North London Waste Plan

Proposed submission

(Regulation 19)

January 2019

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1. Introduction and Background

What is the North London Waste Plan?

1.1. The seven North London Boroughs of Barnet, Camden, Enfield, Hackney, Haringey, Islington and Waltham Forest are working together to produce the North London Waste Plan (the 'NLWP'). The NLWP also covers part of the area of the London Legacy Development Corporation (LLDC), a Mayoral Development Corporation, which is the planning authority for a small part of Hackney and Waltham Forest[1]. Figure 1 shows the North London Waste Plan area.

1.2. The NLWP has two main purposes:

- to ensure there will be adequate provision of suitable land to accommodate waste management facilities of the right type, in the right place and at the right time up to 2035 to manage waste generated in North London; and
- to provide policies against which planning applications for waste development will be assessed, alongside other relevant planning policies/guidance.

1.3. The key elements of the NLWP are:

The Aim and Objectives: These are overarching principles which have steered the development of the NLWP.

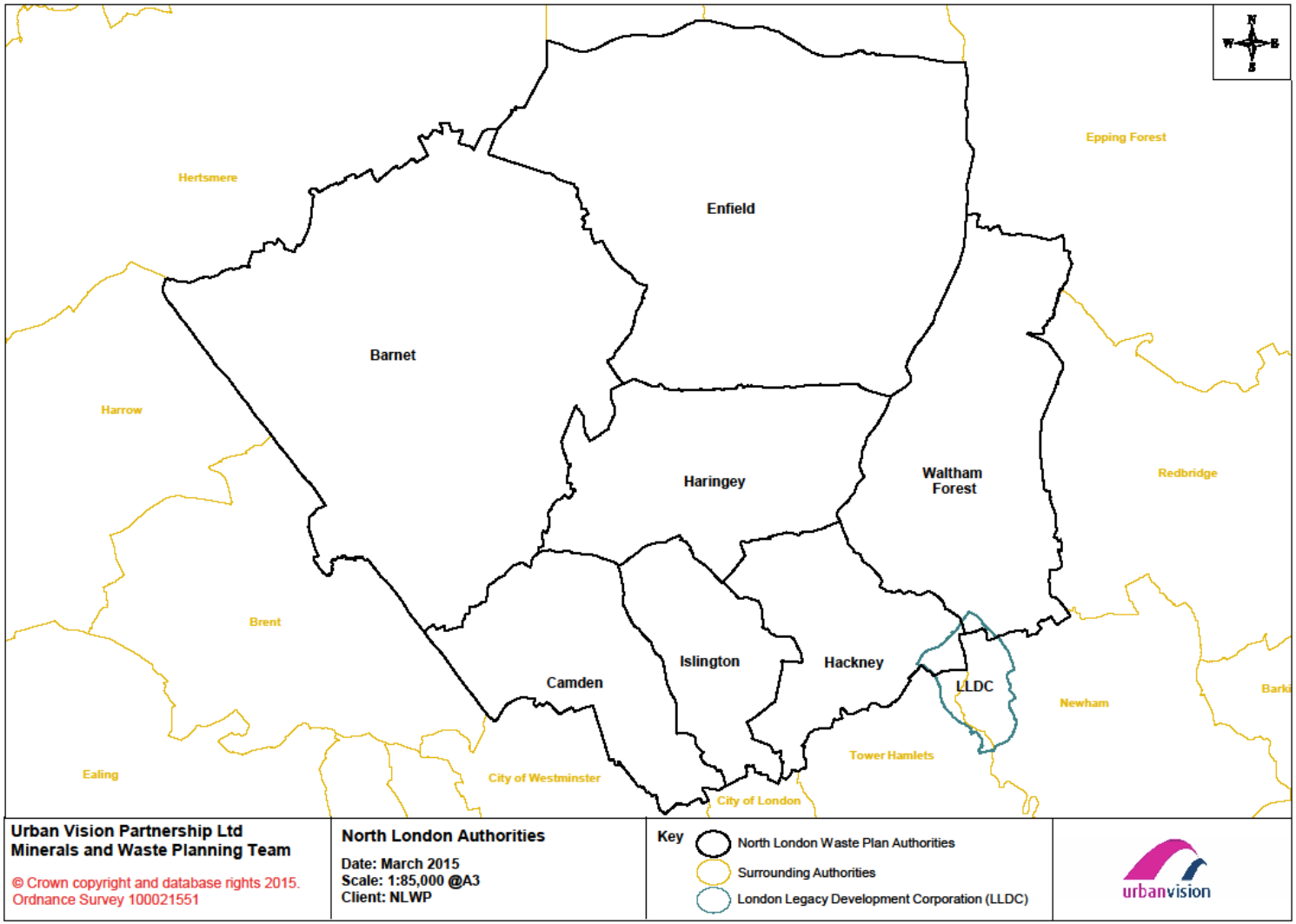
The Spatial Framework: This sets out the physical and planning components that influence the Plan and identifies opportunities and constraints for waste planning in North London.

The Provision for North London's Waste to 2035: This sets out the preferred option for how the waste management needs for North London will be met for each waste stream over the Plan period.

The Policies: These are strategic policies through which the aims and objectives, waste management strategy and Spatial Framework will be delivered. The policies provide the waste planning framework against which applications for waste development will be assessed across the Plan area.

[1] The relationship of the NLWP to the LLDC is discussed further in para 1.15 below

Figure 1: North London Plan Area



1.4. The NLWP plans for all principal waste streams including:

- **Local Authority Collected Waste** (LACW): Waste collected by a Local Authority, including household and trade waste;
- **Commercial and Industrial** (C&I): Waste produced by businesses and industry;
- **Construction, Demolition & Excavation** (CD&E): Waste generated as a result of delivering infrastructure projects, building, renovation and the maintenance of structures;
- **Hazardous**: A sub category of all waste streams where the material produced is hazardous and requires specialist treatment;
- **Agricultural waste**: Waste produced by farming and forestry activity;
- **Waste Water / Sewage Sludge**: Waste produced from washing, cleaning and hygienic activities to create waste water and sewage effluents; and
- **Low level radioactive waste** (LLW): Waste associated with the undertaking of x-rays and laboratory testing using low level radioactive substances.

How does the North London Waste Plan fit with other plans and strategies?

1.5. The seven North London Boroughs, as Waste Planning Authorities (WPA) are required to prepare a Waste Local Plan. This requirement comes from Article 28 of the European Union (EU) Waste Framework Directive, the National Waste Management Plan for England and the National Planning Policy for Waste (NPPW).

1.6. The NLWP is prepared in line with the requirements of the Planning and Compulsory Purchase Act 2004, the Waste (England and Wales) Regulations 2011 and the Town and Country Planning (Local Planning) (England) Regulations 2012, The National Planning Policy Framework (NPPF) and supporting Planning Practice Guidance (PPG) direct how Local Plans should be prepared and the National Planning Policy for Waste (NPPW) provides detailed requirements specific to waste plan preparation and content.

1.7. Once adopted, the NLWP will form part of the 'Development Plan' for each of the North London Boroughs which comprises the London Plan[2] and borough Local Plans (see Figure 2). The NLWP must be in general conformity with the London Plan, which sets the strategic framework for the NLWP, and consistent with other documents in borough Local Plans. The NLWP should be read alongside other relevant policies within the wider Development Plan. The Mayor published a draft London Plan for consultation in December 2017. The Examination in public ~~is expected to begin in January~~ took place in early 2019 with ~~adoption~~ publication scheduled for early 2020.

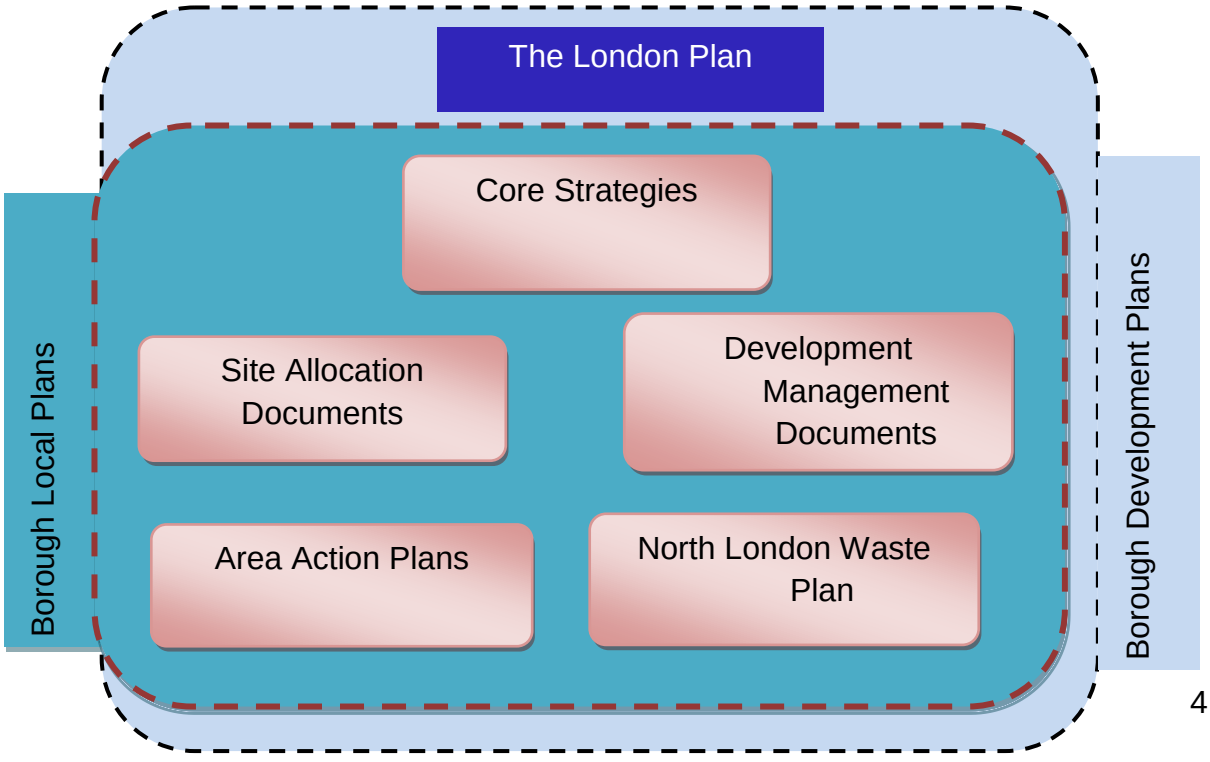
[2] ~~At time of writing this is The London Plan March 2016~~ The current adopted London Plan is referenced as the London Plan (March 2016), the London Plan (consolidated changes version) is referenced as the draft new London Plan (July 2019).

~~The London Plan sets the strategic framework for the NLWP~~ At time of writing, the adopted London Plan is March 2016, however a draft new London Plan has been developing while the NLWP is being prepared. The latest version of the new draft London Plan (consolidated changes version) was published in July 2019 and the direction of travel for the new waste policies and targets are known. The GLA will publish an 'Intend to Publish' version of the London Plan six weeks after receiving the Panel Report. This is likely to be in December 2019, after the NLWP public hearings. This version will then be considered by the London Assembly. Given the advanced stage of the new London Plan it is prudent for the NLWP to incorporate new targets and policy approaches to ensure it isn't immediately out of date. Where relevant, the NLWP states which version of the London Plan is being referenced [footnote].

1.8. The London Plan projects how much LACW and C&I waste is likely to be generated in the capital over the next 20 years and apportions an amount of these two waste streams to each borough. The North London Boroughs have pooled their apportionments and will meet this collectively through existing sites and land allocated in the NLWP.

1.9. Each of the seven boroughs has a strategic waste policy as part of their Local Plan. The boroughs' strategic waste policies defer to the NLWP to provide a more detailed planning framework for waste development across the seven boroughs. Each borough's Local Plan may also include site allocation documents, development management policies and area action plans, as well as supplementary planning documents.

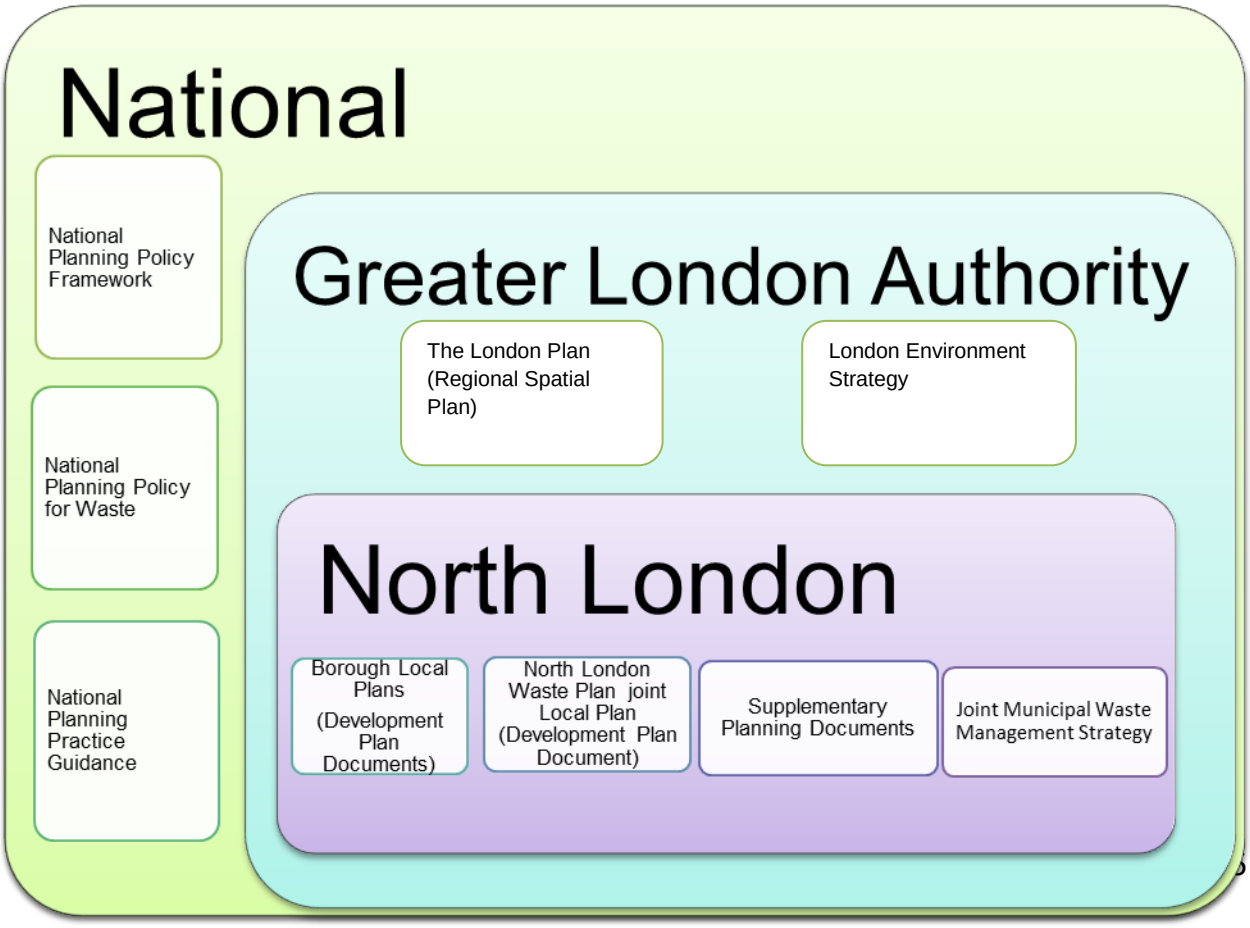
Figure 2: Documents making up the Development Plan for North London Boroughs



1.10. In addition to the national and regional planning policies, there are also waste strategies which impact on the development of the NLWP. The Mayor's London Environment Strategy (2018) contains recycling targets for Local Authority Collected Waste (LACW) and Commercial & Industrial (C&I) waste which inform policies within the London Plan.

1.11. The North London Waste Authority~~'s~~ (NLWA) and the seven constituent boroughs have ~~has~~ produced the Joint Municipal Waste Management Strategy (JMWMS) (2009). The NLWA, as the Waste Disposal Authority for the NLWP area, is a key stakeholder. The NLWA is responsible for managing the household waste collected by the North London boroughs, ~~in particular household waste but also~~ and also for the household waste deposited at Reuse and Recycling Centres and some waste that the boroughs collect from local businesses; collectively this is known as Local Authority Collected Waste (LACW). The NLWP is required to ensure there is adequate provision for the disposal and recovery of this waste stream.

Figure 3: Hierarchy of Planning Guidance Policies and Strategies



1.12. Once adopted the NLWP will form part of the overarching planning framework used for the determination of planning applications relating to proposed or existing waste facilities in North London. These applications will be submitted to the Boroughs in which the facility is located. Developers will need to consider the documents highlighted in Figure 3 in making a planning application related to an existing or proposed waste facility:

- National planning policy and guidance;
- The London Plan and Supplementary Planning Guidance;
- The North London Waste Plan;
- Borough Local Plan documents

What is involved in preparing the North London Waste Plan?

1.13. As mentioned above, the NLWP must be prepared in line with European, national, regional and local policies and guidance. Before the NLWP can be adopted by each of the Boroughs it must be examined by an independent Inspector. The Inspector will determine whether the Plan has been prepared in accordance with the duty to co-operate, legal and procedural requirements and whether it is 'sound'.

1.14. The duty to co-operate, introduced by the Localism Act 2011, and requires local planning authorities and other public bodies to engage constructively, actively and on an ongoing basis to develop strategic policies. Meeting the requirements of the duty to co-operate is a key part of the plan making process for the NLWP and the North London Boroughs are working closely with other waste planning authorities that are critical for the delivery of an effective waste strategy for North London, in addition to prescribed public bodies such as the Environment Agency and the Mayor.

1.15. As previously highlighted, the North London Boroughs are working closely with the London Legacy Development Corporation (LLDC). The LLDC is a Mayoral Development Corporation with responsibility for securing the regeneration of an area of London focused on the former Olympic Park. The LLDC is the local planning authority, which includes waste planning, for small parts of Hackney and Waltham Forest (and other boroughs not part of the NLWP group). However, while all the Boroughs have an apportionment of waste from the Mayor under the London Plan for which they must plan and find land, the LLDC is not allocated a share of the borough apportionment. The NLWP is required therefore to plan for the quantity of waste generated across the seven boroughs including the parts of Hackney and Waltham Forest that lie within the LLDC area. In carrying out their responsibilities under the NPPW, the North London Boroughs are engaging with other planning authorities outside London which import waste from North London including the

LLDC area. The NLWP cannot directly allocate sites/areas within the LLDC area as this is the responsibility of the LLDC as the local planning authority.

1.16. An agreement for the working relationship between the North London Boroughs and the LLDC has been drawn up. This agreement, or Memorandum of Understanding, identifies the Sites and Areas suitable for waste within the Hackney and Waltham Forest parts of the LLDC area. The LLDC's Local Plan also identifies sites and areas that are potentially suitable for waste related uses. For waste development proposals in the parts of Hackney and Waltham Forest which fall within the LLDC area, the LLDC Local Plan policies will apply. Policy IN2 of the LLDC Local Plan requires planning decisions to take full account of the policies within the adopted waste plans of the Boroughs.

Supporting Documents

1.17. The NLWP is accompanied by evidence base documents including a Data Study, Options appraisal, Sites and Areas report and Duty to Co-operate report. There are supporting assessments such as a Sustainability Appraisal (SA) (incorporating the requirements of the SEA Directive), Habitats Regulation Assessment (HRA), a Sequential Test Report)and Equalities Impact Assessment (EqIA). These assessments form a key element of the development of the Plan and help to ensure that the social, environmental and economic impacts of the policies developed in the Plan are assessed and taken into account in the decision making process. There are also reports on the outcomes of all consultations on the NLWP. The supporting documents can be viewed -on the NLWP website.

What stage is the NLWP at?

1.18. This is the Proposed Submission Plan (Regulation 19). It has been prepared following consideration of responses received to the consultation on the draft NLWP (Regulation 18) which took place from 30th July to 30th September 2015. The consultation provided an opportunity for stakeholders and communities to comment on the Draft Plan and proposed policies. A report on the outcomes of this consultation and separate reports of the previous consultation at the outset of plan preparation are also available to view on the NLWP website.

1.19. The Proposed Submission Plan is the version of the NLWP that the Boroughs intend to submit to the Secretary of State for examination. It is being published to allow the opportunity for stakeholders and communities to submit representations on the soundness and legal and procedural compliance of the Proposed Submission Plan.

1.20. At the heart of national policy (the NPPF) is the presumption in favour of sustainable development and policies in the NLWP must reflect this presumption. The NLWP must meet the soundness tests as set out in paragraph 182 of the NPPF. These require the NLWP to be:

- Positively prepared (meet objectively assessed development needs of the area);
- Justified (set out the most appropriate strategy based upon the evidence);
- Effective (deliverable and address cross boundary issues);
- Consistent with national policy.

What happens next?

1.21. Representations made during consultation on the Proposed Submission Plan will be considered and any proposed changes will be submitted to the Inspector for examination along with supporting documents.

1.22. Once the Plan is submitted, an independent Inspector will be appointed (on behalf of the Secretary of State) to examine whether the NLWP meets the required legal and soundness tests, including duty to co-operate and procedural requirements. The indicative timetable for the Plan is as follows:

Table 1: NLWP Timetable

Consultation on Proposed Submission Plan (Regulation 19)	January – February 2019
Submission (Regulation 22)	June 2019
Public hearings	September 2019
Inspector's report	January 2020
Adoption	June 2020

2. Setting the Scene

2.1 Waste management has an important role in achieving sustainable development. There are a number of ways to define 'sustainable development'. The most well-known definition is '*development which meets the needs of the present without compromising the ability of future generations to meet their own needs*'[3]. The UK Sustainable Development Strategy *Securing the Future* set out five 'guiding principles' of sustainable development:

- living within the planet's environmental limits;
- ensuring a strong, healthy and just society;
- achieving a sustainable economy;
- promoting good governance; and
- using sound science responsibly.

2.2 The National Planning Policy Framework (NPPF) references these definitions and goes on to set out three objectives to sustainable development: economic, social and environmental. The North London Waste Plan (NLWP) will help achieve sustainable waste management by providing a sound basis for the provision of waste management infrastructure, contributing to the conservation of resources by improving the efficiency of processing and making better use of the wastes created within North London.

Geographical Extent

2.3 The North London Boroughs cover a large swathe of London from the inner city into the Green Belt of outer London. The geographical extent takes in both the inner London Boroughs of Camden, Hackney and Islington, and the outer London Boroughs of Barnet, Enfield, Haringey and Waltham Forest (see Figure 4). The land within the North London Boroughs spans an area of 293 square kilometres. The geographical characteristics of North London are a key element in both the Spatial Framework (see section 4) and the sites/areas assessment criteria (see section 8).

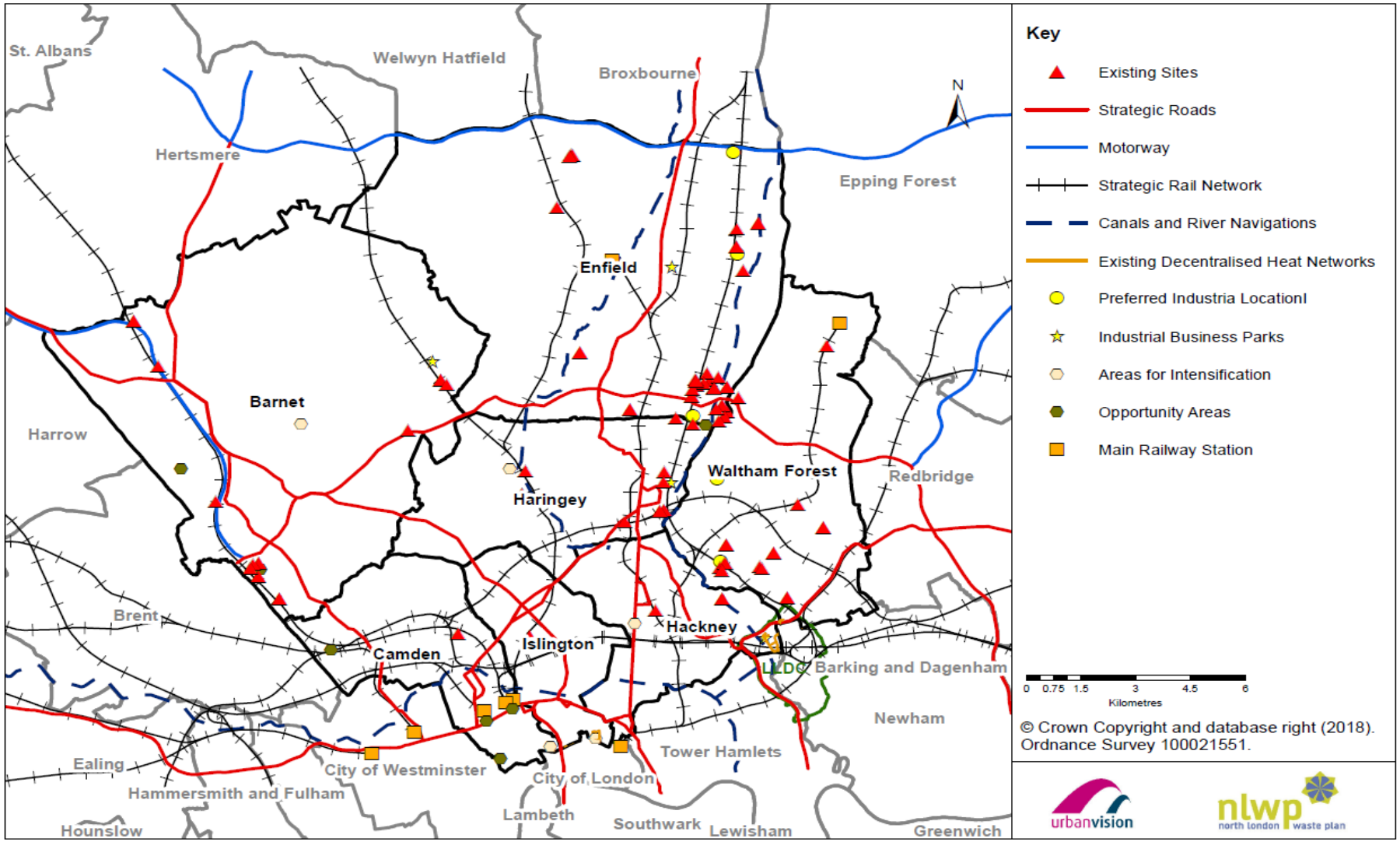
[3] Brundtland Commission, 1987 (Resolution 42/187 of the United Nations General Assembly)

Population Characteristics

2.4 The North London area is one of the most densely populated areas in the UK. Recent statistics[4] show that the population has risen from 1.6 million in 2002 to an estimated 2.0 million in 2017 and that the population continues to grow at a rate

[4] Office for National Statistics

Figure 4: Main geographical and planning features of North London



above the national average. This population growth will also increase the amount of waste North London will need to manage in the future, even though the amount of waste generated per person may not increase (see section 6).

2.5 The highest density is in the inner boroughs of Islington (the most densely populated local authority in the UK according to the 2011 Census), Hackney and Camden, closely followed by Haringey. Waltham Forest, Barnet and Enfield are less densely populated, however these Boroughs are still substantially more densely populated than the rest of the country. Density of population and the built environment has an influence on the amount of waste generated but also on competition for land and the availability of sites suitable for new waste facilities (see section 7).

2.6 While the outer Boroughs are characterised by traditional detached, semi-detached and terraced housing, overall across the Plan area, there is a higher proportion of flats and similar multi-tenant properties. This is particularly the case in the inner Boroughs which, consequently, have fewer gardens (and green waste) than the outer Boroughs. The differing ability of types of housing stock to incorporate waste collection infrastructure (for example recycling bins) impacts on recycling rates in North London (see section 6).

Health

2.7 There are varying levels of life expectancy across North London. The outer boroughs of Barnet and Enfield report life expectancies higher than the national average, however significant inequalities exist within the boroughs. In contrast, the other Boroughs report male life expectancy lower than the average for England, while the same is true of females in Islington and Waltham Forest. Impact on human health has been a key consideration in the development of the NLWP and is discussed in more detail in the Sustainability Appraisal (SA) which supports the NLWP.

Socio-Economic

2.8 The average gross weekly earnings within each of the North London Boroughs is higher than the average for England. All of the Boroughs have a higher proportion of their working population employed than the national average. This is mirrored by the high cost of living in all Boroughs. Four Boroughs (Hackney, Haringey, Islington and Waltham Forest) contain wards amongst the 20 most deprived areas in England pointing to varying degrees of polarisation. All boroughs contain varying levels of deprivation within them. Maximising economic benefits by utilising waste as a resource is an objective of this plan. There are opportunities for job creation through the development of new waste facilities at both the construction and end

user stages. New technologies can also help to create 'green collar'[5] jobs in new waste management facilities as well as in sectors that receive recycled or reprocessed material, turning it into new products, thereby creating wealth from waste. Economic growth in North London is predicted to result in greater amounts of waste being generated. This is due to more people in jobs, although the amount of waste created per person is expected to stay the same.

Environment

2.9 The North London Waste Plan area includes important green space with many parks and larger areas such as Hampstead Heath, the Lee Valley Regional Park and part of Epping Forest. There are extensive areas of Green Belt in the outer areas and areas of agricultural land in Barnet and Enfield.

2.10 Enfield has identified Areas of Special Character where the Council will seek to preserve and enhance the essential character of the area, including landscape features such as woodlands, streams, designed parklands and enclosed farmland.

2.11 The Lee Valley contains an internationally important wetland habitat (Ramsar site and Special Protection Area (SPA)) as the reservoirs and old gravel pits support internationally important numbers of wintering birds as well as other nationally important species. In addition, the adjacent Epping Forest Special Area of Conservation (SAC), part of which lies in Waltham Forest, is important for a range of rare species, including mosses. There are six Sites of Special Scientific Interest (SSSI), 21 Local Nature Reserves and 307 Sites of Importance for Nature Conservation (SINC). The concentration of industrial land in the Lee Valley poses challenges for development to take into account key biodiversity issues set out in Borough Biodiversity Action Plans.

2.12 Throughout North London there are many areas and sites of historic interest including 172 conservation areas, over 14,000 listed buildings, registered landscapes, scheduled monuments, archaeological priority areas and as yet unknown archaeological remains. Protection for heritage assets is included in Local Plan policies and the sites/areas assessment criteria (see section 7) and policy 5.

2.13 The heavily developed and built up nature of North London coupled with differential values between competing land uses, and protected areas such as Green Belt presents a significant challenge in planning for waste. Expected development over the plan period will increase these pressures. For development which is perceived as likely to create more environmental risk and harm to the amenity of the local area,

[5] Jobs in environmental sectors

throughfactors such as noise, dust and increased traffic, the planning constraints near areas protected for their environmental value are greater.

2.14 Protection of groundwater is vital to prevent pollution of supplies of drinking water, while secondary aquifers are important in providing base flows to rivers. The Environment Agency has designated areas of source protection zones in a number of locations, particularly in the Lee Valley as well as implementing groundwater protection measures around boreholes in the area.

2.15 Historically much of the employment land in North London has been in industrial use. Inevitably the restructuring from an industrial-based to a service based economy has affected land use priorities, creating a situation where the type of employment land available has changed, particularly in the inner boroughs where offices predominate. Such areas are now under pressure to help deliver high housing and employment targets. The previous use of these areas raises the risk of contamination and the need for remedial measures regardless of how the land will be used in the future.

2.16 Air quality within North London is uniformly poor as a result of high levels of nitrogen dioxide and dust (NO_2 and PM_{10} respectively) that are mainly, but not exclusively, due to road traffic. As a result, all of the councils have declared Air Quality Management Areas (AQMA) covering each Borough.

2.17 The NLWP includes strategies and policies to protect environmental assets and amenity.

Transport

2.18 North London benefits from good access to the strategic road network such as the M1 and M11 and the M25. The local road network is dominated by important radial routes to the centre of London and also includes the key orbital North Circular Road (A406) which bisects the Plan area from east to west. Parts of this network experience high levels of congestion at off-peak as well as peak hours, despite the fact that part of the area lies within the London Mayor's congestion charging zone.

2.19 Three main train lines terminate at Euston, St Pancras and Kings Cross, all in Camden. The North London Line (NLL) is a commuter and nationally important freight route providing movement of material across the area. There is a planning application to replace the railhead at Hendon in Barnet that currently transports waste out of London by a new facility just to its north. Proposals for the West London Orbital line will improve rail access to the west of the area.

2.20 In March 2016, the National Infrastructure Commission recommended that Crossrail 2, a proposed new rail line serving six of the NLWP constituent Boroughs, should be

taken forward as a priority. Transport for London and Network Rail are currently developing the scheme. Whilst the final scheme and timetable is not yet known, there is a potential for Crossrail 2 to impact upon existing or future waste management sites during the NLWP period. This is discussed further in Section 8.

2.21 In addition the Grand Union Canal and the Lee Navigation run through the area and provide sufficient draught to allow light cargo movements to and from industrial and other facilities close to a number of wharves along each waterway.

2.22 Opportunities for using sustainable modes of transport are a key element of the Spatial Framework.

Land Use

2.23 Across North London as a whole the predominant land use is housing. There are also concentrated areas of commercial activity and town centres. Parts of Camden, Hackney and Islington fall into the Central Activities Zone which covers London's geographic, economic, administrative, and cultural core spanning ten boroughs in total. The Upper Lee Valley on the east of the NLWP area includes a concentrated area of industrial activity. Each borough contains areas of industrial or employment land that are designated for this purpose. The London Plan designates Strategic Industrial Locations (SILs) and provides the strategic direction for the identification of Locally Significant Industrial Sites (LSISs) and other industrial/employment designations in Local Plans.

2.24 There are a number of drivers for change in land use in London, in particular the need to boost housing numbers and make best and most efficient use of land around public transport modes. These pressures are likely to increase as a result of planned investment such as Crossrail 2, Stratford to Angel Road (STAR) Scheme and four-tracking on the West Anglia Mainline.

2.25 To deliver this change, the London Plan has identified Opportunity Areas and Housing Action Zones in parts of North London including parts of the Lee Valley and there may be future Opportunity Areas identified during the NLWP plan period. The Opportunity Areas overlap with land which contains existing facilities and also the areas identified in this Plan for new waste facilities. Therefore, alongside the opportunities for intensification and new homes, there will also be a need for Boroughs to consider existing waste operations and areas for new waste facilities, in light of NLWP Policies 1: and 2.

2.26 Some boroughs are beginning to review their Green Belt boundaries as a result of the review of Local Plans.

Climate Change

2.27 The North London Boroughs are all focused on the challenges posed by climate change. Borough strategies are driven by the requirements to mitigate and adapt to all effects of climate change. The NLWP aims to deliver effective waste and resource management which makes a positive and lasting contribution to sustainable development and to combating climate change.

2.28 All Boroughs have lower CO_2 emissions per capita than the national average, with the exception of Camden where levels are elevated by the concentration of commercial and other non-domestic activities. However all Boroughs have significantly lower per capita CO_2 emissions from road transport when compared to the national average. This is particularly apparent in Camden, Hackney, Haringey, Islington and Waltham Forest. Per capita CO_2 emissions from the domestic sector are below the national average.

2.29 The NLWP seeks to reduce the reliance on disposal to landfill sites outside London as this contributes to CO_2 emissions from transport. While it is recognised that waste management facilities will continue to generate CO_2 emissions, new waste facilities generating energy need to meet the Mayor's Carbon Intensity Floor. The priority of the NLWP will be to implement policies and direct new development to sites which deliver a better overall environmental outcome.

2.30 The NLWP site and area assessments take into account those parts of all Boroughs that are under threat from surface water (and potentially sewer) flooding because of the extensive urbanised areas.

2.31 The site and area assessments also take into account the greater occurrence of urban flood events over the last sixty years and the risk that climate change will lead to a greater threat from flooding in the future. On the east side of the area a number of tributaries flow into the River Lee while parts of Barnet drain into the River Brent to the west.

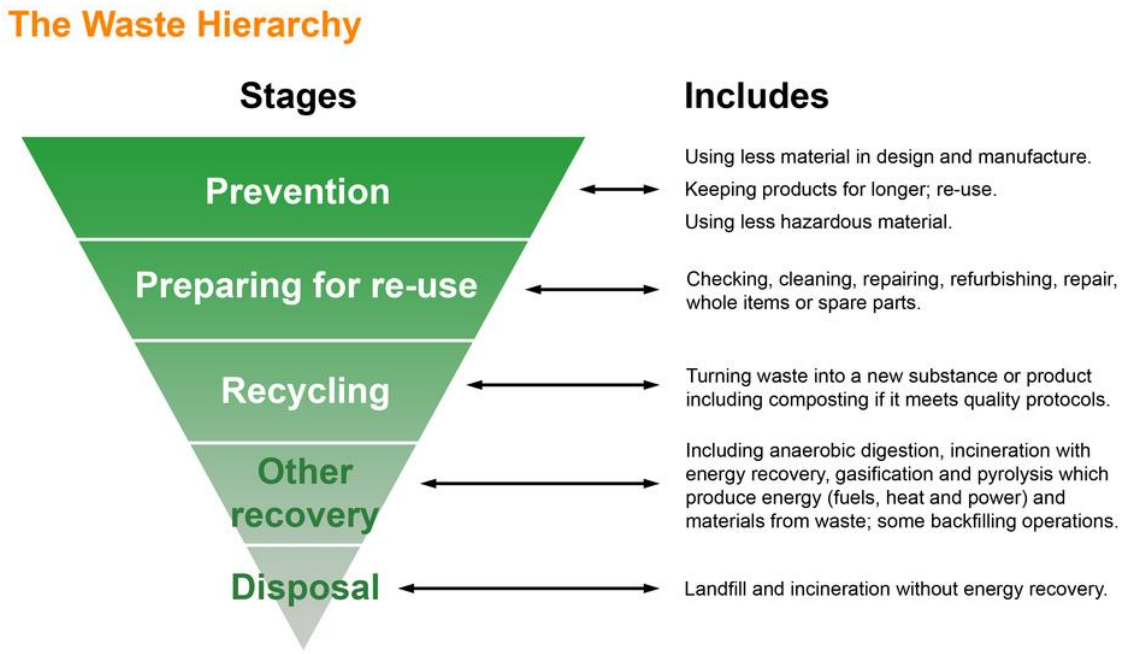
3. Aims and Objectives

Aim of the North London Waste Plan

3.1. Each of the seven Borough Local Plans contains a vision for their area, and the aim of the NLWP links to the delivery of that vision. The NLWP therefore includes a single overarching aim and a number of objectives to deliver that aim. The Aim meets the requirements of National Planning Policy for Waste (NPPW) through providing a set of agreed priorities for delivering sustainable waste management in North London

3.2. The NLWP treats waste as a resource rather than as a nuisance, promoting the principles of the waste hierarchy. The Aim acknowledges that the NLWP is part of a wider but integrated approach that will help to deliver sustainable waste management in North London, alongside such measures as improved resource management, and waste prevention and reduction spanning strategies which influence but are outside of the planning framework. The NLWP aim and objectives reference and integrate the Waste Hierarchy which is shown in Figure 5.

Figure 5: Waste Hierarchy



3.3. The aim of the NLWP is:

Aim of the NLWP

"To achieve net self-sufficiency* for LACW, C&I and C&D waste streams, including hazardous waste, seek beneficial use of excavation waste, and support a greener London by providing a planning framework that contributes to an integrated approach to management of materials further up the waste hierarchy. The NLWP will provide sufficient land for the sustainable development of waste facilities that are of the right type, in the right place and provided at the right time to enable the North London Boroughs to meet their identified waste management needs throughout the plan period".

* Net self-sufficiency means providing enough waste management capacity to manage the equivalent of the waste generated in North London, while recognising that some imports and exports will continue.

Strategic Objectives

3.4. The objectives of the draft NLWP are as follows:

SO1. To support the movement of North London's waste as far up the waste hierarchy as practicable, to ensure environmental and economic benefits are maximised by utilising waste as a resource:
Met through Policies 2, 4, 6, 7 and 8

SO2. To ensure there is sufficient suitable land available to meet North London's waste management needs and reduce the movements of waste through safeguarding existing sites and identifying locations for new waste facilities:
Met through Policies 1, 2, 3, 4, , 7 and 8

SO3. To plan for net self-sufficiency[6] in LACW, C&I, C&D waste streams, including hazardous waste, by providing opportunities to manage as much as practicable of North London's waste within the Plan area taking into account the amounts of waste apportioned to the Boroughs in the London Plan, and the requirements of the North London Waste Authority, to seek beneficial use of excavation waste,, and to monitor waste exports as part of the ongoing duty to co-operate.~~:~~

[6] ~~Net self-sufficiency means providing enough waste management capacity to manage the equivalent of the waste generated in North London, while recognising that some imports and exports will continue.~~

Met through Policies 1, 2, 3, 4, and 8

SO4. To ensure that all waste developments meet high standards of design and build quality, and that the construction and operation of waste management facilities do not cause unacceptable harm to the health or amenity of local residents or the environment:
Met through Policy 5

SO5. To ensure the delivery of sustainable waste development within the Plan area through the integration of social, environmental and economic considerations:
Met through Policies 2, 5 and 7

SO6. To provide opportunities for North London to contribute to the development of a low carbon economy and decentralised energy:
Met through Policy 6

SO7. To support the use of sustainable forms of transport and minimise the impacts of waste movements including on climate change:
Met through Policy 5

SO8. To protect and, where possible, enhance North London's natural environment, biodiversity, cultural and historic environment:
Met through Policy 5

4. Spatial Framework

4.1 The spatial framework flows from the Plan's objectives and takes account of the spatial context outlined in section 2 and the strategic and policy context outlined in section 1, alongside the Plan's technical evidence base, and the views of stakeholders. Figure 6 below shows the relationship between the key elements that form the spatial framework.

4.2 The spatial framework provides the strategic direction for the detailed policies of the NLWP and informs site/area selection. The spatial framework also guides the assessment of the suitability of windfall sites under Policy 3. It reflects the complexities and realities of planning at a sub-regional level taking into account varied characteristics and functions across the seven boroughs, from densely populated urban areas to stretches of Green Belt. Competing and changing land uses, especially release of industrial land for housing, is a key issue for the boroughs.

4.3 The spatial principles set out below represent the outcome of balancing various priorities, opportunities and constraints, in particular the availability of sites/areas to achieve a deliverable distribution of waste management locations to meet identified need, whilst bringing social, economic and environmental benefits of new waste management facilities to North London.

4.4 The NLWP is underpinned by the following spatial principles:

A. Make use of existing sites
B. Seek a geographical spread of waste sites across North London, consistent with the principles of sustainable development.
C. Encourage co-location of facilities and complementary activities
D. Provide opportunities for decentralised heat and energy networks
E. Protect local amenity
F. Support sustainable modes of transport

A. Make use of existing sites

4.5 NPPW requires Boroughs to consider the capacity of existing operational facilities in meeting identified need. Further to this~~, Policy 5.17 *Waste Capacity* of The~~ London Plan policy [footnote] requires boroughs, when preparing plans, to protect and facilitate the maximum use of existing waste sites.

[Footnote] London Plan (March 2016) Policy 5.17: Waste Capacity and draft new London Plan (July 2019) Policy S18.

~~4.5~~4.6 In line with this and in order to recognise the valuable contribution existing waste facilities make to managing waste effectively, existing waste management capacity has provided the baseline for identifying the waste management capacity gap and the consequent need for expanded and new facilities. Existing waste management sites form an important part of the strategic waste plan for North London and are safeguarded for waste use through NLWP Policy 1 and the London Plan (see Schedule 1 in Appendix 1 for a full list of existing sites).

~~4.6~~4.7 Figure 6 shows that the majority of existing waste sites are located to the east of the Plan area in the industrial parts of the Lee Valley corridor. These sites have developed over decades outside of a strategic plan for waste, and in locations which may have been suitable for waste uses but which did not create an even geographical spread across North London. This reflects the mixed function and character of the Plan area, notably in terms of significant differences among the boroughs in supply of industrial land where waste uses are generally more acceptable.

~~4.7~~4.8 Three existing sites are known to be planning capacity expansion or upgrades to existing facilities (see Section 8). Most other existing sites do not have any current plans to expand capacity or change their operations but the North London Boroughs support, in principle, the expansion or intensification of operations at existing facilities and this is reflected in Policy 1. Further guidance for industrial intensification is set out in draft New London Plan Policies E4-E7.

B Seek a geographical spread of waste sites across North London, consistent with the principles of sustainable development.

~~4.8~~4.9 The NLWP is underpinned by an aim to achieve net self-sufficiency for LACW, C&I, C&D waste streams, including hazardous waste. This will be achieved by identifying enough existing capacity and land in North London suitable for the development of new waste management facilities to manage the equivalent of 100% of this waste arising in North London. The objective is to reduce movements of waste, including waste exports, and increase the amount of waste managed in proximity to its source, in accordance with the principles of sustainable development. Waste is exported to a number of areas outside of North London, mainly in the south east and east of England and Figure 12 shows ~~the~~ estimated ~~reduction of~~ waste exports to landfill over the plan period. The strategy for achieving net self-sufficiency is set out in the Provision for North London's Waste to 2032 in section 7.

~~4.9~~4.10 Net self-sufficiency does not mean that the North London Boroughs will deal solely with their own waste, nor promote use of the very closest facility to the exclusion of all other considerations. While it is desirable for waste to be treated as close as possible to its source in line with the proximity principle, the complexity of the waste management business poses challenges. Different types of waste require

different types of management and facilities need to serve areas large enough to be economically viable. Consequently, the most suitable facility may not be the nearest and may well be outside of North London. In addition, facilities in North London will continue to manage waste from outside the area.

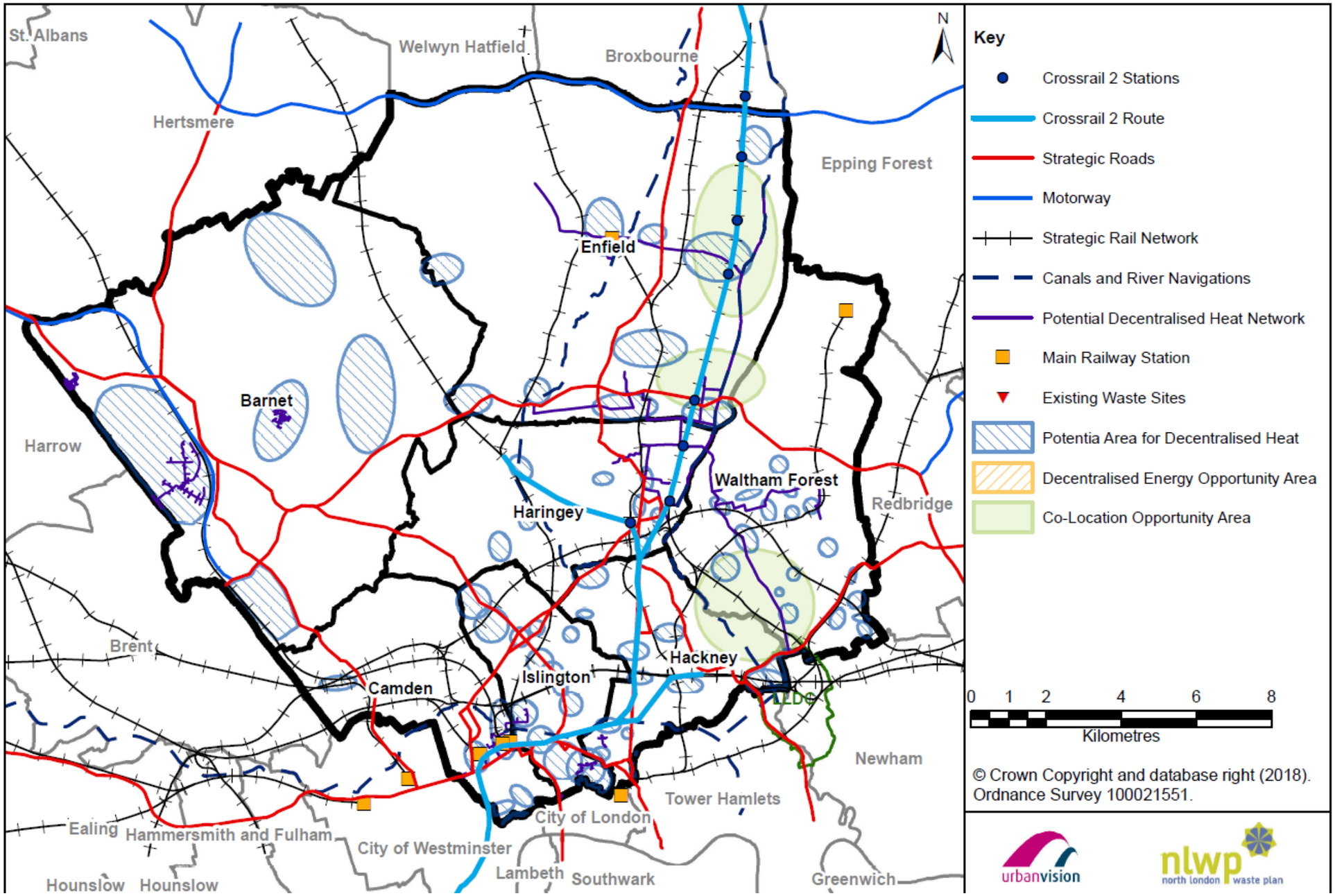
~~4.10~~4.11 The current and changing character of each borough's industrial land is a consideration in identifying locations for new waste infrastructure. It should be noted that the draft New London Plan identifies Enfield as a 'provide capacity' borough for the management of industrial floorspace capacity, and the other six North London Boroughs are identified as 'retain capacity' boroughs. Larger and co-located facilities are more suited to areas with similar existing uses away from sensitive receptors. A future waste industry focused on resource management may derive positive cumulative impacts from a concentration of facilities. Conversely, the urban environments of NLWP boroughs are restricted by severe physical constraints limiting opportunities for some types of waste facilities. In addition, ~~some areas, such as~~ most waste facilities would be regarded as inappropriate development in the protected Green Belt in the north, will be largely out of bounds for any built waste facilities unless very special circumstances justifying the use of Green Belt land have been demonstrated. As population and densities in the plan area increase with projected growth, fewer areas away from sensitive receptors will be available. Continued development of waste facilities in areas which have, and continue to provide, significant waste capacity could have wider implications on the regeneration of the local economy. When choosing locations for future development, the benefits of co-location will need to be balanced against the cumulative impacts which can arise from an accumulation of facilities in one location. Cumulative impacts can include traffic levels, noise and odours. There may be times when the cumulative impacts of several waste developments operating in an area would be considered unacceptable. Any new waste development proposed in North London will be expected to be of a standard that is in keeping with and complements the existing and future planned development. By identifying suitable land across North London (Policy 2), the NLWP seeks to provide opportunities to manage waste as close to its source as possible, in line with the proximity principle. In promoting a geographic spread of facilities across the plan area consistent with the principles of sustainable development, the NLWP seeks to weigh the positive effects of co-location and economies of scale with the negative effects of excessive concentration of waste facilities in any one area. All North London Boroughs want to play their part in managing north London's waste and therefore support an equitable geographical distribution across the seven Boroughs.

~~4.11~~4.12 Policy 2 seeks to extend the existing spread of locations for waste facilities by identifying locations which are suitable for new waste facilities, taking into account factors such as the character of different areas, changing land uses and availability of suitable industrial land. Where demand arises, opportunities to improve the spread

of waste sites across the area are supported through Policy 3: Windfall Sites where they adhere to the site assessment criteria set out in section 8.

~~4.12~~4.13 With local re-use and recycling centres (RRC) it is especially desirable to have a geographical spread that enables good access to residents. RRCs are facilities to which the public can bring household waste for free. Figure 7 shows the current network of local RRCs and a radius of two miles around them. Gaps in coverage have been identified by the NLWA in parts of the Plan area, namely Barnet and Enfield, shown outside of the two mile radius around each RRC. Any new RRC facilities will be assessed against Policy 4: Re-use and Recycling Centres.

Figure 6: Key diagram



C. Encourage co-location of facilities and complementary activities

~~4.13~~4.14 NPPW requires waste plans to identify opportunities to co-locate facilities together and with complementary activities, including end users of waste outputs such as users of fuel, low carbon energy/heat and recyclable wastes. These opportunities are also associated with a move towards a more circular economy. WRAP defines the Circular Economy as *an alternative to a traditional linear economy (make, use, dispose) in which we keep resources in use for as long as possible, extract the maximum value from them whilst in use, then recover and regenerate products and materials at the end of each service life*[7]. The European Commission has published its Circular Economy package[8], while in London the London Waste and Recycling Board has published a Circular Economy route map[9].

~~4.14~~4.15 There are several benefits of co-location of facilities. Co-location has the potential to minimise environmental impacts, take advantage of 'economies of scale', share infrastructure, existing networks (e.g. the rail and highway network) and skilled workforces. The concentration of waste facilities in the Lee Valley corridor provides the most promising opportunities for co-location with existing facilities. Notwithstanding this, NPPW requires the Plan to take account of the cumulative impact of existing and proposed waste disposal facilities on the well-being of the local community.

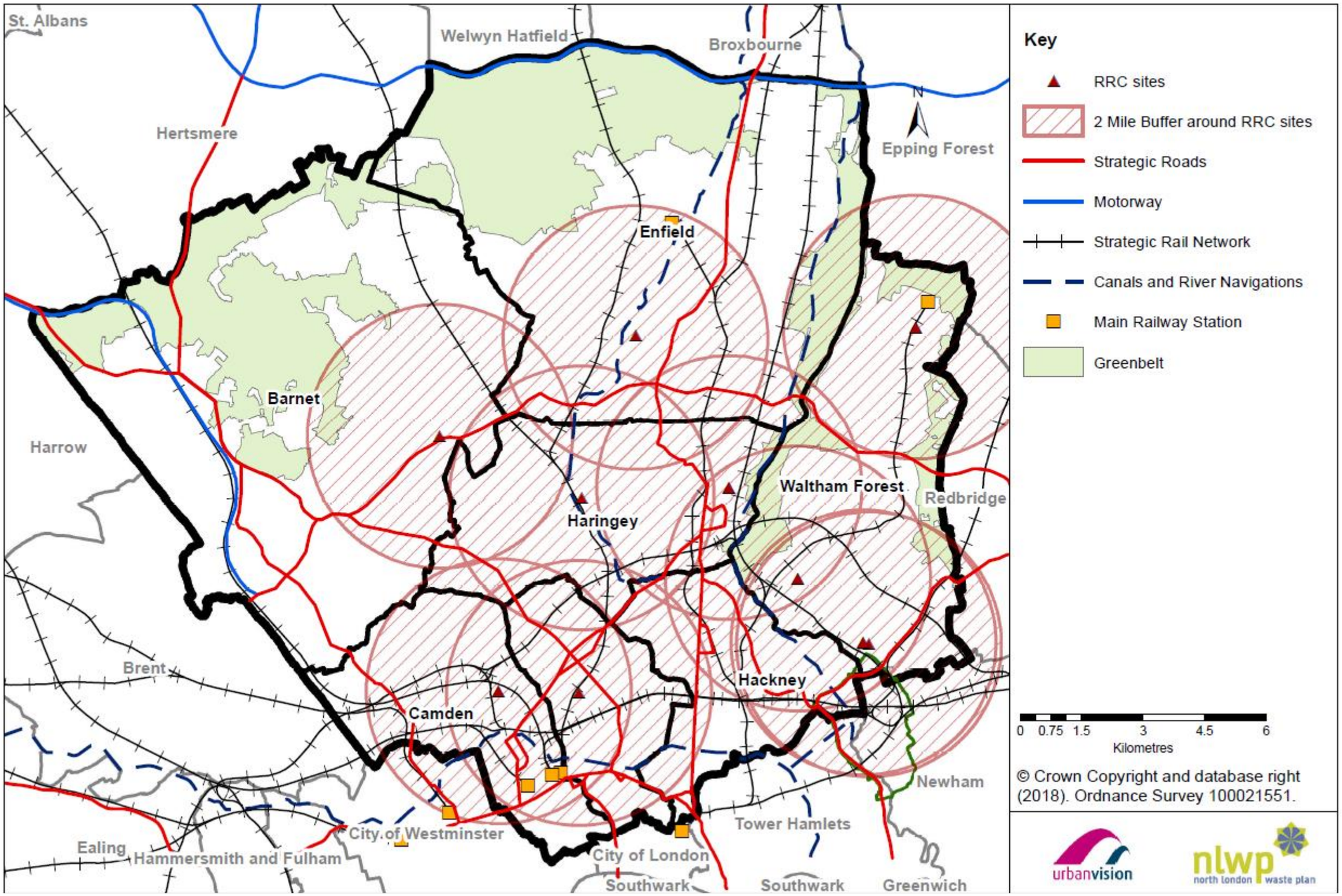
~~4.15~~4.16 There are also co-location opportunities related to other industrial activities synergistic with waste management, for example the manufacturing of products from recycled materials and the development of a more circular economy. Existing waste facilities are already employing this approach as exemplified by the industries developing around the Edmonton EcoPark (Enfield) and the Plan seeks to build on the momentum by supporting this approach as a key element of the spatial framework and identifying which areas have potential for co-location. Co-location of industrial and non-industrial uses at Strategic Industrial Locations (SIL) is not supported, in line with draft New London Plan policy E5.

~~4.16~~4.17 Opportunity Areas, Housing Zones and the route of Crossrail 2 could also be factors when considering co-location of facilities. These schemes are likely to intensify development, especially near to stations, and there are both resulting opportunities and threats for existing waste facilities and land identified as suitable for waste uses. The opportunities include waste facilities supplying energy to new developments and new waste facilities being incorporated into the schemes, for

[7] http://www.wrap.org.uk/content/wrap-and-circular-economy
[8] Circular Economy Package http://ec.europa.eu/environment/circular-economy/index_en.htm
[9] https://www.lwarb.gov.uk/what-we-do/circular-london/circular-economy-route-map/

example an anaerobic digestion facility to deal with household food waste, and consolidation or relocation of waste uses. Risks include new uses displacing waste facilities due to

Figure 7: Current Re-use and Recycling Centres (RRC) in North London



incompatibility or impacts of construction. Protection for waste capacity through safeguarding, the agent of change principle and re-provision policies in the London Plan, Local Plans and NLWP Policy 1 will be a key policy tool under these circumstances.

D. Provide opportunities for decentralised heat and energy networks

~~4.17~~4.18 The NPPW recognises the benefits of co-location of waste facilities with end users of their energy outputs. The London Plan (March 2016) supports developments that contribute towards renewable energy generation and seeks opportunities for the ~~development~~ provision of combined heat and power ~~systems~~ and cooling ~~provision of~~ heat and power to surrounding consumers. The draft New London Plan (July 2019) Policy S18 encourages proposals for materials and waste management sites where they contribute towards renewable energy generation and/or are linked to low emission combined heat and power and/or combined cooling heat and power (CHP is only acceptable where it will enable the delivery or extension of an area-wide heat network consistent with Policy S13 Part D1e). The same policy requires facilities generating energy from waste to meet, or to demonstrate that steps are in place to meet in the near future, a minimum performance of 400g of CO2 equivalent per kilowatt hour of electricity produced.

~~4.18~~4.19 The Key Diagram (Figure 6) shows where facilities could connect to a network ('decentralised heat opportunity area' and 'decentralised energy opportunity area'). There is already a relatively well-advanced plan for decentralised heat network in the Lee Valley and this offers the most promising and realistic possibility within the Plan area. The NLWP supports opportunities to develop combined heat and power networks on sites and areas, within the Lee Valley, south Barnet and elsewhere (see Figure 6), that not only have the ability to link in to the decentralised energy network but also have the potential for waste development with Combined Heat and Power. Policy 6 seeks to secure opportunities for the recovery of energy from waste where feasible.

E. Protect local amenity

~~4.19~~4.20 The protection of amenity is a well-established principle in the planning system. The NPPW requires the Boroughs to consider the likely impact on the local environment and on amenity when considering planning applications for waste facilities. Amenity includes aural (noise) and visual amenity such as open space, flora, and the characteristics of the locality including historic and architectural assets. Negative amenity impacts also include odour arising from the processing and type of waste being managed.

~~4.20~~4.21 The site selection criteria set out in section 8 effectively direct waste management development to the most suitable sites/areas taking into account environmental and physical constraints, including locations where potential amenity impacts can be mitigated to an acceptable degree as well as considering cumulative impacts of additional waste facilities in already well developed areas and areas with a history of waste development. All proposed sites and areas have been subject to assessment in the Sustainability Appraisal and the Habitats Regulation Assessment and the findings fed into the policy recommendations

~~4.21~~4.22 The protection of local amenity has been considered during the assessment of sites/areas to identify those suitable for inclusion in the NLWP. Policy 5 sets out assessment criteria for waste management facilities and deals with protection of local amenity including information requirements to support applications for waste facilities. The policy's presumption for enclosed as opposed to open air facilities is also important to the application of this principle in terms of air quality and protecting the health of residents.

~~4.22~~4.23 As outlined within Policy 1, proposals for expansion or intensification of existing waste uses should not unacceptably harm the amenity of occupiers of any existing developments. The onus will be upon the developer of the new proposed development to ensure appropriate mitigation measures are put in place under the agent of change principle.

~~4.23~~4.24 Policy 3 seeks to ensure that proposals for waste management facilities do not constrain areas undergoing development change, such as new transport or economic regeneration initiatives.

F. Support sustainable modes of transport

~~4.24~~4.25 The NPPW and the London Plan require Boroughs to identify sites/areas with the potential to utilise modes of transport other than road transport. As Figure 6 shows, North London is well served by road, rail and waterway networks and waste is currently transported into, out of and around North London by both road and rail. But like many industry sectors, road is the main mode of transport for the movement of waste. There are potential opportunities for waste sites to better utilise sustainable modes of transport such as rail and waterways. Movement of waste via more sustainable transport methods is duly supported in line with Objective 7, although this may not always be practicable, especially when costs associated with investment in wharfs and rail sidings and other infrastructure which may be necessary before waste can be moved along the canal or rail network may not be economically viable, especially for smaller facilities. North London currently has one rail linked waste site (at Hendon) supporting the requirements of the NLWA, however this site is due to be redeveloped as part of the Brent Cross Cricklewood regeneration project and the NLWA's need for this railhead has changed. This is

reflected in the new replacement waste transfer station (approved by Barnet Council in September 2018). A replacement rail based freight facility with a different function was approved as part of the Brent Cross Cricklewood permission granted under F/04687/13.~~There is a planning application for replacement rail based depot with a different function under consideration.~~ There is also a wharf on the Lee Navigation which potentially could provide future opportunities for transportation by water at Edmonton EcoPark.

~~4.25~~4.26 Road transport will continue to be the principal method of transporting waste in North London, particularly over shorter distances where this is more flexible and cost effective. Access to transport networks including sustainable transport modes was considered when assessing the suitability of new sites and areas. Rail and road transport is particularly desirable when waste is travelling long distances. Policy 5 considers sustainable transport modes in planning decisions.

5. Current waste management in North London

5.1 This section looks at the current picture of waste management in North London, including the amount of waste generated; the current capacity, types and location of facilities; how each waste stream is managed, key targets and cross-boundary movements of waste.

North London Waste Data Study

5.2 The Waste Data Study was prepared in July 2014 and updated in July 2015 to inform the Draft NLWP. A further update in 2018 accompanies this Proposed Submission Plan. All versions of the Data Study are available to view on NLWP website (www.nlwp.net). The Waste Data Study is in three parts as shown below, with the date of the most recent version provided in brackets:

- Part One: North London Waste Arisings (2018)
- Part Two: North London Waste Capacity (2018)
- Part Three: North London Sites Schedule (2018)

5.3 The Waste Data Study includes the following information for the seven waste streams for which the NLWP plans:

- The amount of waste currently produced in North London;
- How and where the waste is managed;
- The capacity of existing waste infrastructure;
- The waste management targets the NLWP will support; and
- The amount of waste projected to be produced over the plan period (up to 2035) and the extent to which existing facilities can meet this future need.

Waste generated in North London

5.4 Table 2 below shows the amount of waste generated in North London for the main waste streams using the latest data from 2016. Waste arisings vary from year to year and these figures represent a snapshot in time. Figure 8 shows the proportion of each waste stream as a percentage of the total waste in North London[10].

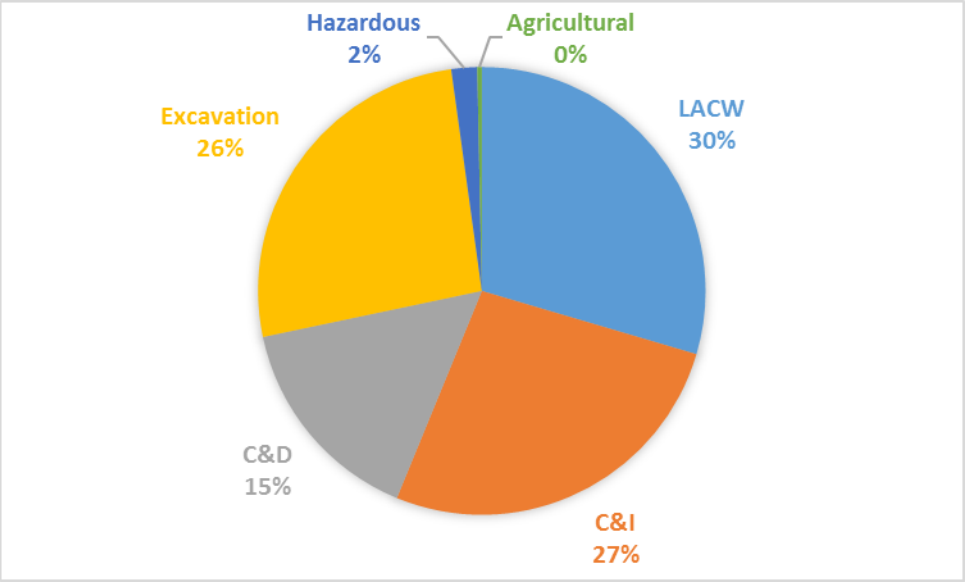
[10] The data is taken from the Waste Data Study (2016)

Table 2: Amount of Waste Generated in North London, 2016

Local Authority Collected Waste (LACW)	845,776
Commercial and Industrial Waste (C&I)	762,301
Construction and Demolition Waste (C&D)	443,180
Agricultural Waste	9,223
Hazardous waste	54,420
Excavation Waste	747,242
TOTAL	**2,861,062**

Source: North London Waste Data Study Update 2016

Figure 8: Waste arisings in North London 2016



Source: North London Waste Data Study Update 2018

Existing facilities

5.5 Table 3 below shows the existing (2018) waste management facilities in North London by type and waste stream managed and changes in available capacity at known dates when facilities come on stream/close. It identifies an existing waste management capacity of around 4.4 million tonnes per annum, reducing to around 3.8 million tonnes by 2035~~29~~ as a result of known closure of some existing sites up to

2028[11]. Figure 9 shows the location of the facilities represented in Table 3 and a full list is in Appendix 1.

Table 3: Maximum Existing Annual Capacity at Licensed Operational Waste Management Facilities at the Start of the Plan Period and a key dates following changes in sites capacities

WasteCatID	FacilityID	2018	2026	2029	2035
LACW only	Transfer stations (non-hazardous)	621,222	416,864	416,864	416,864
LACW only	Household Waste Recycling Site	100,204	100,204	100,204	100,204
LACW only	Composting	35,241	0	0	0
LACW only	Recycling (MRFS)	276,855	276,855	276,855	276,855
LACW only	Incineration with Energy Recovery	550,000	0	0	0
LACW and CI	Transfer stations (non-hazardous)	206,748	206,748	206,748	206,748
LACW and CI	Incineration with Energy Recovery	0	700,000	700,000	700,000
LACW, CI and CDE	Transfer stations (non-hazardous)	26,545	26,545	26,545	26,545
LACW, CI and CDE	Recycling (MRFS)	16,277	16,277	16,277	16,277
CI only	Transfer stations (non-hazardous)	288	288	288	288
CI only	Recycling (MRFS)	54,632	54,632	54,632	54,632
CI only	Treatment facility	2,332	2,332	2,332	2,332
CI only	Treatment facility (Hazardous)	64,132	64,132	64,132	64,132
CI and CDE	Transfer stations (non-hazardous)	236,245	119,050	119,050	119,050
CI and CDE	Recycling (MRFS)	432,538	432,538	432,538	432,538
CDE only	Transfer stations (construction & demolition)	364,097	328,014	328,014	328,014
CDE only	Recycling (aggregates, other C and D)	980,780	746,840	627,876	627,876
Hazardous	Transfer stations (hazardous)	5	5	5	5
Hazardous	Treatment facility	3,622	3,622	3,622	3,622

[11] Some of the planned closures include sites affected by the redevelopment of Brent Cross. It is expected that Barnet will identify new sites for the relocation of these sites in line with the Planning Permission for this development

	(Hazardous)				
CI Specialist	Treatment facility	112,419	112,419	112,419	112,419
CI Metals	Recycling (ELVs)	362	362	362	362
CI Metals	Recycling (Metals)	318,522	318,522	318,522	318,522
CI Metals	WEEE	18,657	18,657	18,657	18,657

~~Waste stream~~	~~Facility Type~~	~~2018~~	~~2026~~	~~2029~~
~~LACW only~~	~~Transfer stations (non-hazardous)~~	~~621,222~~	~~416,864~~	~~416,864~~
~~LACW only~~	~~Household Waste Recycling Site~~	~~100,204~~	~~100,204~~	~~100,204~~
~~LACW only~~	~~Composting~~	~~35,241~~	~~0~~	~~0~~
~~LACW only~~	~~Recycling (MRFS)~~	~~276,855~~	~~276,855~~	~~276,855~~
~~LACW only~~	~~Incineration with Energy Recovery~~	~~550,000~~	~~0~~	~~0~~
~~LACW and CI~~	~~Transfer stations (non-hazardous)~~	~~206,748~~	~~206,748~~	~~206,748~~
~~LACW and CI~~	~~Incineration with Energy Recovery~~	~~0~~	~~700,000~~	~~700,000~~
~~LACW, CI and CDE~~	~~Transfer stations (non-hazardous)~~	~~26,545~~	~~26,545~~	~~26,545~~
~~LACW, CI and CDE~~	~~Recycling (MRFS)~~	~~16,277~~	~~16,277~~	~~16,277~~
~~CI only~~	~~Transfer stations (non-hazardous)~~	~~288~~	~~288~~	~~288~~
~~CI only~~	~~Recycling (MRFS)~~	~~54,632~~	~~54,632~~	~~54,632~~
~~CI only~~	~~Treatment facility~~	~~2,332~~	~~2,332~~	~~2,332~~
~~CI only~~	~~Treatment facility (Hazardous)~~	~~64,132~~	~~64,132~~	~~64,132~~
~~CI and CDE~~	~~Transfer stations (non-hazardous)~~	~~236,245~~	~~119,050~~	~~119,050~~
~~CI and CDE~~	~~Recycling (MRFS)~~	~~432,538~~	~~432,538~~	~~432,538~~
~~CDE only~~	~~Transfer stations (C&D)~~	~~364,097~~	~~328,014~~	~~328,014~~
~~CDE only~~	~~Recycling (aggregates, other C&D)~~	~~980,780~~	~~746,840~~	~~627,876~~
~~Hazardous~~	~~Transfer stations (hazardous)~~	~~5~~	~~5~~	~~5~~
~~Hazardous~~	~~Treatment facility (Hazardous)~~	~~3,622~~	~~3,622~~	~~3,622~~
~~CI Specialist~~	~~Treatment facility~~	~~112,419~~	~~112,419~~	~~112,419~~
~~CI Metals~~	~~Recycling (ELVs)~~	~~362~~	~~362~~	~~362~~
~~CI Metals~~	~~Recycling (Metals)~~	~~318,522~~	~~318,522~~	~~318,522~~
~~CI Metals~~	~~WEEE~~	~~18,657~~	~~18,657~~	~~18,657~~
	Total Capacity	**4,421,723**	**3,944,906**	**3,825,942**

5.6 When considering the overall amount of waste generated identified in Table 2 against the current capacity of waste management facilities in North London identified in Table 3, there appears to be more than enough waste management capacity. However, this does not take into account the specialism of each type of

facility or importantly, since North London is a net exporter of waste in terms of tonnage, imports to and exports from the area.

5.7 Some facilities in North London have a wider-than-local catchment area and manage waste from outside North London. This includes recycling and treatment facilities, in particular metal recycling and end of life vehicle (ELV) facilities as well as facilities for the processing of CDE in to recycled aggregate products for resale. The extra capacity contributes to achieving net self-sufficiency, or managing the equivalent of the overall quantity of waste within the main categories for North London and London as a whole.

5.8 Conversely, North London does not have all the types of facilities necessary to manage all the sub-types of waste arising within the main categories shown in Table 2**.** For example, there are few hazardous waste facilities and no landfill sites in North London. North London will therefore need to identify sufficient capacity to manage the equivalent amount of this exported waste within its boundary.

Local Authority Collected Waste

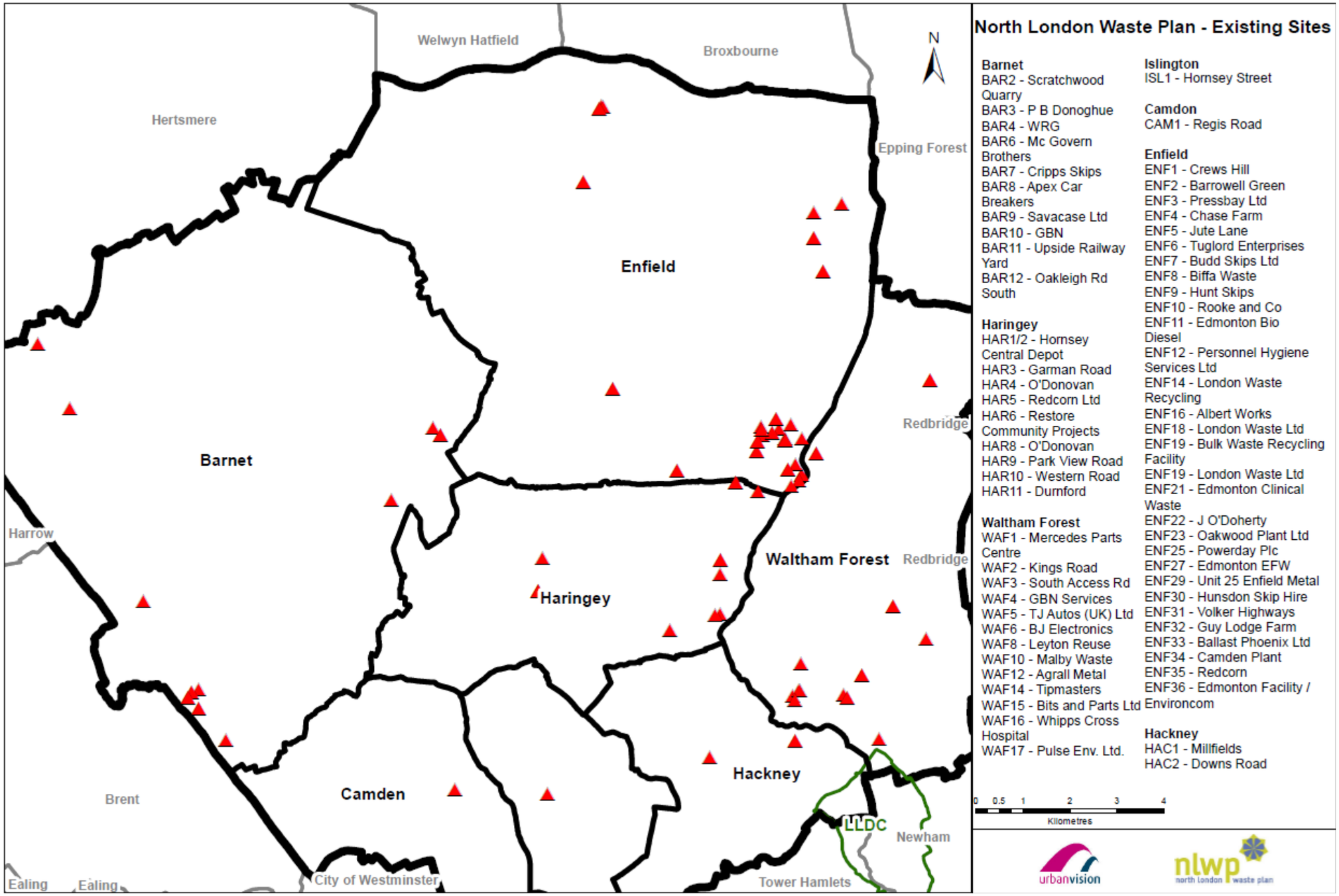
5.9 In North London, around 850,000 tonnes of LACW was collected in 2016/17[12]. Of this, approximately 26% was recycled, reused or composted. Of the remaining LACW, 60% was sent to NLWA's energy-from-waste facility at Edmonton and 12% was sent to landfill outside of North London.

5.10 The NLWA has reported an increase in recycling performance from 23% in 2006/7 to 32[13]% by 2017/18 This is lower than the national average of 43.7% but in line with the London average of around 33%. There are a number of factors which contribute towards lower recycling rates in London than the country as a whole. These include: rapid population growth; a greater transient population than anywhere else in the UK; the greater proportion of flats compared to houses which presents challenges for setting up collection systems for recyclable waste; and proportionately fewer gardens generating lower level of green waste for recycling.

[12] Figures NLWA Annual Monitoring Report 2016-17

[13] North London Waste Authority Annual Report 2017/18

Figure 9: Existing Waste Sites



5.11 The North London Boroughs and the NLWA are committed to achieving the 50% recycling target set out in the Joint Municipal Waste Management strategy and the Mator's Environment Strateg~~London Plan~~. The North London Boroughs, together with the NLWA, are beginning a renewed drive to increase recycling including looking at ways to standardise collection regimes. In addition, the London Waste and Recycling Board (LWARB) works with London Boroughs to increase recycling rates and supports waste authorities in improving waste management services.

5.12 The NLWA's long term waste management solution is based upon the continued use of the existing Edmonton facility until 2025 and the development of a new energy recovery facility on the same site to be operational from 2025 onwards. Further information on how it has informed the NLWP is set out in section 8.

5.13 The European Commission has put forward a Circular Economy Package'[14]. This includes a 65% recycling target for municipal waste (LACW and C&I) by 2030. Notwithstanding the UK leaving the EU, the UK has signed up to delivering these targets as part of Brexit. The Circular Economy Package (CEP) recycling target of 65% municipal waste by 2030 has been superseded by the London Environment Strategy (LES) published in May 2018 in time to be incorporated into the NLWP. The LES aims to achieve 65% recycling from London's municipal waste by 2030; this will be achieved through a 50% recycling rate from LACW by 2025 (LES Policy 7.2.1) and 75% from business waste by 2030 (LES policy 7.2.2). The LES therefore goes further than the CEP by bringing forward London's LACW recycling target to 2025. The LES states that the Mayor expects waste authorities to collectively achieve a 50 per cent LACW recycling target by 2025 and aspire to achieve 45% household waste recycling by 2025 and 50% by 2030. Responsibility falls largely to London Boroughs in their capacity as waste collection and waste disposal authorities. The NLWA are expected to contribute to the Mayor's targets and produce a waste strategy to show they are acting in conformity with the LES policies and proposals (see LES Box 36). ~~These revised targets have been built into NLWP waste modelling work as part of the revisions to the Data Study, however the new targets have only been applied to C&I waste as it is assumed no change to the projections of the NLWA at this time.~~

5.14 Waste minimisation seeks to reduce the amount of waste produced by targeting particular behaviours and practices. As shown in Figure 5 in section 3, preventing waste generation in the first place sits at the top of the waste hierarchy.

5.15 The London Environment Strategy prioritises resource efficiency to significantly reduce waste and promotes reuse and repair. LWARB's 'Circular Economy route

[14] European Commission Circular Economy Package http://ec.europa.eu/environment/circular-economy/index_en.htm

map' exemplifies a move towards a more resource efficient waste service. The route map builds on the 5 focus areas (the built environment, food, textiles, electricals and plastics) and sets out 8 cross cutting themes to ensure the benefits of a circular economy can achieved across a number of sectors.

5.16 The North London Boroughs co-ordinate waste prevention activity through the NLWA's waste prevention plan. The NLWA run waste minimisation activities for schools and communities. These are delivered through the NLWA's "Wise up to Waste" programme and currently focuses on three priority areas: reducing food waste, encouraging a reduction of furniture waste by increasing re-use, and reducing textile waste (both clothing and non-clothing).

Commercial and Industrial Waste

5.17 The Waste Data Study has used two methods to identify and project C&I waste. The first is to use data from the Defra C&I Waste Survey 2009 in line with the London Plan to assess the management routes of North London's C&I waste. The second is to use the new method for calculating C&I waste as introduced following the withdrawal of the Defra C&I surveys which uses published data from the EA's WDI. This new method of calculation indicates that 44% of C&I waste is recycled, reused or composted while 33% of this waste stream is sent to landfill and land recovery. A small proportion (6%) of C&I is sent for non thermal treatment with the remainder (17%) sent for thermal treatment with energy recovery. It should be noted that potential reliance on landfill will drop to 10% by 2030 in order to achieve EU statutory targets with recycling and reuse levels increasing to 65%.

5.18 Through the London Environment Strategy, the Mayor is seeking to make London a zero waste city with no biodegradable or recyclable waste sent to landfill by 2026~~2030~~ and by aiming to achieve 65% recycling from London's municipal waste by 2030~~,~~; this will be achieved through a 50% recycling rate from LACW by 2025 (Policy 7.2.1) and 75% from business waste by 2030 (policy 7.2.2). This is a collective target across the whole of London. The Mayor has also said that he does not expect there to be a need for any new energy from waste capacity if existing planned sites are completed (policy 7.3.2.b). The Mayor has also indicated that he will use his powers to ensure there are sufficient sites to manage London's waste. The Environment Strategy embraces the ideals of the Circular Economy requiring manufacturers to design products to generate less waste and which can be easily repaired, reused and recycled, and the strategy encourages the development of business to facilitate this.

5.19 There are a number of national schemes which promote waste minimisation. This includes the Courtauld Commitment which aims to reduce food waste, grocery packaging and product waste, both in the home and the grocery sector by 20%, the

Mayors Environment Strategy seeks to go further by setting a target of 50% reduction per head by 2030.

5.20 European Commission Circular Economy Package[15] include increased recycling targets for packaging materials in the commercial and industrial sectors of 65% by 2025 and 75% by 2030. The UK has committed to delivering the Circular Economy targets as part of Brexit.

Construction, Demolition and Excavation Waste

5.21 Local planning policies and development industry practice mean a lot of C&D material is managed on site and does not enter the waste stream. A total of 443,180 tonnes of C&D waste and 747,243 tonnes of excavation waste was produced in North London in 2016. The largest proportion of C&D waste arising in North London is managed via recycling (73%) and treatment (20%) facilities, with 7% sent directly to landfill. Recycling rates of C&D waste are high due to the nature and value of the material. Excavation materials are primarily disposed of directly to landfill (53%) with the remainder managed through transfer stations (28%) or sent for treatment (19%). The draft New London Plan(July 2019) includes a target of 95% reuse/recycling/recovery of C&D waste and 95% beneficial use of excavation waste.~~CD&E by 2020~~.

Hazardous Waste

5.22 ~~F~~A total of 53,420 tonnes of hazardous waste was produced in 2016, of this waste 40% was managed at treatment facilities, of which the majority was exported for treatment outside of North London. The next most common method of management was recovery (20%), with a further 16% being managed at landfill. Of the total hazardous waste arisings, 53,107 tonnes (99.4%) of waste was exported out of North London for management. It is not unusual for hazardous waste to travel outside the area to specialist facilities which tend to have a wider catchment area.

5.23 There are a number of initiatives in place to ensure better implementation of EU waste legislation, including on hazardous waste. None of the circular economy proposals referred to 5.13 announced by the European Commission in December 2015 will affect the NLWP strategy for hazardous waste.

[15] http://ec.europa.eu/environment/circular-economy/index_en.htm

Agricultural Waste

5.24 A total of 9,223 tonnes of Agricultural waste was produced in 2016, with only 125 tonnes being identified as being managed off site. The majority of agricultural waste arisings are managed within the limited number of farm holdings within the Plan area, with a very small amount managed offsite through commercial waste facilities. As such, the NLWP does not seek to identify sites for additional facilities to manage this waste stream; any facilities which do come forward on farm land would be considered against Policy 3 'Windfall sites'.

Low Level Non-Nuclear Radioactive Waste

5.25 The very small amount of Low Level Non-Nuclear Radioactive Waste (LLW) arising in North London, mainly from hospitals, is currently managed outside of the area in specialist facilities. Records of LLW in the sub-region indicate that there are currently 16 sites producing LLW as waste water, with a number of the amounts generated being below the reporting threshold, which is measured in terms of radioactivity.

Waste Water and Sewage Sludge

5.26 Waste Water Treatment Works in North London are operated by Thames Water. The main Thames Water Waste Water/sewage treatment facility in North London is Deephams Sewage Treatment Works (STW), which is the ninth largest in England. The site is to be retained and improved for waste water use and planning permission has been granted for an upgrade to the effluent ~~sewage sludge~~ treatment stream. Thames Water anticipates that the recently constructed ~~approved~~ upgrade to Deephams STW will provide sufficient effluent treatment capacity to meet their needs into the next decade ~~during the plan period~~. However, this will be reviewed in future AMP periods to ensure ongoing capacity in relation to population growth. Further details can be found in section 8.

Cross Boundary Movements (exports and imports)

5.27 In 2016, 1,201.964 tonnes of waste was recorded as exported from North London, 675,788 tonnes ~~56%~~ of which went to landfill. Most of the waste deposited to landfill was excavation waste (65%) followed by LACW/C&I (35%). Exports of LACW to landfill ~~in the LACW/C&I category~~ have been steadily declining in recent years, ~~however an increase was shown in 2016. This is consistent with~~ in line with the waste strategies of the London Mayor and the North London Waste Authority which aim to reduce the amount of waste going to landfill. Therefore the increase in 2016 of exports to landfill in this category can probably be attributed to commercial and industrial waste, although the datadoes not identify why this has occurred. Data for hazardous waste exports to landfill is shown from both the Waste Data Interrogator

(WDI) and the Hazardous Waste data Interrogator (HWDI). The HWDI is the more accurate of the two for hazardous waste, but the total exports to landfill figure is taken from the WDI only. Exports of CD&E waste generally follow patterns of waste arising, so when more CD&E waste is generated, more is exported. This pattern is shown in Table 4 and Figure 10 below.

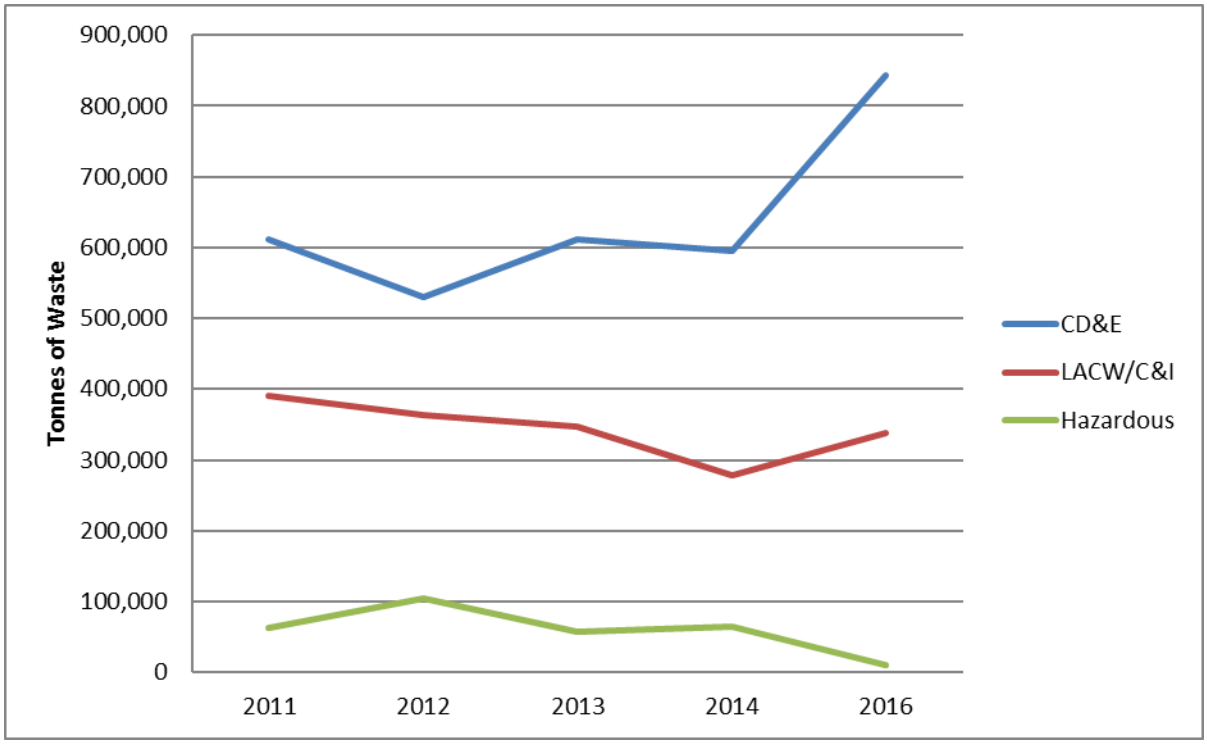
Table 4: Waste recorded as exported from North London to landfill 2011-2016

~~Type of waste~~	~~2011~~	~~2012~~	~~2013~~	~~2014~~	~~2016~~
~~CD&E~~	~~610,864~~	~~530,025~~	~~611,902~~	~~595,203~~	~~843,856~~
~~LACW/C&I~~	~~390,226~~	~~362,950~~	~~347,206~~	~~278,050~~	~~337,836~~
~~Hazardous~~	~~62,473~~	~~103,884~~	~~58,216~~	~~64,193~~	~~10,352~~
~~Total~~	~~1,063,563~~	~~996,859~~	~~1,017,324~~	~~937,446~~	~~1,201,964~~

Type of Waste	2011	2013	2016
Excavation	409,311	249,701	437,480
LACW/C&I	322,501	182,599	235,506
C&D	44,446	194,780	1,636
Hazardous (WDI)	929	6,727	1,166
Hazardous (HWDI)	6,524	7,449	8,568
Total exports to landfill	777,187	633,807	675,788
Total exports to all facilities	1,063,563	1,017,324	1,201,964
Total arisings	2,428,709	2,640,862	2,815,783

Source: Waste Data Interrogator (WDI) and Hazardous Waste Data Interrogator (HWDI)

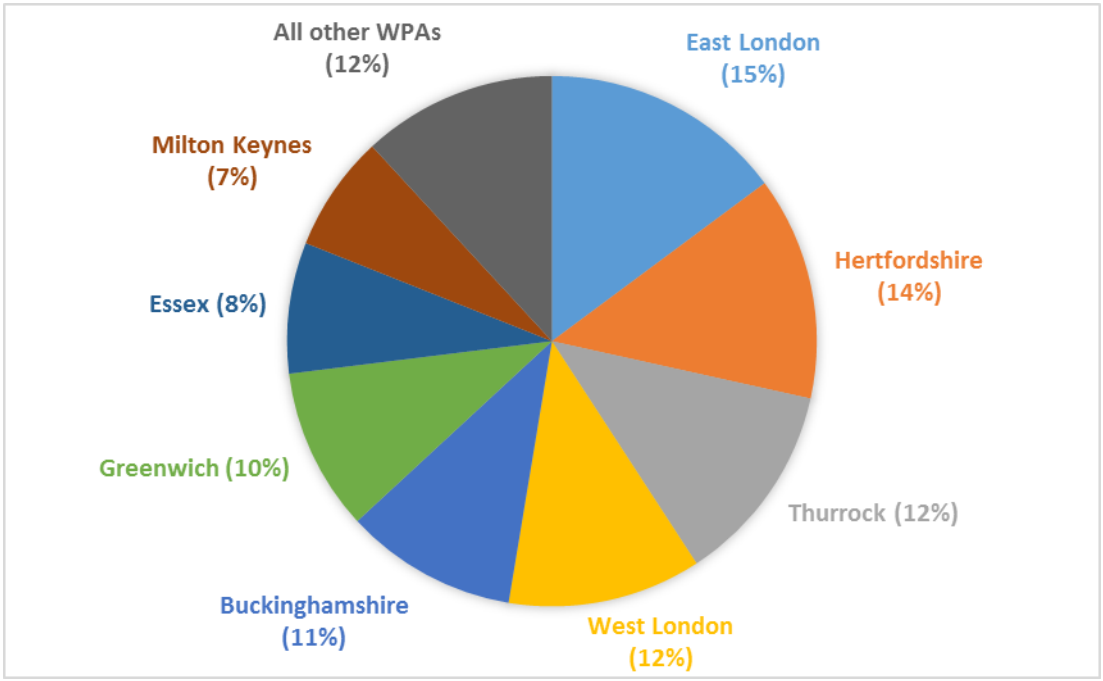
Figure 10: Waste recorded as exported from North London to landfill 2011-2016



Source: WDI 2011-2016

5.28 During 2013-2016 waste exports from North London were deposited in more than 70 different waste planning authority areas but the majority (88%) went to eight main destinations. These are shown in the Figure 11 below:

Figure 11: Distributions of Waste Exports from North London



Source: WDI 2013-2016

5.29 In 2016, around 1 million tonnes of waste was imported in to North London. Most of the imported waste comes from immediate neighbours in Greater London, the South East and East of England and is managed in transfer stations, treatment facilities and metal recycling sites

5.30 As part of discharging the 'duty to co-operate', the North London Boroughs have contacted all waste planning authorities (WPA) who receive waste from North London to identify any issues which may prevent waste movements continuing during the plan period. A Report on the duty to co-operate, issues identified and next stages accompanies this Plan and is available on the NLWP website.

5.31 Engagement to date has identified a constraint to the continuation of waste exports to landfill from North London relating to the scheduled closure of landfill sites during the plan period. Details can be found in the paper, Exports to Landfill 2017-2035, on the NLWP website (www.nlwp.net), though the operation of some of these sites may be extended beyond their currently permitted end date. The destination of waste is largely dependent on market forces and therefore it is not possible to identify specific alternative destinations where North London's waste will go after the closure of landfill sites during the plan period. The boroughs will continue to monitor this information ~~throughout the preparation of the NLWP, and~~ after the NLWP ~~it~~ is adopted as reflected in the monitoring framework in section 10.

5.32 ~~Nonetheless, as set out in the exports to landfill paper, alternative capacity at other potential destinations has been identified for the amount of waste currently being exported to those sites earmarked for closure during the plan period.~~ It is recognised that non-hazardous landfill capacity in the wider south east is declining an no new non-hazardous landfill sites are being put forward by waste operators. A small number of new inert waste sites are being put forward in former mineral works. The lack of landfill capacity in the wider south east is an issue for all WPAs preparing plans and there is a continuing need to plan to manage waste further up the waste hierarchy to help reduce the need for landfill capacity. ~~The paper shows that~~ T~~t~~here ~~are both~~ is opportunity for the market to find alternative destinations ~~sites and adequate void space~~ in London, South East and East of England for~~to take~~ North London's 'homeless' waste in the short term~~between 2018 and 2035~~. ~~-~~In the longer term, beneficial use of excavation waste and the Circular Economy Statements will asisist the North London Boroughs to reduce exports of waste to landfill and monitor the destinations of waste exports.

5.33 A further constraint for the continued export of waste has been identified with regard to hazardous waste, namely a lack of detailed data on where it ends up. This type of waste is managed in specialist facilities which have wide catchment areas and therefore may not be local to the source of the waste. North London has one

hazardous waste treatment facility with a capacity of around 3,600 tonnes per annum and two recycling facilities; one for metals and one for end of life vehicles handling around 2,500 tonnes per annum between them. The treatment facilities handle a small proportion of North London's hazardous waste (less than 1% in 2016) while the rest (99.4%) is exported. In addition, some facilities, whilst not classified as hazardous waste facilities, are permitted to manage a certain amount of hazardous waste alongside non-hazardous wastes. These include car breakers and metal recycling sites, WEEE sites as well as RRCs which will accept, for example, paints and batteries which require specialist treatment and disposal.

5.34 While the export of the majority of hazardous waste to the most appropriate specialist facilities is likely to continue, current data collection methods do not identify the hazardous waste facilities in question. No planning issues have been identified which will prevent North London's hazardous waste continuing to be managed at these specialist facilities. However, ~~T~~the boroughs will continue to monitor ~~engage with the Environment Agency and waste planning authorities in receipt of~~ hazardous waste exports from North London and engage with recipient authorities when and if there are any substantial changes.~~, including seeking to identify any constraints to the continued export of this waste. Should any constraints come to light, such as anticipated closure of a facility, the boroughs will seek to identify potential new destinations with capacity for managing compensatory amounts. The North London Boroughs will pursue agreement on this matter with recipient waste planning authorities through a statement of common ground.~~

5.35 The North London Boroughs will continue to co-operate with relevant authorities on matters of strategic waste planning throughout the preparation of the NLWP and once the Plan is adopted.

6 Future Waste Management Requirements

Context

6.1 In line with the NPPW and the London Plan, the NLWP must identify sufficient waste management capacity to meet the identified waste management needs of North London over the plan period.

6.2 It follows that a key part of the development of the NLWP is to identify how much waste will be produced during the plan period, how this will be managed, what capacity is required and whether there is sufficient capacity already available. The NLWP must also consider how changes in the waste management behaviours, practices and technologies may influence this.

Targets for waste managed within North London

6.3 The North London Boroughs have statutory duties to meet recycling and recovery targets and the NLWP will need to be ambitious in order to achieve European Union, national, regional and local targets. These targets taken from the draft New London Plan (July 2019) are as follows:

Table 5: Recycling and Recovery Targets with 2016 Baseline

Waste stream	Target	2016 baseline
LACW	50% recycling for LACW by 2025 (contributing to 65% recycling of municipal waste by 2030)	29%
C&I	75% recycling by 2030 (contributing to 65% recycling of municipal waste by 2030)	52%
C&D	95% reuse/recycling/recovery ~~by 2020~~	50-60%
Excavation	95% beneficial use	Not known
Biodegradable or recyclable waste	Zero biodegradable or recyclable waste to landfill by 2026	Not known
Hazardous	Included in LACW, C&I and C&D targets	N/A

Options for managing North London's waste

6.4 In accordance with the NPPF (paragraph 35) to ensure the NLWP is justified, a range of options were tested as part of the consideration of reasonable alternatives for managing North London's waste leading to selection of the preferred strategy. The scenarios considered looked at a range of options for recycling from maintaining the status quo to seeking to maximise opportunities for recycling in line with the targets set out in Table 5 above, the latter option being the most popular option and taken forward. Along with this a number of options were also considered in relation to waste growth over the plan period and what impact that would have on waste growth, again 3 approaches were modelled looking at no growth, growth in line with the London Plan (March 2016) for C&I and CDE waste – with LACW growth being in line with that of the NLWA for all options, a minimised growth was also modelled but was not considered in line with the growth planned for in the London Plan (March 2016), as such growth was modelled in line with the London Plan (March 2016). An Options Appraisal Report (2018) has been prepared which provides more detail on each of the options considered and provides information on the different scenarios including how much waste would be generated over the plan period (incorporating economic and population growth assumptions), how much waste could be managed within North London (capacity strategy), and how this waste should be managed (management strategy) for each of the options considered. The preferred option identified in the Options Appraisal[16] has been carried through to the NLWP. The preferred option seeks to achieve growth in line with the London Plan (March 2016) and to deliver the targets set out in the Mayor's Environment Strategy.

Chosen Approach

6.5 The chosen approach for the NLWP following the option appraisal can be summarised as follows:

Chosen Approach for planning for North London's waste

Population/Economic Growth in line with London Plan forecasts

+ Maximising Recycling

+ Net self-sufficiency for LACW, ~~and~~ C&I and C&D by 2026 (including hazardous waste) ~~and C&D by 2035~~

= Quantity of waste to be managed

[16] Available on the NLWP website

6.6 It is considered that this approach provides the most robust modelling scenario to project future capacity gaps, taking account of existing/planned capacity, and waste management needs.

Meeting the Capacity Gap

6.7 Table 6 below sets out the capacity gap broken down in to 5 year periods over the NLWP plan period. The capacity gap is the difference between tonnage associated with existing and planned waste management capacity (see Table 3 – section 5) and the quantity of waste to be managed over the plan period (see the chosen approach set out above). This method identifies whether there is adequate or surplus capacity, or a requirement for additional facilities. Table 6 sets out the capacity gaps for each management route. Negative figures indicate a capacity gap and therefore the type of management route for which capacity is sought over the plan period. The boxes that are not highlighted denote where 'surplus' capacity exists.

Table 6: Capacity gaps throughout the Plan period (tonnes)~~– chosen option~~

Waste function and stream managed	202018	2025	2030	2035
Landfill (C+I and LACW)	-114,496	-112,951	-114,726	-119,392
Landfill (Hazardous)	-12,741	-12,741	-12,741	-12,741
Landfill (C+D)	-22,521~~-26,534~~	-23,683	-24,664	-25,685
Landfill (E)	-37,973~~-405,634~~	-40,192~~-429,334~~	-41,856~~-447106,~~	-43,588~~-465,613~~
Energy from waste (LACW,C&I)	-47,167	-1,438*	3,280	-9,190
~~Energy from waste (Hazardous)~~	~~-53~~	~~-53~~	~~-53~~	~~-53~~
~~Thermal Treatment (without energy recovery) (AGR)~~	~~-32~~	~~-32~~	~~-32~~	~~-32~~
~~Thermal Treatment (Hazardous – no energy recovery)~~	~~-2,476~~	~~-2,476~~	~~-2,476~~	~~-2,476~~
Recycling (C+I and LACW)	-95,461	-207,611	-256,906	-288,570
Recycling (CD&E)	345,066~~393,108~~	73,829	-72,993	-102,005
Recycling (specialist material)	331997	331,673	331,430	331,177
Recycling (Hazardous)	-16,838	-16,838	-16,838	-16,838
Treatment plant (C&I CD&E)	-85,564	-50,667	-57,514	-64,645
Treatment Plant (Hazardous)	46,437	46,437	46,437	46,437
Land recovery	-9,098	-9,098	-9,098	-9,098

Waste function and stream managed	202018	2025	2030	2035
~~Transfer Station~~	~~1,555,349~~	~~1,233,796~~	~~1,233,796~~	~~1,233,796~~
~~Transfer Station (Hazardous)~~	~~5~~	~~5~~	~~5~~	~~5~~

Source: Update to NLWP data study model 2019~~6~~

6.8 The capacity gap figures in tonnage of waste have been converted to waste management land requirement using data from evidence gathered and evaluated on typical capacity and land take for each type of facility. Reference capacities are set out in the table below. Table 20 in section 7 of the Data Study Part 2 (2019~~8~~) ~~available on the website (www.nlwp.net)~~ provides a fuller explanation. Table 7 below sets out the amount of land required within North London to meet the capacity gaps identified in Table 6 for the chosen approach of net self-sufficiency for LACW, C&I and C&D waste streams.

Reference Capacities for Land Take for New Waste Facilities

Facility type	Assumed tonnes per hectare
Energy from waste (large scale)	165,000
Energy from waste (small scale)	50,000
Recycling (C+I & LACW)	128,000
Recycling (C+D)	100,000
Recycling (specialised – eg. metals)	50,000
Recycling (Hazardous)	10,000
Re-use	15,000
Composting	25,000
Treatment plant	50,000
Treatment Plant (Hazardous)	10,000

Table 7: Land take requirements for meeting net self-sufficiency for LACW, C&I and C&D (requirements for London Plan apportionment in brackets)

Facility Type	Hectares				
	2018	2025	2030	2035	Total
Recovery (C&I/LACW)	1 (1)				**1(1)**
Recycling (C&I/LACW)	1(1)	1(1)		1	**3(2)**
Recycling (C&D)	0	0	2	0	**2**
Recycling (Hazardous)	2				**2**
Treatment HIC, CDE	1				**1**
TOTAL land required in North London	**5 (2)**	**1 (1)**	**2 (0)**	**1 (0)**	**9 (3)**

~~6.8~~6.9 Although Table 7 identifies a need for recovery facilities for C&I waste, this need is immediate and declines over the plan period to when the Edmonton Energy Recovery Facility is completed. For this immediate need to be met facilities would need to be in place now, or at least in planning, which is not the case. Therefore it is highly probable that this need will not be met and that C&I waste requiring recovery will continue to be exported in the short term. As highlighted earlier the Mayor's Environment Strategy states that the Mayor does not want any additional energy from waste capacity over the plan period as existing sites should be able to meet the needs of all municipal waste arisings. The main need identified is for the provision of construction and demolition recycling facilities in order that the 95% recycling target for this waste stream can be achieved. There is also a requirement throughout for additional recycling facility to manage the increasing levels of recycled waste expected from the C&I waste stream reflecting the 75% recycling target in order to achieve the Environment Strategy target of 65% from municipal waste (LACW and commercial waste). A further 1ha is identified for additional treatment facilities for LACW, C&I and CDE.

~~6.9~~6.10 A capacity gap equivalent to two hectares of land has been identified for meeting North London's hazardous waste management need over the plan period~~, a small requirement of less than 2,500 tonnes per annum has also been identified for recovery of hazardous waste, but this figure is considered too small to plan for~~. While the North London Boroughs support the provision of hazardous waste facilities in appropriate locations, it is acknowledged that these facilities generally operate for

a wider-than-local catchment area due to their specialist nature. The Boroughs will therefore work with the GLA and other boroughs across London to identify and meet a regional need.

~~6.10~~6.11 The Data Study concludes that over the NLWP plan period there are capacity gaps for C&I, CD&E and Hazardous waste, and that North London will require additional facilities to meet these. In relation to the gap for Hazardous waste, the North London Boroughs will contribute to the planning for hazardous waste facilities at a regional level and through the identification of areas within North London that may be suitable for hazardous waste facilities. Additional land is not required to accommodate new facilities for Low Level Non-Nuclear Radioactive Waste (LLW), Agricultural Waste or Waste Water/Sewage Sludge during the plan period. More information about how each waste stream will be managed can be found in the Provision for North London's Waste to 2035 (section 7).

7. Provision for North London's Waste to 2035

7.1 The North London Boroughs have developed the following strategic policy which sets out in broad terms how the waste management needs in North London over the plan period are being planned for

Strategic Policy for North London's Waste

The North London Boroughs will identify sufficient capacity and land for the provision of waste facilities to manage the equivalent of 100% of waste arisings (net self-sufficiency) for Local Authority Collected Waste (LACW) and Commercial & Industrial (C&I) waste ~~by 2026~~ and Construction & Demolition (C&D) waste by 2026~~2035~~, including hazardous waste. The North London Boroughs will plan to manage as much of North London's excavation waste arisings within North London as practicable, and to ensure that excavation waste exports are put to beneficial use.~~.~~ To achieve this, the North London Boroughs will plan to manage the quantities of waste set out in Table 8 over the next 15 years.

The North London Boroughs will encourage development on existing and new sites and that promotes the movement of waste up the waste hierarchy, increases management of waste as close to the source as practicable, and reduces exports of waste to landfill.

The North London Boroughs will continue to co-operate with waste planning authorities who receive significant quantities of waste exports from North London.

7.2 Existing capacity and additional new capacity will be needed to meet North London's identified need for waste management over the plan period (2020-2035). Existing waste capacity in North London is safeguarded and set out in Schedule 1 (see Appendix 1) and land for new waste facilities is set out in Schedule 2 (see Policy 3). The focus for new waste capacity in North London is for recycling and recovery facilities to manage the quantities of waste set out in Table 8, thereby reducing exports.

7.3 Table 8 sets out the quantities of waste, by waste stream, which need to be managed within North London in order to meet the policy for net self-sufficiency target for LACW, ~~and~~ C&I and C&D waste by 2026 ~~and C&D waste by 2035~~, including hazardous waste which is already counted in the LACW, C&I and CD&E figures. Table 8 also takes account of the policy to manage as much of North London's excavation waste arisings within North London as practicable. The quantities of waste take into account population and economic growth and waste targets including net self-sufficiency, apportionment, recycling and landfill diversion, set out in the London Plan. The North London Boroughs are planning to meet more than their apportionment targets and to manage the waste arisings for North London set out in

the London Plan. Further details of the methodology to estimate waste arisings is available in the NLWP Data Study (2018).

Table 8: Amount of waste to be managed within North London 2018-2035

Waste Stream		~~2018 (tonnes)~~	2022 (tonnes)	2027 (tonnes)	2032 (tonnes)	2035 (tonnes)
Estimated Waste arising		~~2,773,054~~	3,050,960 ~~2,880,209~~	3,148,206 ~~2,952,840~~	3,250,126 ~~3,028,636~~	3,313,527 ~~3,357,725~~
Net self-sufficiency	LACW	~~967,755~~	991,619	1,004,001	1,017,548	1,026,176
	C&I	~~774,768~~	800,321	833,451	867,949	889,332
	C&D	~~450,429~~	465,284	484,544	504,601	517,032
	Hazardous	~~53,421~~	(53,421)	(53,421)	(53,421)	(53,421)
Excavation (treatment and beneficial use)		~~353,831~~	<784,513 ~~365,501~~	<816,987 ~~380,631~~	<850,805 ~~396,386~~	<871,764 ~~406,151~~
Agricultural		~~9,223~~	9,223	9,223	9,223	9,223

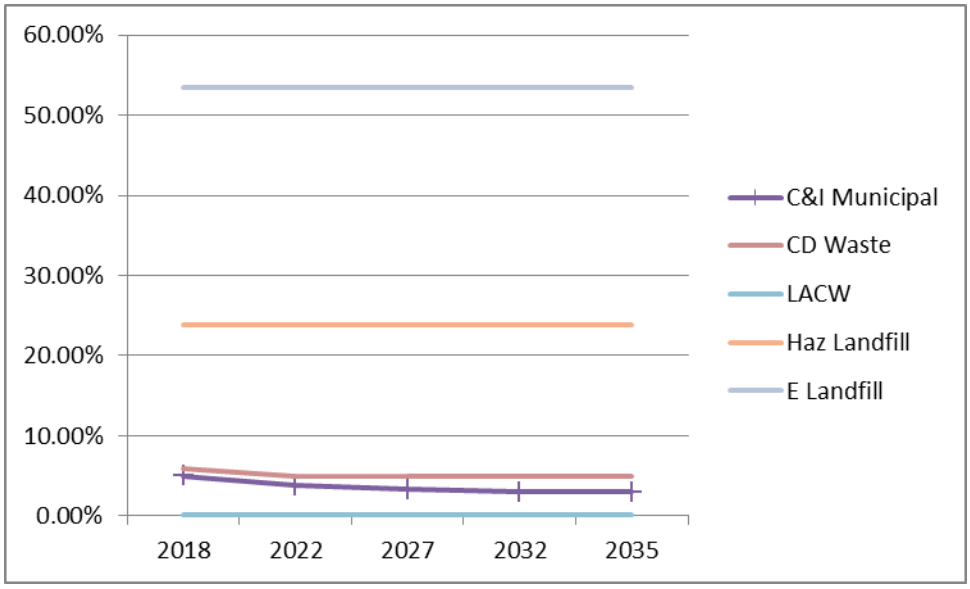
7.4 The North London Boroughs will monitor the NLWP against the quantities of waste set out in Table 8 to ensure the strategic policy is being delivered. Monitoring indicators are set out in Section 10 of this plan.

7.5 To enable waste planning authorities outside London to plan for North London's waste exports, Table 9 shows projected exports to landfill outside the North London area. The figures represent waste which cannot be prepared for reuse, recycled/composted, or used for other recovery and therefore has to be exported to landfill. The North London boroughs will plan to manage the equivalent amount of exported waste within North London through waste imports however, in reality, some of North London's waste will continue to cross borders to be managed or disposed of in facilities which North London does not or cannot accommodate, such as landfill or specialist hazardous waste facilities.

Table 9: Projected exports from North London to landfill 2022~~18~~-2035

Waste Stream	~~2018 (tonnes)~~	2022 (tonnes)	2027 (tonnes)	2032 (tonnes)	2035
Excavation	~~405,634~~	39,226 ~~419,012~~	40,849 ~~436,356~~	42,540 ~~454,419~~	43,588 ~~465,613~~
C&I	~~112,496~~	109,868	111,666	114,569	117,392
C&D	~~26,534~~	23,114	24,071	25,067	25,685
LACW	~~2,000~~	2,000	2,000	2,000	2000
Hazardous waste	~~12,741~~	12,741	12,741	12,741	12,741
Total to landfill	~~559,405~~	186,949 ~~566,735~~	191,327 ~~586,834~~	196,917 ~~608,796~~	201,406 ~~623,431~~
Excavation (treatment and beneficial use)		745,287	776,137	808,264	828,175

Figure 12: Predicted ~~Landfill~~ Exports to Landfill~~as a % total Waste Stream.~~



7.6 The North London Boroughs have engaged with each of the main recipients of North London's waste to landfill and identified if there are planning reasons why similar exports of waste cannot continue over the plan period, for example the planned closure of a site. This work is set out in the Duty to Co-operate Report ~~*North London Exports to Landfill 2017-2032* (2018)~~. The North London Boroughs have established that there is opportunity for the market to find alternative destinations in the wider south east for any North London's 'homeless' waste in the short term. In the longer term, beneficial use of excavation waste and the Circular Economy Statements will assist the North London Boroughs to reduce exports of waste to landfill and monitor the destinations of waste exports ~~there are sites and available void space in London, South East and East of England to take North London's estimated waste exports to 2035~~. The Boroughs will continue to co-operate with waste planning authorities who receive North London's waste, and mechanisms for monitoring waste movements after the NLWP is adopted are set out in in section 10.

7.7 The following section sets out how North London's will meet its strategy for waste to 2035 in more detail, setting out each waste stream and management method separately.

Local Authority Collected Waste (LACW) and Commercial & Industrial Waste (C&I)

7.8 Local Authority Collected Waste (LACW) and Commercial and Industrial (C&I) waste streams comprise similar types of waste. The NLWP identifies sufficient land to manage the equivalent of all LACW and C&I waste arising in North London by 2026.

Recycling/Composting

7.9 The North London Waste Authority (NLWA) and seven constituent boroughs are~~is~~ seeking to achieve a household waste recycling target of 50% by 2020 consistent with the targets set out in the North London Joint Waste Strategy. The Authority and partner boroughs will continue to seek to maximise recycling levels for LACW.

7.10 There is a need for additional capacity for recycling for both LACW and C&I waste streams throughout the plan period. As many facilities can manage both waste streams, the need for recycling is combined.

7.11 In addition to recycling, the existing composting facility at Edmonton will be displaced due to the development of the new Energy Recovery Facility. The NLWA are not intending to build a replacement facility to meet this requirement. Current contracts exist to export this waste outside the Plan area.

Recovery

7.12 Most LACW is managed at the Edmonton EcoPark facility which has an existing capacity of around 550,000tpa. It is intended that the existing Edmonton facility will be modified to enable connection to a heat network. The facility does not currently accept C&I waste from private operators.

7.13 The existing Edmonton facility will be replaced in 2025. The NLWA have gained consent for a new Energy Recovery Facility (ERF) with capacity of around 700,000 tonnes per annum to deal with all the residual waste under the control of the Authority from 2025 until at least 2050. The planning framework for this site includes the Edmonton EcoPark Supplementary Planning Document and emerging Central Leeside Area Action Plan.

7.14 As the existing EfW facility at Edmonton does not currently treat C&I waste, there is an immediate capacity gap for recovery of C&I waste amounting to 1ha of land as identified in Table 7. However, as no such facilities are currently in the pipeline, it is likely the waste will continue to be exported in the short to medium term until 2025. After this time, the recovery requirement of C&I waste can be met by the new Edmonton ERF to the end of the plan period in line with the objectives of the Mayors Environment Strategy 2018

Transfer

7.15 NLWA manage three waste transfer stations in North London namely the Hendon Rail Transfer Station (Barnet), Edmonton Ecopark Transfer Station (Enfield) and the Hornsey Street Transfer Station (Islington). The Hendon Rail Transfer Facility in Barnet is being relocated due to the Brent Cross Cricklewood development and a planning application is currently under consideration for the new location within Barnet.

Landfill

7.16 North London has no landfill sites and depends on capacity outside the Plan area. The NLWA intend to minimise the amount of LACW sent direct to landfill by maximising recycling and ensuring the existing EfW facility can sufficiently manage the expected tonnage of North London's residual waste up to 2025. Much less waste will be exported to landfill from 2017/18 due to changes in contractual arrangements and virtually no LACW will go to landfill by 2026.

7.17 It is anticipated that some C&I waste will continue to be exported to landfill throughout the plan period, although this will be a decreasing quantity as new facilities become operational and recycling levels increase.

7.18 The North London Boroughs have established that there are ~~landfill sites in London, South East and East of England able~~ opportunities for the market to find alternative destinations in London, South East and East of England to take North London's waste ~~between 2017 and 2035~~in the short term. In the longer term, beneficial use of excavation waste and Circular Economy Statements will assist the North London Boroughs to reduce exports of waste to landfill and monitor the destinations of waste exports. See Figure 12 for the anticipated decline in landfilling of North London's waste over the plan period.

Construction, demolition and excavation waste (CD&E)

7.19 The NLWP will identify sufficient land to manage the equivalent of all Construction and Demolition (C&D) waste arising in North London by 2035, while acknowledging that some exports will continue, particularly for Excavation waste. At least 95% of excavation waste exports will be put to beneficial use.

Recycling

7.20 The majority of C&D waste is recycled on site or through transfer facilities. Each Borough Local Plan has a sustainable design and construction policy in place which seeks to minimise waste generated during the design and construction of development and re-use or recycling of materials on-site where possible.

7.21 North London has a number of transfer facilities which also recycle CD&E waste but a large quantity is still exported to landfill, mainly excavation waste. Recycling opportunities are likely to be mainly for C&D wastes although around 28% of excavation waste is also recycled within North London, with 53% being disposed of directly to landfill and 19% through treatment facilities. Taking account of the diversion of C&D waste away from landfill, the Data Study has identified a capacity gap of around 67,000 tonnes per annum from 2029, rising to around 102,000 tonnes per annum by 2035 . Provision will be needed throughout the plan period.

7.22 A total of 2 hectares of land will be required to facilitate this provision. Opportunities to re-use CD&E waste locally will be supported, though this cannot be predicted with any certainty. Policy 8 'Inert Waste' seeks to ensure that any planning application for the recycling and reuse of inert waste for all types of development

demonstrates that viable opportunities to minimise ~~construction and demolition~~ CD&E waste disposal will be taken, making use of existing industry codes of practice and protocols, site waste management plans and relevant permits and exemptions issued by the Environment Agency.

Landfill

7.23 North London has no landfill sites and depends on capacity outside the NLWP area. ~~Some~~ A reduced amount ~~of~~ of the CD&E waste stream~~, particularly excavation waste,~~ will continue to be exported to landfill, but the majority (95%) of C&D waste will be reused, recycled and recovered and the majority of excavation waste (95%) will be put to beneficial use. ~~unless opportunities materialise to re-use it locally. It is anticipated that C&D waste exports to landfill will reduce over the plan period while excavation waste exports will increase in line with growth.~~

7.24 ~~The North London Boroughs, working with waste planning authorities who receive CD&E waste from North London, have identified constraints to the export of this waste and have established that there are both alternative landfill sites and adequate void space in London, South East and East of England to take North London's waste between 2017 and 2035.~~ See Figure 12 for the anticipated decline in landfilling of North London's waste over the plan period.

Hazardous Waste

7.25 All the waste streams include some hazardous waste. Some facilities in North London, whilst not classified as hazardous waste management facilities, are permitted to manage a certain amount of hazardous waste alongside non-hazardous wastes. Hazardous waste is more commonly managed in specialist facilities which have and depend on wide catchment areas for their economic feasibility, and may not be local to the source of the waste. Planning for hazardous waste is a strategic issue (regionally and arguably nationally rather than sub-regional) and it is not anticipated that land for facilities would be identified to meet the requirements of North London alone, though the areas identified in the NLWP have been assessed for their potential suitability for such facilities.

Recycling and Recovery

7.26 North London has one hazardous waste treatment facility with a capacity of around 3,600 tonnes per annum and two recycling facilities; one for metals and one for end of life vehicles handling around 2,500 tonnes per annum between them. In addition, other facilities permitted to manage hazardous waste include car breakers and metal recycling sites, WEEE sites as well as RRCs which will accept, for example, paints and batteries which require specialist treatment and disposal. Such sites will continue to make a valuable contribution to managing North London's hazardous waste requirements.

7.27 There is a capacity gap for the recovery of around 2,500tonnes per annum, this is considered too small a figure to plan for provision of a new facility and as such a

specific land requirement is not identified for this management option. There is a requirement for recycling of around 17,000 tonnes per annum, requiring an estimated 2ha of land. The North London Boroughs support the provision of such facilities in appropriate locations and will work with the GLA and other Boroughs across London to meet this need. It is noted in the sites and area profiles in Appendix 2 of the NLWP where a site or area is not suitable for hazardous waste recycling and recovery facilities. Any applications for hazardous waste facilities in North London that do come forward will be considered on a case by case basis. However, in the short term it is likely that hazardous waste will continue to be exported to the most appropriate specialist facilities.

Landfill

7.28 The need for export to landfill of around 13,000 tonnes per annum, is expected to continue due to inability of the area for provide this type of facility. The North London Boroughs will continue to work with waste planning authorities who receive hazardous waste from North London to identify constraints to the continued export of this waste and identify potential new destinations if necessary.

Agricultural Waste

7.29 The small amount of agricultural waste generated in North London is not expected to increase over the plan period and there is no requirement to plan for additional facilities to manage this waste stream.

Low Level Radioactive Waste

7.30 The very small amount of Low Level Non-Nuclear Radioactive Waste (LLW) arising in North London is produced as wastewater and disposed of through foul sewer and it is expected that this will continue Any more specialist waste which may be produced would need to be managed outside the area in specialist facilities. It is therefore not necessary to plan for additional facilities in North London for this waste stream.

Waste Water

7.31 The main Thames Water sewage treatment facility in North London is Deephams Sewage Treatment Works (STW), operated by Thames Water. Work to upgrade this facility was largely completed in 2017. Thames Water anticipates this will provide sufficient effluent treatment capacity to meet its needs into the next decade during the plan period. However, this will be reviewed in future AMP periods to ensure ongoing capacity in relation to changing population growth predictions.~~Thames Water is also proposing an upgrade to the sewage sludge treatment stream at the site which will be sufficient to meet its needs during the plan period~~. It is therefore not necessary to identify additional land for this waste stream in the NLWP, however any new facility for waste water will be assessed against Policy ~~8~~7.

8. Sites and Areas

Context

8.1 This section sets out the approach to identifying sufficient land for future waste management facilities in North London to ensure the delivery of the identified capacity requirements Sections 3-6 of the NPPW set out the approach Local Plans should take to identify future waste requirements over the plan period and this has been used to help develop the approach to identifying future locations for waste development in North London. Assessment criteria have been developed using waste planning policy and in consultation with key stakeholders in a series of focus groups..

8.2 The NLWP identifies a number of areas to meet future waste needs. An 'area' comprises a number of individual plots of land, for example, an industrial estate or employment area that is in principle suitable for waste use but where land is not specifically safeguarded for waste. The NPPW and the draft New London Plan (July 2019) endorse the identification of “sites and/or areas” in Local Plans. The approach is also supported by the waste industry and key stakeholder in consultation. It was initially intended to also identify sites within the NLWP, i.e. individual plots of land that would be safeguarded for waste use. However, only one site was brought forward by landowners during the call for sites exercises and no further sites are required for the management of LACW. As a result, only areas have been identified.

Expansion of existing Waste Management Facilities

8.3 Existing waste management facilities are also a key part of future provision. A call for sites exercise in 2014 targeted existing waste operators in North London, seeking information on any planned capacity expansion or upgrades to existing facilities. Three sites were put forward: Edmonton EcoPark, Deephams Sewage Treatment Works and Powerday in Enfield. Any applications for expansion or consolidation of existing waste management sites will be considered against NLWP policies and those of the Borough Local Plan in which the proposal is situated. A further exercise was also undertaken in 2018 but no new sites were put forward for expansion.

Edmonton EcoPark

8.4 In November 2014 the NLWA announced plans for the development of a new Energy Recovery Facility (ERF) - the North London Heat and Power Project - on their existing site at the Edmonton EcoPark in Enfield. This will replace the existing Energy from Waste (EfW) plant at the EcoPark that is coming to the end of its operational life.

8.5 A Development Consent Order (DCO) has been approved by the Secretary of State for the new ERF which will manage the treatment of the residual element of LACW during the NLWP plan period and beyond. The replacement facility, expected to be operational from 2025, will generate power for around 127,000 homes and provide heat for local homes and businesses as part of a decentralised energy network known as the Lee Valley Heat Network, trading as *energetik.*'

8.6 The NLWA's DCO allows for the loss of the composting plant at the Edmonton EcoPark site in 2020 to make way for the new ERF facility to be built whilst maintaining the current EfW operation. The development also includes a Resource Recovery Facility (RRF) including a new Reuse and Recycling Centre (RRC), a relocated transfer hall and a bulky waste/fuel preparation facility on the site.

8.7 Once the new facility has been developed, the existing EfW facility will be demolished. The associated parcel of land, on which the current plant is located, will continue to be safeguarded for future waste use, and will become available towards the end of the plan period. The development of Edmonton EcoPark for the new ERF will provide a strategic facility for the NLWP and provide a solution for managing the non-recyclable element of LACW. Delivery of this facility will see the NLWA continue to manage LACW from the North London Boroughs and help reduce the reliance on disposal of waste to landfill. Enfield Council have adopted Edmonton EcoPark Supplementary Planning Document and have submitted the Central Leeside Area Action Plan for independent examination, both of which provide more detail on the planning framework and objectives for this site.

Deephams Sewage Treatment Works

8.8 Deephams Sewage Treatment Works is a waste water treatment facility in Edmonton. The works serves a large area of north east London, both inside and outside the M25 corridor. The Environment Agency has issued a significantly tighter environmental permit in respect of sewage treatment standards that came into force in March 2017 and requires Thames Water to make improvements to the quality of the discharged effluent. The need for an effluent upgrade to Deephams Sewage Treatment Works (STW) is highlighted in the National Planning Statement on Waste Water, and planning permission for this work was granted by Enfield Council on 20th February 2015. The upgrade was largely constructed by March 2017 and being completed during 2018/2019.~~Work has started and is expected to continue for a minimum of 7 years.~~

8.9 ~~Thames Water is also proposing an upgrade to the sewage sludge treatment stream at Deephams STW during its 2015 to 2020 business plan period by providing enhanced sludge treatment plant within the boundaries of the existing site.~~ Enfield Council will continue work with Thames Water and the Environment Agency to

ensure that adequate and appropriate waste water treatment infrastructure is provided. Any new waste water facility will be assessed under Policy 7.

Powerday

8.10 Powerday in Enfield is an existing site currently operating as a Waste Transfer Station. Planning permission was granted for an upgrade to a Materials Recovery Facility (MRF) capable of handling 300,000 tonnes of C&I and C&D waste per annum and the new facility was opened in 2015.

Loss and re-provision of existing waste management facilities

8.11 Where existing sites need to be relocated, compensatory capacity is required in order to comply with the London Plan, Borough Local Plans and, once adopted, the NLWP. It is known that some waste sites in North London will be redeveloped for other usescapacity will be lost during the plan period. Some of this capacity will be replaced within North London, some outside North London with a net loss to North London but not to London as a whole, and some is as yet unknown. Where such issues are known and new sites have already been sought, this information has been fed in to the Plan process and information has been given in Schedule 1.

8.12 The North London Boroughs are aware that the regeneration of Brent Cross Cricklewood Regeneration Arearedevelopment (BXC) is likely to affect includes four existing waste sites, comprising a NLWA transfer station and three commercial operations. These sites will be redeveloped under the approved planning permission for the regeneration of Brent Cross Circklewood (Barnet planning application reference F/04687/13). The Hendon Rail Transfer Station (BAR 4) will be replaced as part of the BXC development with a new facility on site S01-BA to meet the NLWA's requirements; planning permission for this new site at Geron Way was granted by Barnet Council in September 2018. The existing commercial facilities at BAR 6 and BAR 7 fall within the land required to deliver the early first Southern phase of the BXC regeneration which is expected toanticipated will commence in the near termearly 2018. Replacement capacity for these sites will not be provided prior to their redevelopment and therefore replacement capacity will be sought outside of the BXC regeneration area on alternative sites / areas to be identified by the London Borough of Barnet by 2025 in line with the planning permission. The BAR3 site is identified for redevelopment in Phase 4 of the BXC regeneration and is currently not anticipated to be redeveloped until after 2026. Capacity at the waste facilities of BAR4, BAR6 and BAR7 and part of the capacity of BAR3 will be replaced by the new Waste Transfer Station (WTS) delivered as part of the Brent Cross Cricklewood Regeneration. The balance of replacement capacity for BAR3 will need to be identified prior to its redevelopment and the London Borough of Barnet will seek to

provide replacement capacity within the borough with the Local Plan identifying potential sites.

The impact of Crossrail 2 on existing and proposed new areas

8.13 Transport for London has been consulting on Crossrail 2. The timetable for a Hybrid Bill submission is at present unknown. Depending on the route selected, some existing waste sites and proposed areas identified as suitable for new facilities might be affected by the scheme.

8.14 At the time of publication, only one location (A02-BA-Oakleigh Road) within an Area identified in Schedule 2 New locations for waste management has been identified in the Crossrail 2 safeguarding directions issued in January 2015. This plot of land (shown in Appendix 2) has been safeguarded in order to deliver part of the construction of Crossrail 2 and will be released after this is completed. However, as the scheme develops and further information is made available on the preferred route, there could be locations within other Areas, which may be required for the purpose of constructing Crossrail 2, particularly along the West Anglia Mainline. Once known, should applications for waste uses come forward in these locations, they will need to be subject of consultation with TfL and Network Rail as necessary.

8.15 Furthermore, a number of the new Areas identified in Schedule 2 Areas suitable for waste management are in locations close to Crossrail 2 stations and could make a valuable contribution towards realising the wider benefits of Crossrail 2 in terms of both delivering additional homes and supporting wider regeneration. Those Areas which in part may have such a role in the longer term include:

- A12-EN – Eley's Estate
- A22-HR – Friern Barnet Sewage Works
- A19-HR – Brantwood Road
- A21-HR – North East Tottenham

8.16 Known information on Crossrail2 is detailed further in the site profiles in Appendix 2 and in the proformas in the Sites and Areas Report.

8.17 In line with the NLWP approach to Opportunity Areas and Housing Zones as set out in section 2, any non-waste related development in these locations will need to be brought forward in a way that safeguards existing capacity (see Policy 1) and considers future waste management requirements alongside the need to deliver new homes and more intensive employment uses. Within these locations there is likely to be significant benefit in seeking opportunities to co-locate or consolidate existing waste uses so as to minimise potential conflict and ensure that they can coexist alongside residential and other more sensitive uses.

8.18 As required, the North London Boroughs will work proactively with the GLA and TfL to create proposals which address these issues ensuring that North London's waste management needs can be met whilst helping to realise the significant opportunities associated with schemes such as Crossrail 2.

8.19 How the impact of Crossrail 2 on the NLWP will be monitored and managed is addressed under Indicator 2 of the monitoring arrangements in section 10.

Site and Area Search Criteria

8.20 The proposed site and area search criteria used in the NLWP site selection process were developed based on the requirements of national waste planning policy. Both planning and spatial criteria were discussed with key stakeholders through a focus group session in spring 2014 . Following the introduction of the NPPW in October 2014, the site search criteria were reviewed to ensure compliance with this document.

Site and Area Search and Selection Process (Methodology)

8.21 An extensive site and area search and selection process has been undertaken. Full details of the site selection exercise are set out in the 'Sites and Areas Report' available on the NLWP website. In summary it has involved the following key stages:

i. Survey of existing waste sites – this involved a detailed review of the existing waste sites, including obtaining information from the operators on their future plans and validation of existing information held regarding their sites. This work indicated that there was insufficient capacity within existing sites to meet the expected waste arisings over the plan period.

ii. Call for sites - a call for sites exercise was carried out in two stages. This included targeting existing operators, landowners and other interested parties requesting them to put sites forward for consideration.

iii. Land availability search – this was an initial search into the land available in North London that may be suitable for the development of waste management infrastructure. At this stage, all available sites and areas were included in the process in order that the site assessment process for the NLWP could then be applied. The result of this work was to identify a long list of potential sites.

iv. Desk based site and area assessment – the long list of sites and areas was then assessed against the selection criteria. As shown in Table 8 below, the assessment criteria were split into two levels, absolute criteria and screening criteria. The absolute criteria were applied first to determine if the identified

constraints affected part of the proposed sites and areas, resulting in their removal. The remaining sites and areas were then subject to the screening criteria. The aim of using the absolute criteria was to ensure that those sites/areas which are wholly unsuitable are excluded from further consideration and to identify those which may be suitable.

v. Site visits were undertaken in August and October 2014 to check and refine information from the desk based assessment and make a visual assessment of the suitability for different types of waste management facilities as well as the relationship with adjoining development. The information was used to complete the criteria-based assessment to ultimately determine the suitability of the sites/areas for future waste development as well as evaluate the potential facility types.

vi. Areas identified as suitable for future waste management facilities were subject to an assessment to calculate the level of capacity they could reasonably be expected to provide. Firstly the proportion of North London's industrial land in waste use was established. This showed the ability of waste facilities to compete with other land uses in these areas was good and that waste is a growing sector in contrast to declining industries such as manufacturing. Secondly, a review of the vacancy rates and business churn for industrial land was used to estimate the proportion of land within these areas which are likely to become available over the plan period. Further information is available in the Sites and Areas Report.

vii. Sustainability Appraisal[17] and Habitats Regulation Assessment[18] of sites/areas – all proposed sites have been subject to these assessments and the findings fed into the policy recommendations.

viii. Consultation with Landowners – Following completion of the above, land owners for all the sites remaining were contacted to seek feedback on the inclusion of their land as a waste site allocation. The findings of this work have further refined the list of sites and further information can be found in the Sites and Areas Report.

ix. Sequential test – any sites lying within a level 2 or 3 flood risk zone have been subject to sequential testing to assess the potential impact of a waste

[17] Sustainability appraisal is the assessment of the potential impact against an agreed set of social, environmental and economic objectives. It encompasses the requirement of Strategic Environmental Assessment which is a requirement of Europe that all plans undergo.

[18] HRA is a requirement of Europe that all plans are assessed against their potential impact of natura 2000 sites.

development in this zone. The results of this work can be found in the Sites and Areas Report.

8.22 The assessment criteria applied to all sites and areas is listed in Table 10 below. The criteria have been used in assessing sites and areas during both the desk based assessment and site visits.

Table 10: Sites and Areas Assessment Criteria

Absolute Criteria	Screening Criteria
• Metropolitan Open Land (MOL) • Green Belt (for built facilities) • Grade 1 & 2 agricultural land (part of the Green belt) • Sites of international importance for conservation e.g. Ramsar sites, Special Areas of Conservation (SACs) and Special Protection Areas (SPAs) • Sites of national importance for conservation e.g. Sites of Special Scientific Interest and National Nature Reserves • Ancient Woodlands • Scheduled Ancient Monuments • Listed Buildings (grade I and II*) • Registered Parks and Gardens (grade I and II*) • Registered battle fields • Areas of Outstanding Natural Beauty (AONB) • Protected open spaces • Landscape designations such as Areas of Special Character (part of the	• Sites of local importance for nature conservation (SINCs) • Flood risk areas/flood plain • Accessibility (proximity to road, rail, canal/river) • Sites greater than 2km from the primary route network • Ground water protection zones • Surface waters • Major aquifers • Airfield safeguarding areas (Birdstrike zones) • Air Quality Management Areas • Unstable land • Green belt (for non-built facilities) • Local Plan designations • Settings of Scheduled Ancient Monuments • Settings of Listed Buildings • Settings of Registered Parks and Gardens (grade I and II*) • Neighbouring land uses • Proximity to sensitive receptors

Absolute Criteria	Screening Criteria
Green Belt)	

Draft Plan Consultation

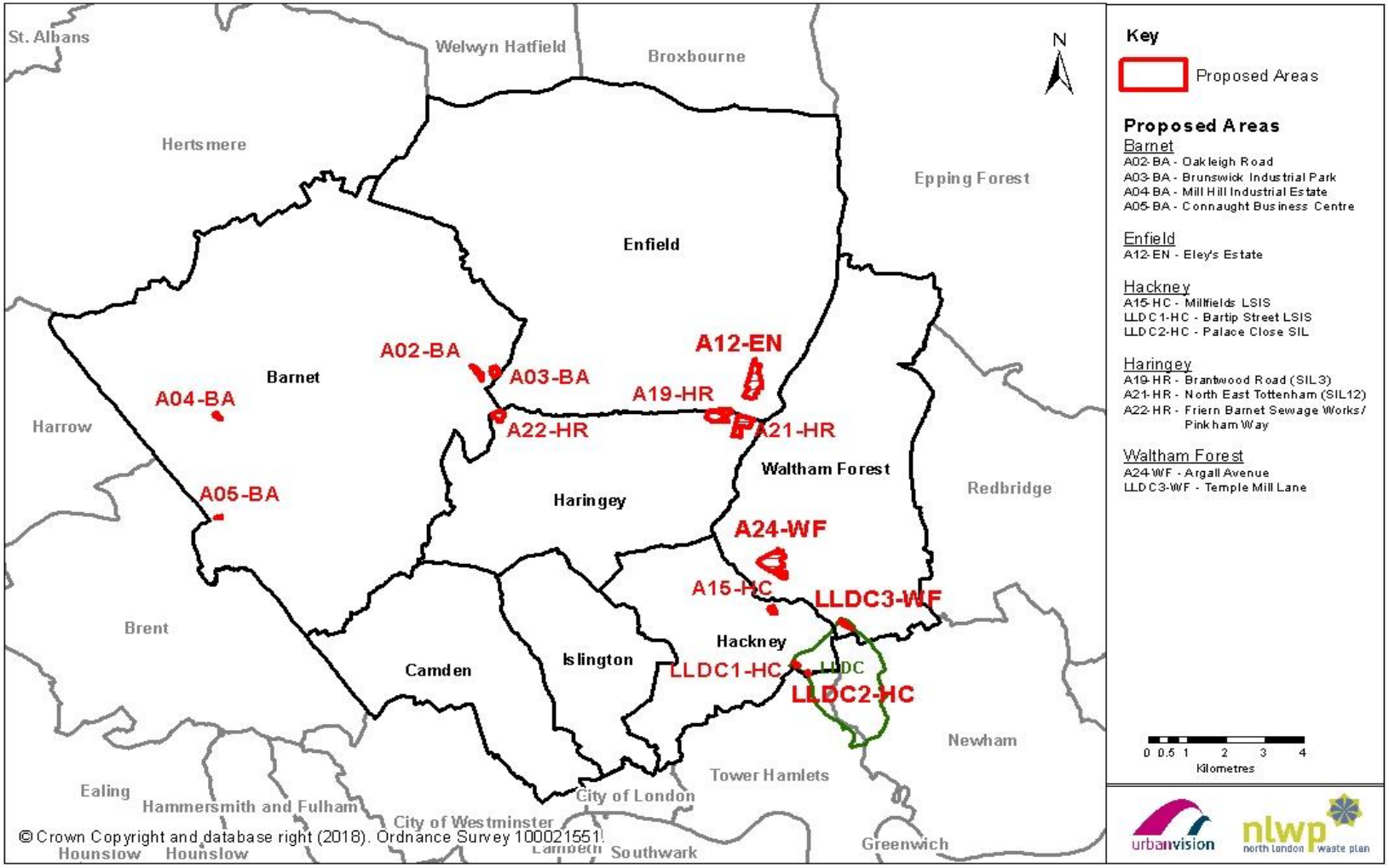
8.23 The sites and areas identified as a result of the methodology set out above were consulted on as part of the Draft Plan prepared under Regulation 18 of the Town and Country Planning Regulations 2012.

8.24 In preparing this (Proposed Submission) version of the NLWP, and deciding which sites and areas to take forward, the North London Boroughs took into account national and regional policy, the aims of the NLWP and consultation responses on the Draft Plan, including issues raised around deliverability and other constraints. Further work was undertaken to gather and assess additional information on the proposed sites and areas received during the consultation or as a result of new data being published.

8.25 The North London Boroughs developed a range of reasonable options for taking forward sites and areas in the Proposed Submission version of the plan. The preferred option was to take forward land designated as industrial land and high-performing (Band B) sites/areas, while achieving a better geographical spread by reducing the number of sites identified in Enfield. This focus on industrial land and the highest performing areas helps to locate waste facilities away from residential properties, as far as this is possible in an urban area like North London. Further details are set out in Options Appraisal for Sites and Areas to be taken forward in the Proposed Submission NLWP (2018.

8.26 The areas, shown in Figure 13 (see also Schedule 2 in section 9), have been identified as suitable for built waste management facilities.. The areas are being put forward as they comply with the NLWP Spatial Framework which is reflected in the site selection criteria, as well as a range of environmental, social and economic criteria set out in the Sustainability Appraisal Scoping Report. During the course of the plan, it is expected that land will become available as part of the business churn. Any proposals for waste facilities within the areas will be subject to planning permission. No provision is made for landfill due to the inability of the Plan area to accommodate development of landfill.

Figure 13: Location of proposed new areas


St. Albans
Welwyn Hatfield
Broxbourne
Hertsmere
Epping Forest
Enfield
Barnet
Harrow
Haringey
Waltham Forest
Redbridge
Brent
Camden
Islington
Hackney
LLDC
Newham
Tower Hamlets
City of London
Ealing
Hammersmith and Fulham
City of Westminster
Lambeth
Southwark
Greenwich
Hounslow
A02-BA
A03-BA
A04-BA
A05-BA
A12-EN
A19-HR
A22-HR
A21-HR
A24-WF
A15-HC
LLDC3-WF
LLDC1-HC
LLDC2-HC
N
Key
Proposed Areas
Proposed Areas
Barnet
A02-BA - Oakleigh Road
A03-BA - Brunswick Industrial Park
A04-BA - Mill Hill Industrial Estate
A05-BA - Connaught Business Centre
Enfield
A12-EN - Eley's Estate
Hackney
A15-HC - Millfields LSIS
LLDC1-HC - Bartip Street LSIS
LLDC2-HC - Palace Close SIL
Haringey
A19-HR - Brantwood Road (SIL3)
A21-HR - North East Tottenham (SIL12)
A22-HR - Friern Barnet Sewage Works/ Pinkham Way
Waltham Forest
A24-WF - Argall Avenue
LLDC3-WF - Temple Mill Lane
0 0.5 1 2 3 4
Kilometres
urbanvision
nlwp north london waste plan
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9 Policies

9.1 The policies set out in this section will form part of each Borough's 'development plan' which also includes the Mayor's London Plan and individual borough Local Plans (see Figure 2). All planning applications for waste uses will be assessed against the following NLWP policies and other relevant policies in the development plan and any associated Supplementary Planning Documents (SPD)/guidance. Any proposals for waste development will be expected to take account of the full suite of relevant policies and guidance.

9.2 The NLWP policies will help deliver the NLWP's aim and objectives (section 3), Spatial Framework (section 4) and the Strategy Policy for North London's Waste (section 7). The supporting text sets out why the particular policy approach has been chosen, any alternatives considered and how the policy will be implemented.

9.3 The policies are:

Policy 1:	Existing waste management sites
Policy 2:	Locations for new waste management facilities
Policy 3:	Windfall sites
Policy 4:	Re-use & Recycling Centres
Policy 5	Assessment criteria for waste management facilities and related development
Policy 6:	Energy recovery and decentralised energy
Policy 7	Waste Water Treatment Works and Sewage Plant
Policy 8:	Control of Inert Waste

Policy 1: Existing waste management sites

Policy 1: Existing waste management sites

All existing waste management sites identified in *Schedule 1: Existing safeguarded waste sites in North London*, and any other sites that are given planning permission for waste use, are safeguarded for waste use.

Expansion or intensification of operations at existing waste sites will be supported where the proposal is in line with relevant aims and policies in the North London Waste Plan, the London Plan, Local Plans and related guidance.

Applications for non-waste uses on safeguarded waste sites will only be permitted

where it is clearly demonstrated to the satisfaction of the relevant borough that compensatory capacity will be delivered in line with the spatial framework on a suitable replacement site in North London, that must at least meet, and, if possible, exceed, the maximum achievable throughput of the site proposed to be lost and help to promote the increased geographical spread of waste sites across the plan area.

Development proposals ~~in close proximity to existing safeguarded waste sites or sites allocated for waste use~~ which would prevent or prejudice the use of ~~those~~ existing waste sites for waste purposes will be resisted under the agent of change principle unless design standards or other suitable mitigation measures are adopted to ensure that the amenity of any new residents would not be significantly adversely impacted by the continuation of waste use at that location or suitable compensatory provision has been made for the waste use elsewhere within the Plan area.

This policy helps meet strategic objectives SO2 and SO3

This policy contributes towards Spatial Framework components A and C

9.4 The purpose of Policy 1 is to ensure that the existing waste capacity in North London is protected and is able to expand where appropriate. It applies to sites with existing operational waste facilities, and any other sites developed for waste use throughout the plan period.

9.5 *Schedule 1: Existing safeguarded waste sites in North London* is in Appendix 1. The London Plan requires boroughs to protect their existing waste capacity and each North London Borough is safeguarding this land through their Local Plan and Policies Map. The contribution currently made by these facilities, and their future contribution, is taken into account in the estimation of how much additional waste management capacity is needed throughout the plan period, so it is important to protect these existing facilities to ensure there is sufficient capacity available to meet identified needs over the plan period. If existing facilities were lost and the capacity not replaced elsewhere in North London, this would result in additional waste capacity being required to meet the identified need and achieve net self-sufficiency.

9.6 Planning applications for expansion of existing waste facilities will be supported where they are in alignment with policies in this Plan and with Borough Local Plans.

9.7 If, for any reason, an existing waste site is to be lost to non-waste use, compensatory waste capacity~~provision~~ will be required within North London. Compensatory capacity must be at or above the same level of the waste hierarchy and at least meet, and should exceed, the maximum achievable throughput of the site proposed to be lost. When assessing the throughput of a site, the maximum throughput

achieved over the last five years should be used.~~Replacement provision will be calculated using the maximum achievable throughput (tonnes per annum) that the site has achieved as set out in the EA Waste Data Interrogator. Maximum throughput for existing sites 2009-2016 can be found in the Data Study Part 3: Sites Schedule Report Tables 1-7: Assessment of existing waste management capacity.~~ This information is sourced from the Environment Agency's Waste Data Interrogator. Where this information is not available, for example if a waste site has been vacant for a number of years, the potential capacity of the site should be calculated using an appropriate and evidenced throughput per hectare. Applicants will need to demonstrate that provision of replacement capacity is secured before permission is granted for an alternative use. This could be through a compensatory site of a suitable size to meet at least the maximum annual throughput or an increase of capacity in an existing facility. However, it may not be necessary for replacement sites to be on a 'like for like' basis, for example, a new site with a larger capacity might replace a number of sites with individually smaller, but combined equivalent, capacity.

9.8 Compensatory provision should be delivered in accordance with the spatial framework and such proposals will need to demonstrate compliance with Policy 3 (Windfall sites) and 5 (Assessment Criteria for waste management facilities and related development) of the NLWP. The area of search for a replacement site should be within North London. As set out within Section 4, a key Spatial Principle of the NLWP is to establish a geographical spread of waste sites across North London, consistent with the principles of sustainable development. The aim is to ensure that waste is managed efficiently and as close to its source as possible whilst minimising any negative cumulative impacts resulting from a high concentration of waste facilities. Avoiding an unduly high concentration of waste facilities in a location is consistent with the overarching objectives of sustainable development, identified within the NPPF and would leave land available for other uses. The most suitable location for the re-provision of a site lost to non-waste development may therefore not necessarily be within the same north London borough as the displaced site. Adequate evidence of compensatory provision will be required to the satisfaction of the local planning authority before planning permission for redevelopment proposing loss of a facility is granted.

9.9 Any sites that come forward and receive planning permission for waste development which are implemented in the lifetime of the NLWP will be regarded as existing waste sites in North London and safeguarded under the provisions of this Policy (1).

9.10 Policy 1 also seeks to protect existing and permitted waste sites from the influence of an incompatible use in close proximity prejudicing the continuation or further development of waste operations at that location. Waste facilities have an important role to play in ensuring that communities are sustainable. Identifying and

safeguarding suitable sites for waste facilities is challenging with issues relating to public amenity, access, hydrology, and geology, amongst others, to consider. In addition, waste is a relatively 'low value' land use which, although capable of competing with other industrial type uses, cannot outbid higher value uses. The introduction of sensitive types of development nearby, such as housing, could have an adverse impact on the continued operation of the existing sites in North London and their ability to provide sufficient waste capacity as well as helping meet waste recycling, diversion and recovery targets. This would undermine the anticipated capacity of the network of existing facilities across North London to manage waste and consequently the overall deliverability of the NLWP**.** The NPPF and the draft New London Plan (July 2019) sets out the 'Agent of Change' principle. This principle places the responsibility of mitigating the ~~noise~~ impact of noise, dust, vibration and other nuisance-generating activities (from existing noise-generating businesses) on the proposed new development. Developers proposing non-waste development in close proximity to existing waste sites should be aware of the potential impacts on existing waste operations and plan this into their development so as not to prevent or prejudice the continued waste use in that location, otherwise such developments will not be permitted. Accordingly proposed non-waste developments should be designed to protect both the amenity of potential new residential developments and the existing waste operation within that area.

Policy 2: Locations for new waste management facilities

Policy 2: Locations for new waste management facilities

Areas listed in *Schedule 2: Areas suitable for waste management* and *Schedule 3: Areas identified in LLDC Local Plan* are identified as suitable for built waste management facilities to meet the identified need set out in Tables 6 and 7.

Applications for waste management development will be permitted on suitable land within the areas identified in Schedule 2 subject to other policies in the North London Waste Plan, the London Plan and Local Plans, and related guidance.

Development proposals will need to manage waste as far up the waste hierarchy as practicable.

Applications for waste management development within the areas identified in Schedule 3 will be assessed by the London Legacy Development Corporation.

This policy helps meet strategic objectives SO1, SO2, SO3 and SO5

This policy contributes towards Spatial Framework components B and F

Table 11: Schedule 2 Areas suitable for waste management

Area ref	Area Name	Area (ha)	Borough	Waste Facility Type				
				A	B	C	D	E
A02-BA	Oakleigh Road	0.99	Barnet	X		X		X
A03-BA	Brunswick Industrial Park	3.9	Barnet	X				X
A04-BA	Mill Hill Industrial Estate	0.9	Barnet	X				X
A05-BA	Connaught Business Centre	0.9	Barnet	X				X
A12-EN	Eley's Estate	26.1	Enfield	X	X	X	X	X
A15-HC	Millfields LSIS	1.48	Hackney			X		
A19-HR	Brantwood Road	16.9	Haringey	X			X	X
A21-HR	North East Tottenham	15.32	Haringey	X			X	X
A22-HR	Friern Barnet Sewage Works/ Pinkham Way	5.95	Haringey	X	X			X
A24-WF	Argall Avenue	26.91	Waltham Forest	X	X			X

Table 12: Schedule 3 Areas identified in LLDC Local Plan

Area ref	Area Name	Area (ha)	Borough	Waste Facility Type				
				A	B	C	D	E
LLDC1-HC	Bartrip Street	0.6	Hackney	X				X
LLDC2-HC	Chapman Road (Palace Close)	0.33	Hackney	X				X
LLDC3-WF	Temple Mill Lane	2.1	Waltham Forest	X	X			X

Table 13: Key to Waste Management Facility Type

	Facility type
A	Recycling
B	Composting (including indoor / in-vessel composting)
C	Integrated resource recovery facilities / resource parks
D	Waste treatment facility (including thermal treatment, anaerobic digestion, pyrolysis / gasification, mechanical biological treatment)
E	Waste transfer

9.11 Policy 2 identifies areas and their suitability for a range of built waste management facilities. National and European requirements state that waste plans must identify

locations where future waste development may take place. In addition, the London Plan requires boroughs to allocate sufficient land to provide capacity to manage apportioned waste.

9.12 The NLWP data study has identified capacity gaps for waste management during the plan period for the preferred option of net self-sufficiency. The purpose of Policy 2 is to ensure that sufficient land is identified to accommodate built waste management facilities to deal with these identified capacity gaps for North London.

9.13 The NLWP identifies several areas to provide land suitable for the development of waste management facilities. Each 'area' comprises a number of individual plots of land, for example, an industrial estate or employment area that is in principle suitable for waste use but where land is not safeguarded for waste. The identification of areas suitable for waste uses, subject to detailed site assessment at planning application stage, will help to achieve net self-sufficiency whilst encouraging co-location of facilities and complementary activities (an objective of the NPPW and Spatial Framework). Areas listed in Schedule 2: Areas suitable for waste management and Schedule 3: Areas identified in LLDC Local Plan suitable for new waste facilities will be identified in borough policies maps, and any new waste sites will be safeguarded and identified in borough policies maps.

9.14 The areas are considered to be in the most suitable, sustainable and deliverable locations in North London for new waste management facilities when assessed against a range of environmental, economic and social factors and the Spatial Framework.

9.15 The site profiles in Appendix 2, indicate the size of each area, the type of facility likely to be accommodated on the area, and any mitigation measures which may be required. Developers should be aware that any type of facility listed as potentially suitable is subject to consideration against the full suite of relevant local planning policies/guidance.

9.16 The ability of areas to accommodate a range of types and sizes of waste management facility is important to the flexibility of the Waste Plan. Table 13: Key to Waste Management Facility Types contains a full list of the types of facilities which were considered when assessing sites and which may be required over the plan period to meet the identified capacity gap. The facility types identified are broad categories which may come forward over the plan period. The order of facility types reflects their place in the waste hierarchy, with categories A and B at the 'recycling' level and C-E at the 'other recovery' level. Applicants should take account of this order when responding to the second criteria of Policy 2 which requires development proposals to manage waste as far up the waste hierarchy as practicable.

9.17 The NLWP recognises that currently emerging or unknown waste management technologies, not listed in Table 13 'Key to Waste Facility Types', may be proposed on allocated sites and within identified areas during the plan period as new ways of treating waste come to the fore. As with all proposals, those for waste management technologies not listed will be assessed against the relevant NLWP policies, policies in the London Plan, Borough Local Plan policies and related guidance.

~~**Table 13: Key to Waste Management Facility Type**~~

	~~Facility type~~
~~A~~	~~Recycling~~
~~B~~	~~Composting (including indoor / in-vessel composting)~~
~~C~~	~~Integrated resource recovery facilities / resource parks~~
~~D~~	~~Waste treatment facility (including thermal treatment, anaerobic digestion, pyrolysis / gasification, mechanical biological treatment)~~
~~E~~	~~Waste transfer~~

9.18 A full assessment of the suitability of the area for a facility type should be prepared by the developer to inform any development application for waste use. This will allow for a more detailed analysis and consideration of potential impacts associated with a specific proposal at the planning application stage.

9.19 In North London the most likely options for waste management will be recycling and recovery. The test of whether the proposed management is acceptable in terms of the waste hierarchy will be based on the type of waste and the treatment proposed and demand.

9.20 It is not within the remit of the NLWP to directly allocate sites/areas within the London Legacy Development Corporation (LLDC) planning authority area; this falls to the LLDC Local Plan. Therefore Schedule 4 sets out separately those areas identified in the LLDC Local Plan as being potentially suitable for built waste management facilities.

Policy 3: Windfall Sites

Policy 3: Windfall Sites

Applications for waste development on windfall sites outside of the sites and areas identified in Schedules 1,2 and 3 will be permitted provided that the proposal can demonstrate that:

a) the sites and areas identified in Schedules 1, 2 and 3 are not available or suitable for the proposed use or the proposed site would be better suited to meeting the identified need having regard to the Spatial Framework~~Principles~~;

b) the proposed site meets the criteria for built facilities used in the site selection process (see Table 10 of Section 8 of the NLWP) the proposal fits within the NLWP Spatial Framework, and contributes to the delivery of the NLWP aim and objectives;

c) future potential development including Opportunity Areas identified in the London Plan, and transport infrastructure improvements such as West Anglia Main Line, Four Tracking and Crossrail 2 would not be compromised by the proposals,;

d) it is in line with relevant aims and policies in the NLWP, London Plan, Opportunity Area Planning Frameworks, Local Plans and related guidance; and

e) waste is being managed as far up the waste hierarchy as practicable

This policy helps meet strategic objectives SO2 and SO3

This policy contributes towards Spatial Framework components B

9.21 The purpose of this policy is to ensure that development for new waste facilities on sites which do not form part of the planned strategy in the NLWP make a positive contribution to managing waste in North London. Windfall sites refer to locations which are not identified in Schedules 1-3 of this Plan. Windfall sites will cater for the needs of new waste facilities as well as those of displaced facilities lost under proposals considered under Policy 1. Windfall sites will also need to comply with Policy5 which applies to all proposed waste developments.

9.22 The site search process for suitable potential locations for waste facilities has been extensive, thorough, and subject to public consultation, Equality Impact Assessment (EQIA), Sustainability Appraisal (SA) and Habitats Regulations Assessment (HRA). However, there remains a possibility that sites not identified in the plan i.e. windfall sites may be brought forward by operators or landowners for waste development over the plan period.

9.23 Developers of windfall sites are required to demonstrate why the sites and areas in Schedules 1, 2 and 3 are not available or suitable or that the proposed site would be better suited to meeting the identified need having regard to the Spatial

FrameworkPrinciples of the NLWP. There may be instances in the future where advances in waste technologies are such that the identified sites/areas do not meet the technical requirements of a proposed waste management facility, for example, the identified locations might be too small for the proposed development or the facility may need to be located near a specific waste producer or user of heat. Some of the areas identified in Policy 2 may become unavailable over the Plan period because they will be used for other purposes or affected by future development proposals such as Crossrail 2 and Opportunity Areas. Locating certain types of waste processing sites within large scale redevelopment areas may also have benefits for reducing need for waste transport especially during the construction phase for the management of CDE. In addition, it is also recognised that proposals on windfall site may come forward to provide capacity for displaced facilities from within the plan area where existing capacity needs to be re-provided locally and this need cannot be net through the existing allocations.

9.24 Proposals for waste development on windfall sites will be supported where the proposal would not compromise existing planning designations and where the impacts on communities and environment can be satisfactorily controlled. This In proposing a windfall site, developers will need to demonstrate that he special framework set out in chapter 4 has been considered, and in particular should not work against the spatial principle of balanced geographical distribution as set out in the Spatial Framework.

9.25 Proposals for waste development on windfall sites should be in line with the London Plan, the NLWP, and Local Plans adopted by the North London boroughs. Proposals for waste facilities on windfall sites will need to demonstrate compliance with the same planning and spatial criteria (Table 10, section 8) used for the identification of sites and areas in the NLWP, and any other relevant material considerations, including the assessment criteria as set out within policy 5. The windfall sites policy has been developed to ensure that any unplanned development contributes positively to future waste capacity in the plan area while not undermining the approach to development set out in the NLWP, the London Plan and Local Plans. Any waste development brought forward on a windfall site must meet the same high level of sustainability as the areas identified through the site selection process.

9.26 Applications for waste developments on windfall sites will need to demonstrate how the application supports delivery of the NLWP and assists in the aim of net self-sufficiency by providing capacity that addresses the requirements of North London to manage more of its own waste or in providing replacement capacity for an existing facility which has been displaced. In line with the aim and objectives of the plan, planning applications will need to demonstrate that there will be social, economic and environmental benefits from the development and that amenity will be protected.

9.27 Historically, waste development has been concentrated within the east and west of North London. Policy 3 provides an opportunity to develop a wider network of sites across the area, in line with the Spatial Framework. This policy allows new sites to come forward across the area where demand and commercial opportunity arise helping to provide a wider spread of facilities across the plan area in future.

9.28 There will be mixed use developments across North London within the period of the NLWP. The ~~revised~~New London Plan (July 2019) sets out a framework for development of new housing and employment together with the ancillary development necessary to sustain that development. Crossrail 2 will impact considerably on north London as mixed use development is expected to accumulate around Crossrail 2 stations.

9.29 In large scale redevelopment areas across the boroughs there is opportunity to plan for waste uses to form part of the master-planning process. In this way it should be possible to design-out any potential land use conflicts with non-waste uses in close proximity and support the agent of change principle as promoted by the draft New London Plan (July 2019). In such areas it may also be beneficial to allow temporary sites that can manage CDE waste generated as part of the redevelopment, subject to licencing and planning requirements.

9.30 In areas which contain a mixed use of employment and housing, suitable waste uses are likely to be re-use, repair or recycling uses. The following issues need special considerations when designing waste facilities into a mixed use area as part of the master planning process.

- How to minimise visual and acoustic nuisance from the site to residential properties and other uses, including utilising suitable screening , building orientation including avoiding residential units overlooking waste operations or vehicle site access points, and use of appropriate building materials.
- Impact of odour, dust, litter on local amenity – An Environmental Management Plan to be submitted in support of a planning application to be applied to prevent such impacts from becoming a nuisance;
- Access and traffic – consider the most appropriate route and timing for vehicles to access the waste facility and separation of access to avoid conflict with traffic and access associated with neighbouring uses.

These issues are considered in more detail in policy 5 including a presumption that waste uses will be enclosed.

9.31 The test of whether the proposed operations are acceptable in terms of the waste hierarchy will be based on the type of waste and the treatment proposed and demand.

Policy 4 – Re-use & Recycling Centres

Policy 4 – Re-use & Recycling Centres

Proposals for Re-use & Recycling Centres will be permitted where:

a) They improve the coverage of centres across the North London Boroughs, in particular ~~are sited~~ in an area of identified need for new facilities in Barnet or Enfield ~~or elsewhere where they improve the coverage of centres across the North London Boroughs,~~ and;

b) They are in line with relevant aims and policies in the North London Waste Plan, London Plan, Local Plans and other related guidance.

This policy helps meet strategic objectives SO1, SO2 and SO3

This policy contributes towards Spatial Framework components B

9.32 Re-use & Recycling Centres (RRCs) provide members of the public with access to a wider range of recycling facilities and they also deal with bulky items. There are currently eight~~nine~~ RRCs in North London of which seven~~eight~~ are the responsibility of the North London Waste Authority (NLWA). They are safeguarded for waste use under Policy 1. The NLWA has identified areas of deficiency in coverage in parts of Barnet and Enfield and is seeking to address this by providing new or replacement sites so that 95% of residents live within two miles (measured as a straight line) of a facility[19] - see Figure 7 in Section 4. The NLWA is also proposing a new RRC on the Edmonton EcoPark site as part of its current Development Consent Order (DCO) application on the site. The Spatial Framework seeks a network of waste sites across North London and, as part of this aim, to ensure residents have good access to RRCs where there is an identified need.

9.33 Re-use & Recycling Centres should be located where they can provide appropriate access for members of the public and for contractors and their vehicles. They are best sited on former waste sites or in areas of industrial or employment land and need to be of a sufficient size for the range and quantity of materials likely to be received. Sites within areas identified in Schedules 1, 2 and 3 ~~Areas suitable for waste management~~ are likely to be the most suitable locations, and Policy 3: Windfall Sites will apply to any application for an RRC outside of these areas. There

[19] Household Waste Recycling Centre Policy, North London Waste Authority (June 2010)

may be scope to provide localised recycling centres as part of major new development.

Policy 5: Assessment Criteria for waste management facilities and related development

Policy 5: Assessment Criteria for waste management facilities and related development

Applications for waste management facilities and related development, including those replacing or expanding existing sites, will be required to demonstrate to the satisfaction of the relevant Borough that:

a) the amenity of local residents is protected;

b) the facility will be enclosed unless justification can be provided by the developer ~~as to why that is not necessary~~that an equivalent level of protection can be permanently achieved by other means;

c) adequate means of controlling noise, vibration, dust, litter, vermin, odours, air and water-borne contaminants and other emissions are incorporated into the scheme;

d) there is no significant adverse effect on any established, permitted or allocated land uses likely to be affected by the development;

e) the development is of a scale, form and character in keeping with its location and incorporates appropriate high quality design;

f) there is no significant adverse impact on ~~the historic environment (heritage assets and their settings, and undesignated remains within Archaeological Priority Areas)~~, open spaces or land in recreational use or landscape character of the area including the Lee Valley Regional Park;

new) heritage assets and their settings are conserved and where appropriate enhanced;

~~f)~~g) active consideration has been given to the transportation of waste by modes other than road, principally by water and rail;

~~g)~~h) there are no significant adverse transport effects outside or inside the site as a result of the development;

~~h)~~i) the development avoids increasing the levels of vulnerability to climate change, makes appropriate adaptation and mitigation measures to achieve this, and helps reduce greenhouse gas emissions~~makes the fullest possible contribution to climate change adaptation and mitigation~~;

~~i)~~j) the development has no adverse effect on the integrity of an area designated under the Habitats Directive and no significant adverse effect on local biodiversity or water quality;

~~j)~~k) there will be no significant impact on the quality of underlying soils, surface or groundwater;

~~k)~~l) the development has no adverse impact on Flood Risk on or off site and aims to reduce risk where possible;

m) ~~appropriate permits are held or have been applied for from the Environment Agency~~

~~l) ;~~

~~m)~~n) there is no adverse impact on health

~~n)~~o) there are no significant adverse effects resulting from cumulative impact of any proposed waste management development upon amenity, the economy, the natural and the built environment either in relation to the collective effect of different impacts of an individual proposal, or in relation to the effects of a number of waste developments occurring concurrently or successively.

~~o)~~p) There are job creation and social value benefits, including skills, training and apprenticeship opportunities[20].

~~p)~~q) The proposal is supported by a Circular Economy Statement

This policy helps meet strategic objectives SO4, SO5, SO7 and SO8

This policy contributes towards Spatial Framework component E

9.34 Policy 5 seeks to ensure that the construction and operation of waste facilities does not give rise to an unacceptable impact on health~~,~~ or harm the **amenity** of local residents or the environment. Amenity is defined as any element providing positive attributes to the local area and its residents and impacts can include such issues as, but not limited to, increased levels of local air pollution, increased noise disturbance, light impacts including increased light or reduced light or sunlight, reduced privacy, loss of outlook and reduced visual amenity. Applicants will need to demonstrate that appropriate measures and/or Best Available Techniques (BAT) (where applicable)have been taken to minimise any potential impacts from the proposed waste development to ensure the protection of local amenity and healthy.

[20] This requirement is an issue for all development and waste applications should provide details as to how they will meet these objectives.

The specific requirements will vary from site to site, however issues to be addressed may include strict hours of operation, effective cladding on buildings to prevent noise pollution, and dust and odour suppression systems as appropriate. These issues are discussed in more detail below.

9.35 Waste facilities can be separated into **'enclosed'** facilities, where waste is processed inside a building and 'open' facilities, which largely deal with waste in the open air. Waste facilities are often seen as bad neighbours, due to problems associated with open air facilities. It is current best practice that the operations are carried out within a covered building enclosed on all vertical sides with access and egress points covered by fast acting doors which default close in order to minimise local public health and environmental impact. Such enclosed facilities are similar in appearance to modern industrial shed developments such as factories or logistics facilities and it is this type of facility that is the focus of the NLWP site allocations. 'Open' facilities are unlikely to be suitable for North London as outlined in the section 3 of the Plan except in exceptional circumstances. There are types of waste development for specific waste streams or waste types that may not need to or should not be enclosed but any activity likely to cause dust should be carried out within a building or enclosure. Enclosing waste management facilities not only results in less dust and particulate pollution but will also reduce the risk of pollution caused from other amenity issues such as noise, pests and odour. **Noise, vibration, dust, litter, vermin, odours, air and water-borne contaminants**, other emissions and their potential health impacts have been a major concern raised through public consultation. However, well sited, and well managed facilities should not cause harm or disturbance. Details of controls for emissions (including bio aerosols) from the site need to be supplied with the application. Planning conditions and section 106 agreements will be used to secure measures to address any issues where necessary and where control is not already exercised through other consent regimes (i.e. the requirement for environmental permits, which is assessed by the Environment Agency). Applicants will be expected to comply with Borough policies on contaminated land. The North London boroughs require that any development can safely complement surrounding uses.

9.36 The North London boroughs expect well controlled and well-designed waste facilities capable of fitting in with **surrounding land uses** and acting as good neighbours. Where development is proposed close to residential areas, in line with the agent of change principle, the design must incorporate noise reduction measures as well as dust and odour suppression as necessary. It should be designed to minimise its impact on the local area and ensure it is compatible with existing surrounding land uses. When assessing planning applications for waste uses, in addition to Policy 5,

the boroughs will also have regard to the criteria in Appendix B of the NPPW and relevant London Plan and Local Plan policies. Applicants are required to submit sufficient information to enable the waste planning authority within which the subject site falls to assess the potential impact of the development proposal on all interests of acknowledged importance. Applicants are encouraged to contact the relevant borough prior to submitting a planning application to discuss relevant matters. Where new waste development is being sited near existing waste sites, developers will be expected to consider potential cumulative impacts as well as also demonstrating any possible benefits of co-locating waste development. **Good design** is fundamental to the development of high quality waste infrastructure and the North London boroughs seek approaches that deliver high quality designs and safe and inclusive environments. The documents submitted in support of the planning application should set out how the development takes on board good practice such as the Defra/CABE guidance on designing waste facilities[21]. The supporting documents should set out how the siting and appearance complements the existing topography and vegetation. Materials and colouring need to be appropriate to the location. The development should be designed to be in keeping with the local area and include mechanisms for reducing highway deposits[22], noise and other emissions where necessary.

9.37 The supporting documents should set out how landscape proposals can be incorporated as an integral part of the overall development of the site and how the development contributes to the quality of the wider urban environment. The applicant will need to demonstrate that there will be no significant adverse effect on areas or features of landscape~~, historic~~ or nature conservation value. Where relevant, applications for waste management facilities and related development will be required to demonstrate that they conserve and, where appropriate, enhance heritage assets and their settings including consideration of non-designated archaeology where relevant ~~the delivery of waste facilities (through construction to operation) should take account of the need to conserve and enhance the historic environment in~~ line with the NPPF.

9.38 Where sites include, or are likely to have an impact on the setting of a **heritage** asset both designated (Listed Buildings, Conservation Areas, Scheduled Ancient Monuments, Registered Historic Parks and Gardens and Battlefields) and

[21] Designing waste facilities – a guide to modern design in waste, Defra & CABE, 2008

[22]This can be achieved through provision of wheel wash facilities etc where required and placing conditions of the applications to ensure all vehicles are covered

undesignated, including archaeology, it should be demonstrated that the development will conserve the significance of the asset. Where the site has potential to include assets with archaeological interest, such as if it is in an archaeological area identified in a Borough Local Plan or may affect a site recorded on the Greater London Historic Environment Record, an appropriate desk based assessment and, where necessary, a field evaluation, is required to accompany the planning application. Where such an assessment and evaluation confirms significant archaeological interest then appropriate mitigation by design or investigation is also required.

9.39 A large part of the Lee Valley Regional Park (1483 ha) falls within four of the North London Boroughs involved in the Plan; Waltham Forest, Haringey, Enfield and Hackney. New development should contribute to the protection, enhancement and development of the Regional Park as a world class visitor destination and the wider public enjoyment of its leisure, nature conservation, recreational and sporting resources. The Lee Valley is a significant resource for North London and developments should not have an adverse effect on the **open space** and character of the area, and should aim to contribute to its enhancement where appropriate.

9.40 Waste and recyclables require transportation at various stages of their collection and management and so opportunities to employ more sustainable options such as rail and river should be fully considered. North London is characterised by heavy traffic on all principal roads. That is why developers need to prioritise **non-road forms of transport** if at all possible and to set out their assessment in a Transport Assessment detailing transport issues to be submitted with any planning applications for waste facilities (see below). In North London there exists considerable potential for sustainable transport of waste as part of the waste management process. There are a number of railway lines and navigable waterways in North London including the Regents Canal and the Lee Navigation. It is existing practice to transport waste by train and pilot projects have taken place to transport waste by water. Developers are required to demonstrate that they have considered the potential to use water and rail to transport waste before reliance on transport of waste by road. Where the site lies adjacent to a wharf or waterway, capable of transporting waste, developers need to demonstrate that consideration has been given to the provision and/or enhancement of wharf facilities. Waste transfer activities that do take advantage of rail and or boat transportation must also ensure that they design their site and meet the standards required by all waste management sites stated in this Plan.

9.41 Applicants will need to submit a **Transport Assessment** in line with the relevant borough Local Plan policy and the London Plan. The Transport for London Best

Practice Guide contains advice on preparing Transport Assessments when they are required to be submitted with planning applications for major developments in London. Consideration should be given to access arrangements, safety and health hazards for other road users, the capacity of local and strategic road networks, impacts on existing highway conditions in terms of traffic congestion and parking, on-site vehicle manoeuvring, parking and loading/unloading areas, and queuing of vehicles. The statement should include a traffic management plan establishing the times of access for vehicles to minimise disruption on the local road network during peak hours, and setting out specific routes to ensure that vehicles are accessing the site via roads considered suitable by the Highways Authority and, where possible, avoid overlooking of the site access by residential properties.

9.42 The development of Servicing and Delivery Plans and Construction Logistic Plans (CLP) will be encouraged for all waste developments. Such Plans ensure that developments provide for safe and legal delivery and collection, construction and servicing including minimising the risk of collision with vulnerable road users such as cyclists and pedestrians. Consideration should be given to the use of Direct Vision Lorries for all waste vehicles and the use of freight operators who can demonstrate their commitment to TfL's Freight Operator Recognition Scheme (FORS) or similar.

9.43 Sustainable design, construction and operation of waste management development will be assessed against relevant borough Local Plan policies. Consideration should be given to how the development contributes to the mitigation of and adaption to **climate change**, promotes energy and resource efficiency during construction and operation with the aim of developments being carbon neutral, the layout and orientation of the site and the energy and materials to be used. Developments should achieve the highest possible standard under an approved sustainability metric such as BREEAM or CEEQUAL in line with the relevant borough's policies. Information supplied should enable the borough in question to assess the proposal against relevant planning policies by clearly setting out how the application complies with sustainable design and construction policies and guidance including measureable outputs where appropriate. Where appropriate, production of a site waste management plan should be provided prior to the commencement of construction of the development.

9.44 ~~Waste developments should be designed~~Criteria 5j seeks to protect and enhance local **biodiversity**. Development proposals will be assessed against this policy as well as other relevant principles and policies set out in the NPPF and Borough Local Plans. Development that would have an adverse effect on any area designated under the Habitats Directive will not be permitted. Assessments undertaken for the Plan have identified sites of European Community importance within and nearby

the Plan area. Sites at least partially within the Plan boundary are the Lee Valley Special Protection Area (SPA) and RAMSAR site and part of Epping Forest Special Area for Conservation (SAC). Additional sites at least partially within 10 km of the Plan area boundary are Wormley-Hoddesdon Park Woods SAC and Wimbledon Common SAC3. Developers need to be able to demonstrate that their proposals will not have an adverse effect on the integrity of any European site. In addition there are six Sites of Special Scientific Interest and 20 Local Nature Reserves as well as sites of importance to nature conservation (SINC). Developers should take note of existing Biodiversity Action Plans, protect existing features and promote enhancement for example through the use of green walls where acoustic barriers are required. Where a development site is adjacent to a river the Environment Agency has advised that a setback of a minimum of 8 metres from the top of the bank should be incorporated into any redevelopment proposals. Consistent with this advice, setting back waste management development (not including wharf development) from watercourses and providing an undeveloped buffer zone free from built structures will be important for maintaining access to the river, to allow the landowner access for routine maintenance activities and for the Environment Agency to carry out Flood Defence duties. Maintaining a sufficient wildlife and riverside corridor is also important for minimising the potential adverse impacts to the **water quality** and riverine habitats. This will provide opportunities for flood risk management in line with the Environment Agency Catchment Flood Management Plans. Opportunities for river restoration through the development of sites should also be encouraged to ensure compliance with requirements under the Water Framework Directive and the Thames River Basin Management Plan.

9.45 There are a number of **groundwater** source protection zones in North London to protect drinking water supplies and prevent contamination of aquifers. Source protection zone 1 boundaries are defined in the immediate area of boreholes and other abstraction points. Waste facilities may be permitted in source protection zone 1 provided that any liquid waste they may contain or generate or any pollutants they might leach, especially if hazardous, do not pose an unacceptable risk to groundwater. A groundwater risk assessment will be required. Soil quality will need to be protected from potential adverse impact by certain operations, such as open windrow composting. The following waste facilities are considered lower risk and are more likely to be acceptable:

- Energy from Waste ;
- In-Vessel Composting activities;
- Mechanical Biological Treatment;
- Materials Recycling Facility (dry wastes only), and;

- Waste Electrical and Electronic Equipment (WEEE) sites that exclude potentially polluting wastes.

9.46 Higher risk waste uses are less likely to be acceptable in source protection zone 1. Early liaison with the Environment Agency is encouraged.

9.47 Source protection zone 2 covers a wider area around an abstraction point. Where developments are proposed in source protection zone 2, a risk assessment will be required and any waste operation apart from landfill may be considered. Where sites are in source protection zones, developers are encouraged to engage in early discussions with the Environment Agency.

9.48 The North London Strategic Flood Risk Assessment (SFRA) and individual borough 'Level 2' SFRAs have demonstrated the current risks from **flooding** from various sources across North London and site specific flooding assessments have been undertaken on new sites/areas in schedules 2and 3. Where a site is near or adjacent to areas of flood risk, the development is expected to contribute through design to a reduction in flood risk in line with the NPPG. Development proposals will be required to assess the impact of climate change using the latest published climate change allowances, mitigate to the appropriate future flooding scenario using thses allowances. A sequential approach to the layout of the site should be taken aiming to locate development in the parts of the site at lowest risk of flooding. Waste facilities are often characterised by large areas of hardstanding for vehicles and large roof areas. Development proposals will be required to show that flood risk would not be increased as part of the scheme and, where possible, will be reduced overall through the use of Sustainable Drainage Systems (SuDS) and other techniques. Any proposed development should be reviewed by the Environment Agency at an early stage to discuss the reduction of flood risk on the site.

~~9.49 Developers of waste facilities should at the time they submit their planning application be engaged with the Environment Agency and hold or be in the process of applying for appropriate **permits from the Environment Agency** as the contemporaneous consideration of planning and environmental permit enables the application to be considered in the round.~~

9.49

9.50 Developers of waste facilities will need to fully identify the **health implications** of the development and plan the most appropriate scheme to protect the surrounding uses and community. Any proposed waste development which is required to have an Environmental Impact Assessment will also require a Health Impact Assessment.

9.51 Paragraph 5 of the National Planning Policy for Waste (NPPW) requires consideration be given to:

"The cumulative effect of existing and proposed waste disposal facilities on the well-being of the local community, including any significant adverse impacts on environmental quality, social cohesion and inclusion or economic potential".

9.52 **Cumulative impacts** relate to the way in which different impacts can affect a particular environmental resource or location incrementally, for example, combined noise, dust and traffic emissions on a dwelling from a new road scheme. In essence, cumulative impacts are those which result from incremental changes caused by other past, present or reasonable foreseeable actions together with the proposed development. Therefore, the potential impacts of the proposed development cannot be considered in isolation but must be considered in addition to impacts already arising from existing or planned development.

9.53 In determining an application for a new waste facility, account will normally be taken of the potential cumulative impact of waste management and other development within the locality and in particular the area's capacity to absorb that change. Factors to be taken into account will include; the nature of the waste and the process involved; the direction of the prevailing wind; the amount of enclosure for the processes; use of odour neutralisation and minimisation; measures for dust control; the number of persons affected by the development and its duration; the effects on amenity that pollution would cause; local topography providing natural screening; the extent of noise and vibration generated by the operations; the proposed hours of working; and the impact of flood-lighting. In some instances, the combined impact of development over a sustained period of time may be sufficient to warrant refusal of planning permission. However it is acknowledged that cumulative impacts can have positive impacts through synergies with other local waste uses and businesses in the area. Such synergies may lead to less road miles for waste as well as the potential development of green industry hubs attracting more highly skilled and technical jobs. Proposals should seek to make a positive contribution to improving issues of deprivation and inequality within local communities. Where an area has historically hosted significant waste infrastructure and is moving towards regeneration initiatives to improve its economic and investment potential, the cumulative impact on these regeneration activities should be considered when waste development is proposed, especially where the benefits of co-location and economies of scale are outweighed by a resultant reduction in land values, employment opportunities and regeneration potential. In these circumstances where development takes place, opportunities to address inequalities should be taken up in order to promote a better spatial distribution of facilities and avoid undue concentration of waste uses.

9.54 As stated throughout this document applications will be assessed against the full suite of relevant **national, London Plan and Local Plan policies** and guidance. However, given the status of the NLWP as a multi-Borough DPD which will form part of the Local Plan of each of the seven Boroughs, Policy 5 is a valuable signpost to impacts that will be considered in the determination of applications.

9.55 As part of the application, and in line with policies in the borough local plan, Developers should give details of the jobs created as a result of the new development, the level of skills required and the availability of **training and apprenticeship** opportunities. Developers should seek to meet the aspirations of borough economic and employment strategies and make a positive contribution to the local economy.

9.56 As part of the Circular London programme, LWARB published a **Circular Economy** Route Map in June 2017. The Route Map recommends actions for a wide range of stakeholders, including London's higher education, digital and community sectors as well as London's businesses, social enterprises and its finance sector. Developers should submit a Circular Economy Statement in line with the draft New London Plan (July 2019) and guidance issued by the Mayor.

Policy 6: Energy Recovery and Decentralised Energy

Policy 6: Energy Recovery and Decentralised Energy

Where waste cannot be managed at a higher level in the waste hierarchy and recovery of energy from waste is feasible, waste developments should generate energy and/or recover excess heat (including the recovery of energy from gas) and provide a supply to networks including decentralised energy networks.

Where there is no available decentralised energy network and no network is planned within range of the development, as a minimum requirement the proposal should recover energy through electricity production and be designed to enable it to deliver heat and/or energy and connect to a Decentralised Energy Network in the future.

Developers must demonstrate how they meet these requirements, or provide evidence if it is not technically feasible or economically viable to achieve them, as part of a submitted Energy Statement.

This policy helps meet strategic objectives SO1 and SO6

This policy contributes towards Spatial Framework component D

9.57 Tackling climate change is a key Government priority for the planning system and a critical new driver for waste management. The purpose of this policy is to ensure that applications for waste management facilities incorporate opportunities for sustainable energy recovery and combined heat and power (CHP) where feasible and practicable. The policy complements more detailed policies in borough Local Plans on financial contributions relating to feasibility, sustainable design, CHP and development of heat networks, against which applications will also be considered.

9.58 The NPPW and the London Plan both recognise the benefits to be gained from any energy from waste facility to capture both heat and power, and encourage all developments of this kind to achieve that end.

9.59 National policy for renewable energy says that Local Development Documents, such as the NLWP, should contain policies that promote and encourage, rather than restrict, the development of renewable energy resources. The London Plan includes minimum performance for technologies for generating energy from London's waste, known as the carbon intensity floor. This has been set at 400 grams of CO_2 eq generated per kilowatt hour (kwh) of electricity generated.

9.60 The GLA has committed to working with London Boroughs and partners in the private sector to develop opportunities by providing assistance for commercialisation of large decentralised energy projects. Opportunities for district heating were identified across London as part of the Decentralised Energy Master Planning programme led by the GLA in 2008-2010[23]. The programme initially focused on identifying opportunities for district heating networks through heat mapping and energy masterplanning with the London Boroughs.

9.61 Work is already underway to progress the delivery of a decentralised network in the Lee Valley known as Meridian Water ~~the Lee Valley Heat Network (LVHN). The LVHN~~ Meridian Water will capture affordable low carbon heat from waste to energy facilities and combined heat and power plants, supplying it to buildings and industry across the Lee Valley. Meridian Water~~The LVHN~~ is requesting hot water to be supplied for the energy from waste facility (EfW) at Edmonton EcoPark. However, over time, the network will connect additional heat sources, including other waste developments, elsewhere in the Lee Valley. Any future plans to redevelop the site,

[23] London Heat Map – www.londonheatmap.org.uk

including the current plan for Meridian Water should ensure that the openness and permanence of the Green Belt is maintained in accordance with draft New London Plan Policy G2.

Policy 7: Waste Water Treatment Works and Sewage Plant

Policy 7: Waste Water Treatment Works and Sewage Plant

Proposals for the provision of new facilities for the management, treatment and disposal of wastewater and sewage sludge will be permitted, provided that:

- it is demonstrated that there is an identified need for such a facility within the North London Waste Plan Area, which cannot be met through existing waste facilities; and
- the proposals meet the other policies of this North London Waste Plan together with all other relevant policies of the appropriate borough's Development Plan.~~, and meet environmental standards set by the Environment Agency.~~

This policy helps meet strategic objectives SO1, SO2 and SO5

This policy contributes towards Spatial Framework component B

9.62 Waste Water Treatment Works in North London are operated by Thames Water, with the main facility being Deephams Sewage Treatment Works (STW), which is the ninth largest in England. ~~Deephams STW serves a Population Equivalent (PE) of 891,000 (as at 2011).~~ Works to Deephams STW to ~~are planned to commence in 2018 providing~~ provide sufficient capacity to meet Thames Water's projections of future requirements into the next decade~~.~~ Were largely constructed by March 2017 and being completed during 2018/2019. The upgrade increased capacity from a Poulation Equivalent (PE) of 891,000 (as at 2011) to 989,000 PE. At the time the upgrade was designed (in line with population predictions at the time) it was envisaged the upgrade will accommodate population growth up until at least 2031. However, treatment capacity will be reviewed in future AMP periods to ensure ongoing capacity in relation to changing population growth predictions.

9.63 The Environment Agency has issued a significantly tighter environmental permit that came into force in March 2017 and required~~requires~~ Thames Water to make improvements to the quality of the discharged effluent. The need for an effluent

upgrade to Deephams STW is highlighted in the National Planning Statement on Waste Water, and planning permission for this work was granted by Enfield Council in 2015. The site is to be retained for waste water use and Thames Water anticipates that the approved recent upgrade to Deephams STW will provide sufficient effluent treatment capacity to meet their needs into the next decade~~during the plan period~~.

9.64 The boroughs will work with Thames Water and the Environment Agency to ensure that adequate and appropriate waste water treatment infrastructure is provided to meet environmental standards and planned demand. In September 2014 the Government approved plans to build the Thames Tideway Tunnel - a 25km conduit flowing beneath the Thames which would provide collection, storage and transfer capacity for waste water and rainwater discharge from a significant part of Central London. Construction is scheduled to begin in 2018 with completion scheduled for 2023. Once completed the new tunnel will be connected to the Lee Tunnel which will transfer sewage to the expanded Beckton Sewage Treatment complex. The proposal has indirect implications for the Plan area in that it will benefit from the additional capacity and this will relieve pressure for further expansion of local Waste Water Treatment Works.

9.65 Any other new waste water and sewage treatment plants, extensions to existing works, or facilities for the co-disposal of sewage with other wastes will be supported where the location minimises any adverse environmental or other impact that the development would be likely to give rise to, and the suitability of the site can be justified in accordance with this Plan. The Plan has a supporting role to identify suitable locations for additional infrastructure.

Policy 8: ~~Control of~~ Inert Waste

Policy 8: ~~Control of~~ Inert Waste

Inert waste should be managed as far up the waste hierarchy as possible, including on-site recycling and reuse of such material.

Proposals for development using inert waste will be permitted where the proposal is for beneficial use, including but not limited to:~~both essential for, and involves the minimum quantity of waste necessary for:~~

a) ~~The purposes of r~~Restoring former mineral working sites; or
b) Facilitating an improvement in the quality of land; or
c) Facilitating the establishment of an appropriate use in line with other

policies in the Local Plan; or

d) Improving land damaged or degraded as a result of existing uses and where no other satisfactory means exist to secure the necessary improvement.

~~Where one or more of the above criteria (a-d) are met, a~~All proposals using inert waste should:

a) Incorporate finished levels that are compatible with the surrounding landscape. The finished levels should be the minimum required to ensure satisfactory restoration of the land for an agreed after-use; and
b) Include proposals for high quality restoration and aftercare of the site, taking account of the opportunities for enhancing the overall quality of the environment and the wider benefits that the site may offer, including biodiversity enhancement, geological conservation and increased public accessibility.

Proposals for inert waste disposal to land will not be permitted if it can be demonstrated that the waste can be managed through recovery operations ~~and that there is a need to dispose of waste~~.

This policy helps meet strategic objectives SO1, SO2 and SO3

This policy contributes towards Spatial Framework component B

9.66 Construction, demolition and excavation waste is largely made up of inert construction waste, such as bricks and hardcore which can be used in site restoration and land reclamation projects.

9.67 Recycling and reuse of inert waste applications for all types of development should demonstrate that viable opportunities to minimise construction and demolition waste disposal will be taken, making use of existing industry codes of practice and protocols, site waste management plans and relevant permits and exemptions issued by the Environment Agency.

9.68 Inert waste materials can be an important resource and should be used for beneficial purposes, such as the restoration of mineral sites and in engineering works, or at other 'exempt sites' rather than disposed of at inert landfill sites. A definition of 'beneficial uses' can be found in the New London Plan. Increased use of recycled and secondary aggregates can reduce the need and demand for primary aggregates extraction. Site operators will need to conform to the 'Aggregates from inert waste Quality Protocol' document to achieve 'end of waste' status. If this cannot be

achieved and/or the operator cannot prove compliance with the protocol, then the material will not have achieved 'end of waste' status and will still be considered a waste and subject to controlled waste legislation. There is no 'end of waste' criteria for soil so this will always be viewed as a waste once it has become a controlled waste outside of the Definition of Waste Code of Practice.

9.69 Inert waste will continue to be deposited to land where it is reused for beneficial purposes, including within engineering schemes, for the restoration of mineral workings, and for agricultural improvement. Recycling and recovery are the preferred methods of management and inert waste should only be disposed of to land as a last resort, consistent with the waste hierarchy. Proposals on unallocated sites for the recycling of inert waste will be permitted where it can be demonstrated that there is a market need, consistent with the principle of net self-sufficiency.

9.70 There should be a clear benefit or benefits from the proposed development. This should be a benefit to the site itself, for example, the use of residual inert material associated with the restoration of an active or dormant mineral working the restoration of a former mineral working to agriculture or an engineering operation for the provision of a new leisure facility. However, given the likely disturbance to local communities and the local environment, for example, due to the movement of HGVs, there should be benefits for the wider area, for example, through environmental improvement or the creation of new public rights of way.

10. Monitoring and Implementation

Monitoring the Plan

10.1 The Planning and Compulsory Purchase Act (2004) requires planning authorities to monitor and report annually on whether the Aims and Objectives of all local plans (whether prepared individually or in conjunction with other authorities) are being achieved (paragraph 35). The NPPW identifies the need to monitor and report on the take-up of allocated sites and areas; changes in the available waste management capacity as a result of closures and new permissions; and the quantities of waste being created locally and how much is being managed at different levels in the waste hierarchy i.e. recycling/composting, recovery, and disposal.

10.2 Monitoring is also required to check on whether the intending policy outcomes of the NLWP are being delivered and whether the identified capacity gaps are being met through the allocated areas listed in Policy 2. Monitoring will also ensure that sufficient identified land remains available for new facilities during the plan period which is also likely to see intense competition for land for other uses especially housing. The results of monitoring will also play an important role in informing Development Management decisions when authorities determine planning applications for new waste facilities.

10.3 Responsibility for monitoring lies with the individual boroughs. However, the boroughs have agreed to monitor the Plan jointly through a lead borough agreement. Data will be collated ~~by each borough~~ and included in a joint NLWP ~~their Authority~~ Monitoring Report~~, which is produced annually~~.

10.4 To supplement the boroughs' annual monitoring, it will be important for the GLA to monitor London Plan waste Policies ~~5.16 and 5.17~~ and gather data in partnership with the boroughs on waste arisings, waste management capacity, both within London and landfill outside of London.

Proposed monitoring framework

10.5 The aim of monitoring is to check whether the policy framework in the NLWP is working as intended. The proposed monitoring indicators reflect a number of National Indicators and also the statutory and non-statutory performance targets including those set by the EU, the Waste Policy for England and the London Plan. The list of indicators is not intended to be exhaustive and is intentionally focused on parameters where it is possible to evaluate the effect of the NLWP. For example, an indicator reporting on the number of times air quality thresholds were exceeded is of

little use if the contribution of waste management facilities and transport of waste cannot be differentiated from those of other activities.

10.6 Table 14 sets out the monitoring indicators proposed for each policy in the NLWP and identifies targets where appropriate. In some cases it will only be necessary to monitor (i.e. count the number of instances of) what has happened in the preceding year. In line with statutory requirements, the North London boroughs will review the plan every five years. If any targets are not being met the boroughs will assess where changes can and should be made.

Table 14: NLWP Monitoring Indicators

Indicator	Target(s)	What it monitors	Outcome(s) sought
1. Amount of Land within identified areas or on windfall sites brought forward for waste use during the plan period.	In line with Table 7: landtake requirements	SO2 (capacity provision) Policy 2: Area allocations Policy 3: Unallocated sites	To check that identified sites and areas are being taken up as anticipated.
2. Sites in Schedule 1 and Areas in Schedules 2 and 3 lost to other non-industrial uses through a major regeneration scheme or designated for non-industrial uses in a review of the London Plan or Local Plan	Less than 25% of land lost If 50% of land is lost this will trigger review of plan	SO2 (capacity provision) Policy 2: Area allocations	To check that identified land is sufficient to deliver the plan's aims To ensure sufficient existing capacity remains for managing the levels of waste expected across North London over the plan period as set out in Table 8.
3. Tonnage of waste capacity, including new waste capacity available by management type (recycling/composting, recovery and disposal) and type of wastes handled (LACW, C&I and CD&E)	Capacity sufficient to manage capacity requirements as set out in Table 6 Capacity Gaps. New waste facilities in line with Table 7: land take requirements	Strategic Aim (capacity supply and self-sufficiency) Strategic Aim (move waste up Waste Hierarchy) SO1 (resource efficiency) SO3 (net self-sufficiency) Meeting Future	Ensure that new waste facilities will close identified capacity gaps Support delivery of the London Plan apportionment and the additional capacity required to achieve a net self-sufficient outcome across the principal waste streams

Indicator	Target(s)	What it monitors	Outcome(s) sought
		Requirements as specified in the NLWP Policy 2: Area allocations Policy 3: Unallocated sites Policy 4. Reuse and Recycling Centres Policy 7 Waste Water Treatment Works and Sewage Plant Policy 8 Control of Inert Waste	
4. Loss of existing waste capacity and provision of replacement capacity	Zero loss Replacement locally, within the Borough, North London or London Replacement capacity for Brent Cross Cricklewood provided within Barnet	Strategic Aim (capacity supply and net self-sufficiency) SO2 (capacity provision and protection) Policy 1: Safeguarding existing waste management sites	Ensure sufficient capacity of the right type is available throughout the plan period Ensure that capacity is replaced locally unless valid planning reasons are provided for not doing so.
5. Total quantity of waste	In line with Table 8 in	Strategic Aim (capacity	Ensure the NLWP meets EU, national

Indicator	Target(s)	What it monitors	Outcome(s) sought
arisings managed by waste stream (LACW, C&I and CD&E) and management route (recycling/composting, recovery and disposal)	Section 7 and the Data Study	supply and self-sufficiency) Strategic Aim (move waste up Waste Hierarchy) SO1 (resource efficiency) SO3 (net self-sufficiency) Meeting Future Requirements as specified in the NLWP % waste diverted and % landfilled	Waste Policy and London Plan targets Ensure the NLWP delivers a net self-sufficient waste management outcome for the principal waste streams
6. Amount of waste exported to landfill by waste stream (LACW, C&I and CD&E)	Exported waste to landfill in line with Table 9 of the NLWP	Net self-sufficiency	Waste exports are in line with those estimated in the NLWP and through the duty to co-operate
7. Number of approvals for new waste facilities which meet legislative requirements	100%	SO5 (sustainability) SO8 (protect the environment) Spatial framework (Reduce impact on amenity) Policy 5: Assessment Criteria	Avoid impact on sensitive receptors or maximise scope for effective mitigation

Indicator	Target(s)	What it monitors	Outcome(s) sought
		for waste management facilities and related development	
8. Number of new CHP facilities serving district heat networks in which the principal fuel source is residual waste or recovered waste fuel	Monitor only	Strategic Aim (green London) SO6 (decentralised energy)Spatial framework (Provide opportunities for decentralised heat and energy networks) Policy 6: Energy recovery and decentralised energy	Contribute to delivery of decentralised energy and incremental improvement in environmental performance with respect to climate change
9. Sufficient infrastructure in place for management of waste water	Monitor only – information to be obtained from Thames Water	Strategic Aim (capacity supply and self-sufficiency) SO5 (sustainability)	To ensure that Thames Water have sufficient capacity to management the levels of waste water generated in Noth London over the plan period
11. Number of developments permitted which include disposal of inert waste to land	To ensure that inert waste is managed in line with the waste hierarchy	Strategic Aim (capacity supply and self-sufficiency) Strategic Aim (move waste up Waste Hierarchy)	To ensure that proposals involving the importation and disposal of inert waste to land are achieving in line with waste hierarchy.

Indicator	Target(s)	What it monitors	Outcome(s) sought
		SO1 (resource efficiency) SO3 (net self-sufficiency) SO5 (sustainability) SO8 (protect the environment) Meeting Future Requirements as specified in the NLWP % waste diverted and % landfilled	

Implementing the Plan

10.7 Development and adoption of the Plan must be followed by actions by a range of agencies and other organisations to ensure that its Aims and Objectives are met. The section summarises proposals for how these outcomes will be delivered and who will be responsible for them.

10.8 Implementation has four components – infrastructure delivery; application of the policies to planning proposals for waste facilities; ongoing regulation and monitoring of the local waste management sector; and achieving performance levels – each of which involves different actors. Table 15 summarises the organisations involved in each component.

Table 15: Roles and responsibilities involved in implementing the Plan

Organisation	Role	Responsibilities
Local planning authorities (including London Legacy Development Corporation)	Apply Plan policies	Assessing suitability of applications against Plan policies and priorities Deliver the strategic objectives and policies of the NLWP alongside wider development and regeneration objectives
	Regulate / monitor	Inspect operating waste sites periodically Appoint a lead borough to monitor the plan and carry out the duty to co-operate when required Publish regular monitoring reports in the NLWP ~~Monitor Plan performance annually~~
	Performance delivery	Support / promote waste reduction initiatives through the planning system
Borough waste collection authorities	Infrastructure delivery	Bring forward new / replacement waste sites for recycling / composting LACW
	Performance delivery	Implement waste collection activities to deliver desired performance levels as appropriate Support / promote waste reduction initiatives
North London Waste	Infrastructure	Delivery of replacement Edmonton ERF

Organisation	Role	Responsibilities
Authority (NLWA)	delivery	plant Delivery of other facilities enabling achievement of desired performance levels
	Performance delivery	Prioritising infrastructure delivery that moves waste up the Waste Hierarchy Support / promote / deliver waste reduction initiatives
Landowners	Infrastructure delivery	Propose new waste sites in line with NLWP policies that deliver capacity requirements
Waste industry	Infrastructure delivery	Propose new waste sites and deliver new waste facilities in line with NLWP policies that deliver capacity requirements
Environment Agency	Regulate / monitor	Advise on planning applications according to the nature of the proposal Assess applications for Environmental Permits, issue licences where the proposal meets the necessary standards Inspect operating waste sites periodically Collect and publish information about waste movements for use in Plan monitoring Monitor water quality
	Performance delivery	Promote waste reduction initiatives
Health & Safety Executive	Regulate	Advise on planning applications according to the nature of the proposal Monitor
Other statutory bodies (e.g. Natural England)	Regulate / monitor	Advise on planning applications according to the nature of the proposal Monitor protected sites such as SSSI

Organisation	Role	Responsibilities
Greater London Authority	Performance delivery	Promote waste reduction initiatives Promote carbon reduction initiatives
	Apply Plan policies	Assessing suitability of applications against London Plan policies and priorities Regional coordination of waste planning
London Waste and Recycling Board	Infrastructure delivery	Support to new waste infrastructure
	Performance delivery	Support to waste collection authorities to deliver desired performance levels Support / promote waste reduction initiatives

10.9 New commercial infrastructure required during the plan period will be funded by private funding through sources that cannot be identified at this time. In addition, there may be other sources of funding available such as public sector borrowing. Facilities required for the management of LACW will be funded by NLWA. The waste industry has been invited to take part in the development of the Plan through involvement in the various consultation processes and calls for them to propose suitable sites for waste management use. The NLWP identifies infrastructure priorities for the next 15 years and this will help to provide the industry with greater certainty about waste management priorities in the North London Boroughs that can inform future investment decisions.

10.10 Table 16 sets out how policies in the NLWP will be implemented and who will be involved in each action and which of the Strategic Objectives are addressed as a result.

Table 16: How the NLWP policies will be implemented

Mechanism	Stakeholders involved	Objectives implemented
Policy 1: Existing waste management sites		

Mechanism	Stakeholders involved	Objectives implemented
Planning permission for the expansion or intensification of operations at existing waste facilities. Refusal of planning permission for non-waste use on existing waste sites unless capacity is re-provided. Identifying compensatory provision when it is proposed to redevelop existing waste management facilities for non-waste uses.	Local planning authorities/ Landowner/developers/NLWA	SO2, SO3
Policy 2 Locations for new waste management facilities		
Planning permission and subsequent development	Landowners and developers / waste management companies / NLWA / local planning authorities / Environment Agency and other statutory bodies	SO1, SO2, SO3, SO5
Policy 3: Windfall sites		
Planning permission and subsequent development	Landowners and developers / waste management companies / NLWA / local planning authorities / Environment Agency and other statutory bodies	SO2, SO3
Policy 4: Re-use & Recycling Centres		
Planning permission and subsequent development	Landowners and developers / waste management companies / NLWA / local planning authorities / Environment Agency and other statutory bodies	SO1, SO2, SO3
Policy 5: Assessment criteria for waste management facilities and related development		

Mechanism	Stakeholders involved	Objectives implemented
Planning permission and subsequent development	Local planning authorities / Environment Agency and other statutory bodies	SO4, SO5, S07, SO8
Policy 6: Energy recovery and decentralised energy		
Planning permission and subsequent development	Landowners and developers / waste management companies / local planning authorities / NLWA / Environment Agency and other statutory bodies	SO1, SO6
Policy 7: Waste Water Treatment Works and Sewage Plant		
Planning permission and subsequent development	Thames Water / Environment Agency and other statutory bodies / local planning authorities	SO2, SO4, SO5, SO8
Policy 8: Control of Inert Waste		
Planning permission and subsequent development	Landowners and developers / waste management companies / local planning authorities / / Environment Agency and other statutory bodies	SO1, SO2, SO3, SO5, SO8

Appendix 1: Schedule 1: Existing safeguarded waste sites in North London

~~Table 17:~~ Schedule 1: Existing safeguarded waste sites in North London

Site ID	Site Name	Borough
BAR 2	Scratchwood Quarry	Barnet
BAR 3♦	P B Donoghue, Claremont Rd	Barnet
BAR 4♦	W R G, Hendon Rail Transfer Station	Barnet
BAR 5	Summers Lane Reuse and Recycling Centre	Barnet
BAR 6♦	Mc Govern Brothers, Brent Terrace, Hendon	Barnet
BAR 7♦	Cripps Skips Brent Terrace	Barnet
BAR 8	Apex Car Breakers, Mill Hill	Barnet
BAR 9	Railway Arches, Hendon Savacase Ltd	Barnet
BAR 10	G B N Services Ltd, New Southgate	Barnet
BAR 11	Mill Hill Depot	Barnet
CAM1	Regis Road Reuse and Recycling Centre	Camden
ENF 1	Crews Hill Transfer Station	Enfield
ENF 2	Barrowell Green Recycling Centre	Enfield
ENF 3	Pressbay Motors Ltd, Motor Salvage Complex	Enfield
ENF 4	Chase Farm Hospital, The Ridgeway (SITA)	Enfield
ENF 5	Jute Lane, Brimsdown	Enfield
ENF 6	Tuglord Enterprises (AMI Waste) Stacey Avenue	Enfield
ENF 7	Budds Skips, The Market Compound, Harbert Road	Enfield

♦ These sites will be redeveloped under the ~~approved~~ planning permission for the regeneration of Brent Cross Cricklewood (Barnet planning application reference F/04687/13). The Hendon Rail Transfer Station (BAR 4) will be replaced ~~as part of the BXC development~~ with a new facility on site S01-BA to meet the NLWA's requirements. Planning permission for the new sites at Geron Way was granted by Barnet Council Planning Committee in September 2018. The existing commercial facilities at BAR 6 and BAR 7 fall within the land required to deliver the ~~first~~early Southern phase of the BXC regeneration which is ~~anticipated will~~expected to commence in the near term; replacement capacity for these sites will be sought in accordance with the planning permission for Brent Cross Cricklewood. ~~early 2018. Replacement capacity for these sites will not be provided prior to their redevelopment and therefore replacement capacity will be sought outside of the BXC regeneration area on alternative sites / areas to be identified within the London Borough of Barnet.~~ The BAR3 site is identified for redevelopment in Phase 4 of the BXC regeneration and is currently not anticipated to be redeveloped until after 2026. Capacity at the waste facilities of BAR4, BAR6 and BAR7 and part of the capacity of BAR3 will be replaced by the new Waste Transfer Station (WTS) delivered as part of the Brent Cross Cricklewood Regeneration. The balance of the replacement capacity for BAR3 will need to be identified prior to its redevelopment and the London Borough of Barnet will seek to provide replacement capacity within the borough with the Local Plan identifying potential sites.

Site ID	Site Name	Borough
ENF 8	Biffa Edmonton, Adra Road, Edmonton	Enfield
ENF 9	Hunt Skips, Commercial Road, Edmonton	Enfield
ENF 10	Rooke & Co Ltd, Edmonton	Enfield
ENF 11	Edmonton Bio Diesel Plant	Enfield
ENF 12	Camden Plant, Lower Hall Lane, Chingford	Enfield
ENF 13	Personnel Hygiene Services Ltd, Princes Road, Upper Edmonton	Enfield
ENF 15	Yard 10 - 12 Hastingwood Trading Est. A & A Skip Hire Limited	Enfield
ENF 17	Albert Works, Kenninghall Road, Edmonton	Enfield
ENF 19	~~London Waste~~LondonEnergy Ltd Composting, Edmonton Eco Park, Advent Way	Enfield
ENF 20	~~London Waste~~LondonEnergy Bulk Waste Recycling Facility, Edmonton EcoPark, Advent Way	Enfield
ENF 20	~~London Waste~~LondonEnergy Ltd, Edmonton Ecopark, Advent Way	Enfield
ENF 22	Edmonton Clinical Waste Treatment Centre	Enfield
ENF 23	J O' Doherty Haulage, Nobel Road, Edmonton	Enfield
ENF 24	Oakwood Plant Ltd, Edmonton	Enfield
ENF 25	Envirocom Ltd, Stonehill Business Park, Edmonton	Enfield
ENF 26	Powerday Plant Ltd, Jeffreys Road	Enfield
ENF 27	Edmonton EFW	Enfield
ENF 31	Volker Highways Ltd	Enfield
ENF 32	Guy Lodge Farm	Enfield
ENF 33	Ballast Phoenix Ltd	Enfield
ENF 34	London & Metropolitan Recycling Facility	Enfield
ENF 35	Unit 25 Enfield Metal Kingswood Nursery, Theobalds Park road	Enfield
ENF 36	Greenstar Environmental	Enfield
HAC 1	Millfields Waste Transfer & Recycling Facility	Hackney
HAC 2	Downs Road Service Station (Braydon Motor Company), Clapton	Hackney
HAR 1/2	Hornsey Central Depot, Haringey LBC	Haringey
HAR 3	Garman Road, Tottenham	Haringey
HAR 4	O'Donovan, Markfield Rd, Tottenham	Haringey
HAR 5	Redcorn Ltd, White Hart Lane, Tottenham	Haringey
HAR 6	Restore Community Projects, Ashley Road, Tottenham	Haringey
HAR 7	Brantwood Auto Recycling Ltd, Willoughby Lane	Haringey
HAR 8	O'Donovan, Markfield Road, Tottenham	Haringey
HAR 9	Park View Road Reuse and Recycling Centre	Haringey
HAR 10	~~LondonWaste~~LondonEnergy~~-~~Ltd. Western Road H W R C	Haringey
ISL 1	Hornsey Household Re-use & Recycling Centre	Islington
WAF 2	Kings Road Household Waste Recycling Centre	Waltham Forest
WAF 3	South Access Road Household Waste Recycling Centre	Waltham Forest
WAF 4	G B N Services, Estate Way, Leyton	Waltham Forest

Site ID	Site Name	Borough
WAF 5	T J Autos (U K) Ltd	Waltham Forest
WAF 6	B J Electronics, Ravenswood road Industrial Estate, Walthamstow	Waltham Forest
WAF 8	Leyton Reuse & Recycling Centre	Waltham Forest
WAF 10	Malby Waste Disposal Ltd, Staffa Road, Leyton	Waltham Forest
WAF 11	Baseforce Metals, Unit 1 Staffa Road, Leyton	Waltham Forest
WAF 14	Tipmasters	Waltham Forest
WAF 15	Argall Metal Recycling, Staffa Road	Waltham Forest