sufficient standard to deliver a high quality service in appropriate locations

#### **Planned provision**

- New emergency service facilities will be directed towards locations that offer good access to the strategic road network (e.g. A10 and A406) and public transport routes to serve the wider catchment area and deal promptly with emergency situations.
- No forthcoming emergency services infrastructure has been identified to accommodate the growth proposed in the borough,

## **8 COMMUNITY & CULTURAL FACILITIES**

### **8.1 INTRODUCTION**

This section covers:

- community facilities, including libraries, community centres / hubs and youth centres; and
- cultural facilities, including museums, art galleries, entertainment venues and conferencing

### **8.2 STRATEGIC OVERVIEW**

Enfield LB should provide sufficient community and cultural infrastructure that meets the increasingly diverse social and economic needs of its population. Community facilities should be in sustainable locations that are accessible to all residents and opportunities to co-locate facilities should be encouraged to make the most efficient use of land and help meet growing needs.

### **8.3 COMMUNITY FACILTIES**

Community centres typically include halls, meeting rooms and youth centres. In total, there are 21 council-owned community centres within the borough: six youth and community centres and 15 community halls. Community halls, youth and community centres are heavily concentrated to the east of the borough, with the largest cluster of facilities centred around Edmonton. Only one community hall (Alan Pullinger Youth and Community Centre) is located in the west of the borough. Enfield LB own and manage all of the borough’s libraries, including archives, digital services and historical records. In total, there are 17 different library service facilities, the highest number of any borough in London. The overwhelming majority of the borough’s residents live within one mile of a static library service.

Each library has free Wi-Fi (NB Angel Raynham has self-service terminals) and provides access to a range of virtual resources and digital services, such as online courses.

These libraries can be categorised as follows.

Type of library service	Responsibility	Role	Location
Flagship or hub libraries (4 in total)	Enfield LB	<ul style="list-style-type: none"> <li>Offer extended opening hours along with a full range of services such as employment and business advice, training, community hire and children’s library services.</li> </ul>	<ul style="list-style-type: none"> <li>Ordnance Unity, Enfield Town, Palmers Green and Edmonton Green</li> <li>Close to tube stations</li> </ul>
Community libraries	Enfield LB	<ul style="list-style-type: none"> <li>Share facilities and services with other service providers, organisations or voluntary groups.</li> </ul>	<ul style="list-style-type: none"> <li>Various locations but well located terms of proximity to the borough’s town and local centres</li> </ul>
Home library delivery service (free-of-charge)	Royal Voluntary Service	<ul style="list-style-type: none"> <li>Serve residents who cannot physically access a library building (e.g. people living in care homes).</li> </ul>	<ul style="list-style-type: none"> <li>N/A</li> </ul>

## Key priorities

- Secure new community facilities on development sites and estate regeneration schemes (e.g. Ladderswood Estate, Ordnance Road and Alma Estate)
- Improve the quality, accessibility and quantity of community facilities in the face of pressures from higher land uses and limited public funding
- Safeguard and avoid the unnecessary loss of community facilities (e.g. public houses)
- Ensure adequate community facilities are in place to support the sustainable growth of the borough
- Focus community and cultural uses within town centres and areas of high public transport access (e.g. Enfield Town)
- Support the multiple use of community facilities including schools, libraries and meeting places (especially after core hours)

## Risks & challenges

- Specific need gaps and priorities in the borough include the provision of public houses, youth centres, libraries and community halls. There is a deficiency of community hall provision in the west of the borough, particularly in Southgate and Enfield Town.
- An important aspect of youth centre provision is that it can be particularly location-sensitive, due to gang-related issues which can deter young people from travelling to different neighbourhoods. It is therefore important that provision of youth centres remains local.

## Planned provision

- Community facilities should be provided as part of major mixed-use development sites within opportunity areas and other growth locations to meet a local or strategic need

Project title	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation	Notes
Ponders End library	Replacement new library (Ponders End High Street)	Short term (2021)	• Lovells • LBE	TBC	• Electric Quarter (£50 million mixed-use regeneration scheme)	Desirable	
Enfield Town library	Redevelopment of the library to accommodate new cinema and arts centre	Short term (2022-2026)	LBE Heritage England	TBC	• Unknown (potential sources include Heritage Lottery Fund and Future High Streets Fund)	Desirable	
Community facilities	Community facilities to be provided as part of major mixed-use development sites within opportunity areas and other growth locations to meet a local or strategic need	Short, medium and long term	• Various	TBC	• Various (including developer contributions)	Desirable	
Alma Estate	Provision of a new youth centre - demolition of previous community centre (Welcome Point).	Short term (late 2022)	• LBE	TBC		Desirable	Database of registered spaces (including children's centres)
Meridian Water	Phase 1: Maximum of 600 sqm of community (D1) floorspace Phase 2: TBC	Short and medium term	• LBE • Developer • Third parties	TBC	• Developers	Desirable	
Council housing community halls	• Alma Road • Shepcot House	Short term	• LBE	TBC	• LBE	Desirable	

## 8.4 CULTURAL FACILITIES

### Where we are now

London's creative economy is worth over £50 billion and accounts for one in six jobs in London. Enfield has historically had a very low level of active cultural participation and has limited cultural infrastructure compared to other London boroughs, but nonetheless is well placed to cultivate sectors not currently well established in north-east London, such as the film, TV,

gaming and virtual reality industries, largely thanks to its young and ethnically diverse population, strong community ethos and proximity to central London<sup>14</sup>.

Enfield boasts an array of cultural venues, including:

- four theatres (e.g. Chickenshed Theatre, Millfield Theatre and Dugdale Centre);
- two dedicated cinemas;
- four museums (e.g. Whitewebbs Museum of Transport, Enfield Museum and Forty Hall),
- several independently comedy clubs; and
- several events and festivals (e.g. Drumsheds).

Notable gaps in provision include:

- access to affordable artist studio and rehearsal space in the creative sector, especially on the north east and south west of the borough;
- lack of a London-scale music or performance venue;
- late-night drink and entertainment venues, especially within town centres; and
- art gallery and exhibition space (there are currently no dedicated art galleries in the borough although there is exhibition space at the Dugdale Centre).

## Risks & challenges

- Out-of-town development and location of Enfield's cinemas, museums and theatres (the majority of cultural facilities are poorly located in terms of access to good public transport links and other town centre uses)
- Due to the impacts of the pandemic, many facilities are expected to experience reductions in funding, increased levels of demand and rising expectations. The long-term sustainability of these facilities is a particular concern.
- Shortage of cultural facilities in the north east and south west of the borough, particularly gallery and exhibition spaces and studios.
- Cultural venues in the borough will require regular maintenance, repair and renovation to ensure continued growth and participation.

## Key priorities

- Connect Enfield's diverse communities to grassroots cultural activity and heritage (especially among Turkish/Kurdish, African and Caribbean populations)
- Encourage disposal and redevelopment of land and buildings back into new and updated facilities
- Provide creative and flexible workspace (e.g. artist and television studios, where possible) in new mixed-use developments (e.g. Meridian Water) to promote economic diversity and town centre revitalisation
- Encourage co-location of facilities and services and meanwhile uses (e.g. vacant units)
- Increase access and participation (especially among hard-to-reach groups) to borough's cultural venues, events and festivals
- Safeguard existing venues and spaces
- Develop and build the capacity of the borough's arts and cultural sector to respond to future demands and opportunities (through the creation of new venues, intensification of existing activities, reuse/redevelopment, art galleries and pop-up/temporary venues etc)
- Maximise the economic potential of the borough's nighttime and cultural offer (e.g. town centres) to attract more visitors, independent enterprises and investors
- Exploit redevelopment opportunities at existing cultural venues and events (in the face of public cuts and competitive land demands)

---

<sup>14</sup> Culture Connects: A Cultural Strategy For Enfield: 2020-2025

## Planned provision

- Cultural investment and activity will be directed towards highly accessible locations and regeneration hot spots such as Meridian Water and key town centres (Enfield Town, Southgate and Edmonton Green).
- Public venues will be designed to be visible to the street scene, act as anchor uses and incorporate high quality public realm (e.g. town centres).

Project title	Planned provision	When	Delivery partners & stakeholders	Cost (where known)	Funding source (where known)	Prioritisation:	Notes
<b>Park building repurposing</b>	Repurposing empty park buildings for creative use to develop additional creative workspace and provide cultural community benefit	Short term	LBE, Hypha Studios, Hive Studios	TBC	• LBE	Desirable	
<b>Little Park Gardens</b>	Creative redevelopment of bus station toilet block as artist studio, gallery and café space	• Short term (2022-2026)	• LBE • TFL	TBC	• Unknown (potential sources include Heritage Lottery Fund and Future High Streets Fund)	Desirable	
<b>Meridian Water (Building BloQs and ACAVA)</b>	• Conversion of existing industrial buildings along the Lea Navigation to provide affordable artist studios and open access workspace (35,000 square feet of existing and new commercial space)	• Short term	• Building Bloqs and ACAVA • LBE	• £2.7 million	• Unknown	Desirable	
<b>Trent Park Museum</b>	• Creation of a new world war two museum in the listed mansion house	• Short term (due to open in 2022) • The site will be leased to Trent Park Museum Trust	LBE • Trent Park Museum Trust • Developer (Berkeley Homes) • Prince's Regeneration Trust	• £8 million	• £3.9 million (Trent Park Museum Trust) • In-kind developer contribution (£4 million)	Desirable	This museum will be developed across the restored stately rooms on ground floor of grade II mansion house
<b>Former Magistrates Court (Windmill Hill, Enfield Chase)</b>	• Conservation and renovation of the historic building into artist studios, delivering creative workspace and c60 jobs • One Park Road (small resi building) to provide additional facilities, e.g. café / resi / gallery	Short term (2022-2026)	LBE Creative Land Trust	TBC	• LBE • Creative Land Trust • Lottery funders	Desirable	
<b>Intimate Theatre (Palmers Green)</b>	• Sensitive development of the Monica's Hall site to accommodate a purpose-built theatre.	Short term		TBC		Desirable	
<b>Dugdale Theatre, Enfield Town</b>	• Development of the existing theatre site to include improved museum facilities and restaurant	Due by March 2022	• LBE	£750k	• LBE - invest to save • 10k from National Lottery Heritage Fund	Desirable	
<b>Salisbury House Arts Centre, Edmonton</b>	• Sensitive development of the Bury Lodge depot site to create an enlarged garden and venue space alongside small enterprise workspace, focusing on creative businesses	Short term	• Historic England • LBE	TBC	• Planning condition - dependent on the construction of housing on the depot site	Desirable	
<b>Fox Public House</b>	• Partial redevelopment of the comedy club in Palmers Green	Short term	• Developers	TBC	• Site owner • S106 contribution from housing	Desirable	

<b>Gentlemen's Row</b>	Redevelopment of upper floor space to provide workspace for small creative enterprises (graphic design, copywriters, games design etc)	Short term	• LBE	£900k (est)	• LBE • Tenants	Desirable	
<b>Independent cinema</b>	Creation of independent cinema with café, community space and boutique feel to address significant infrastructure gap	Short to medium term	• LBE • Really Local Group	£2 million	TBC	Desirable	
<b>St Andrews Church</b>	Renovation Grade I listed building on the At Risk register and create community cultural and heritage facility, performance space and visitor attraction	Due by end of 2025	• Diocese of London, St Andrews Church	£6.7 million	TBC	Desirable	
<b>Young Talent Academy</b>	Successful local performing arts CIC stepping up into premises ownership, delivering rehearsal space for their own use and for hire, addressing gap in market following redevelopment of Thomas Hardy House	Short term	• Young Talent Academy	£400k	TBC	Desirable	
<b>Charity School</b>	Renovation of listed building on the At Risk register into expansion premises for West Lea school, providing graduate employment opportunities for their students in a café, heritage and community performance space	Short term	• LBE • West Lea, London Historic Building Trust		TBC	Desirable	