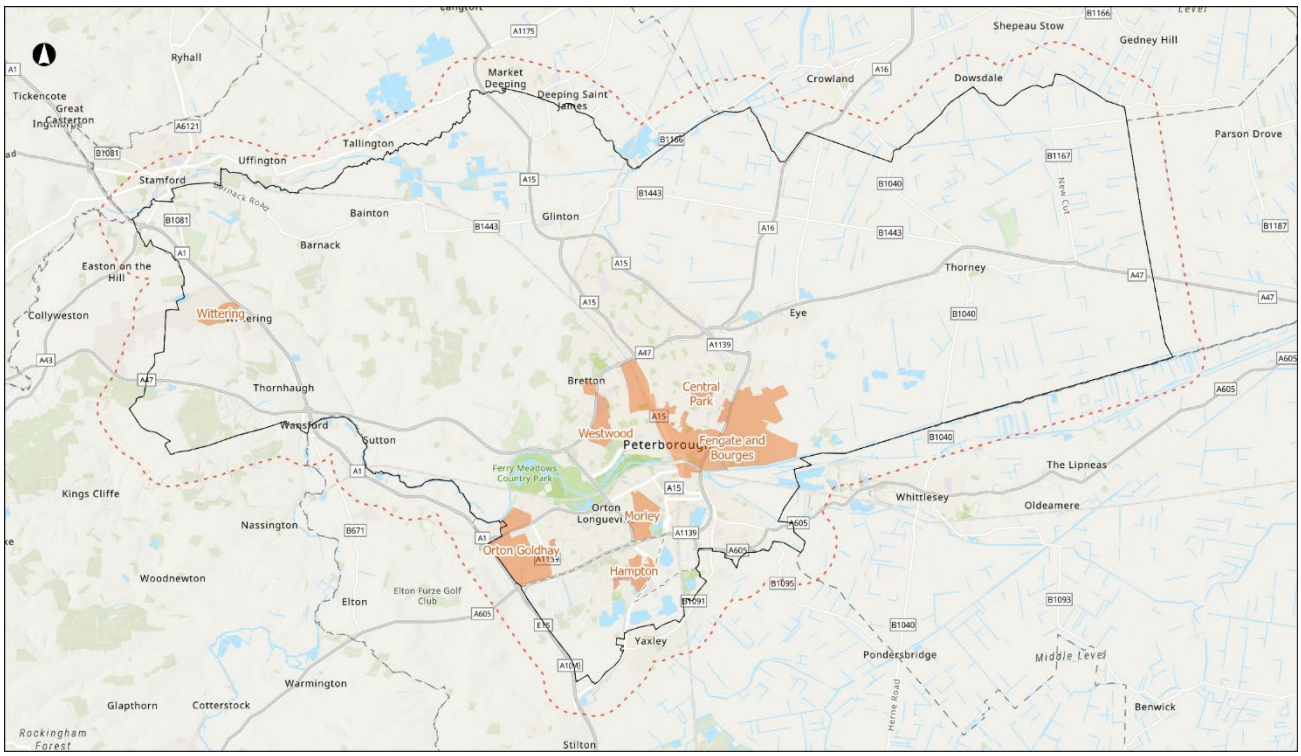
Department for Energy Security & Net Zero

Peterborough

Heat Network Zoning

Zone Opportunity Report



June 2025

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This report contains outputs from the Heat Network Zoning Pilot Programme. The Pilot was undertaken prior to full details of the Heat Network Zoning policy being available. Therefore, the contents, including data shown in maps, technical and economic data within the report, are likely to change and potentially sensitive information is withheld. No part of this report shall be relied upon for any business decisions.

Acknowledgements

This document was produced by Witteveen+Bos and Nordic Energy in partnership with Peterborough City Council. We are grateful to all stakeholders who participated in the Pilot programme.

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Contents

Executive Summary

About Peterborough: Peterborough is a cathedral city in the East Midlands region of England with a population of approximately 216,300.

Local Energy Policy: Peterborough City Council declared a climate emergency in July 2019, and aims for Council activities to be net-zero by 2030. Key initiatives include the Peterborough Integrated Renewables Infrastructure (PIRI) project.

Existing heat networks: The PIRI project is a flagship initiative to develop a 9km heat network connecting the Peterborough Energy Recovery Facility with buildings in the Fengate and City Centre areas.

Zones identified: Seven heat network zones were identified in Peterborough, with a total annual heat demand of over 175GWh/yr for all buildings potentially required to connect within these zones.

Strategic heat network zones: Three strategic heat network zones were identified, with a total annual heat demand of about 125GWh/yr for all buildings potentially required to connect within these zones.

Key heat demands: The total annual heat demand for buildings connected to the initial zone opportunities identified is 75GWh/yr. Key buildings are Peterborough City Hospital, Queensgate Shopping Centre and HM Prison Peterborough.

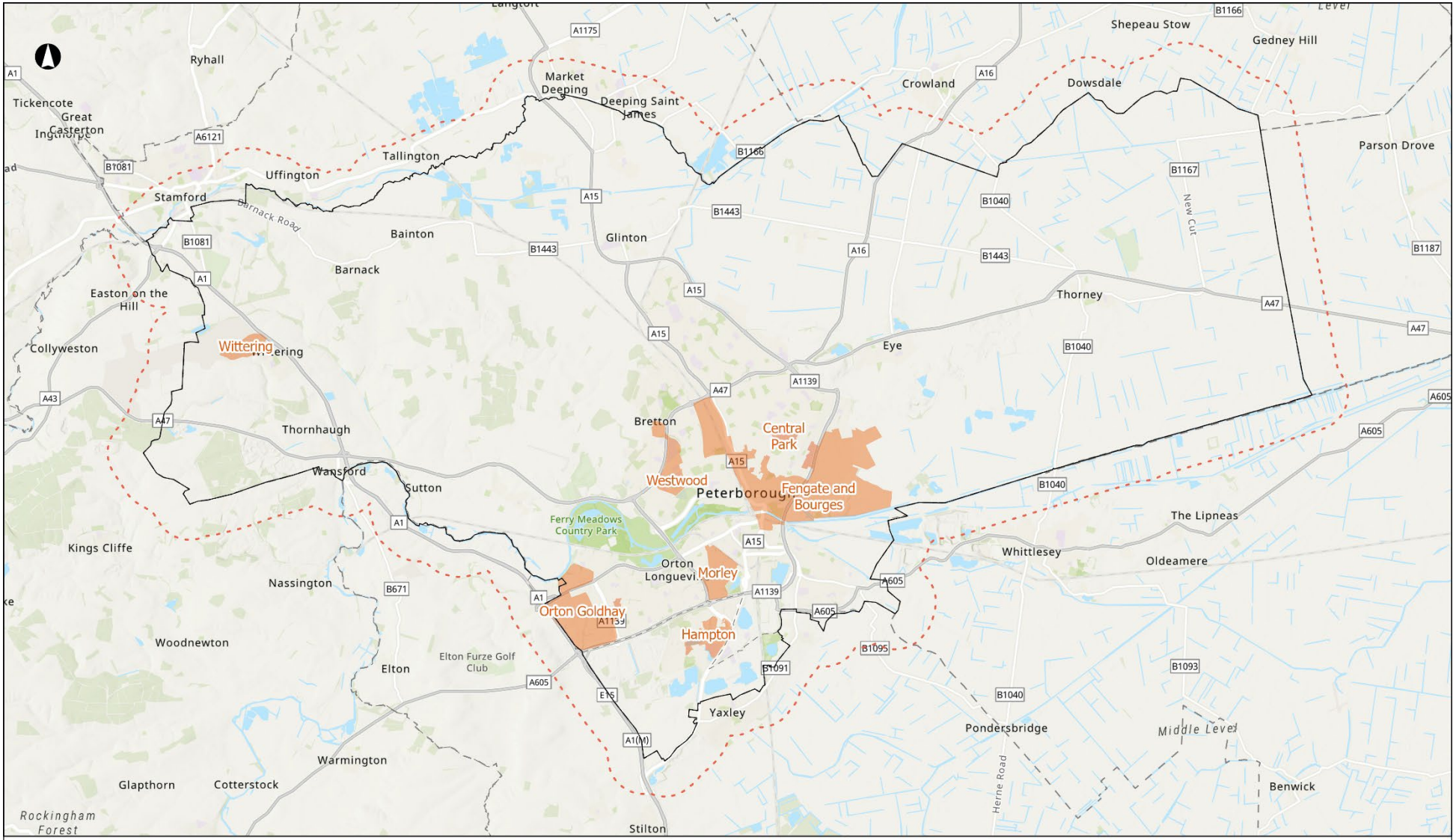
Key heat sources: Key heat sources include the Peterborough Energy Recovery Facility (PERF), water source heat pumps (WSHPs) from the River Nene, and air source heat pumps (ASHPs).

Estimated CapEx: The estimated capital expenditure for the full rollout of heat networks within identified zones is approximately £350m of which the initial zone opportunities amount to over £150m.

Other heat network zones: Smaller heat network zones include Orton Goldhay, Central Park, Wittering, and Hampton, each with varying heat demands and potential heat sources.

Carbon savings: The initial zone opportunities identified could deliver carbon savings of more than 12ktCO_{2e} annually.

Figure 1: Overview of Heat Network Zones in Peterborough



1) Introduction

Heat networks will play a crucial role in decarbonising heat in buildings. Heat networks take heating, cooling or hot water from a central source(s) and deliver it to a variety of premises such as public buildings, shops, offices, hospitals, universities, and homes. They are also an important part of securing the UK's energy independence through local, low carbon heat sources and reducing the cost of living through efficient, affordable heating in densely populated areas. Analysis shows that heat networks could provide about 20% of total heat by 2050. They currently provide about 3%.

The Department for Energy Security and Net Zero (DESNZ) is enabling the development of heat network infrastructure through a range of targeted funding, policy and legislative support to de-risk projects and attract investment. The Energy Act 2023 establishes the regulatory framework for heat networks in Great Britain and provides powers to introduce heat network zoning in England through secondary legislation. A heat network zone (HNZ) is a formally designated geographical area in England where heat networks are expected to provide the lowest-cost solution for decarbonising heating.

Under heat network zoning, central and local government will work with industry and local stakeholders to identify and designate areas of England where heat networks are expected to be the lowest-cost solution to decarbonising heat. Heat network zoning will be essential to speeding up the development of new heat networks and we hope to catalyse growth where it's most needed.

Heat network zoning will significantly increase private sector investment in the sector by removing the barriers which currently limit the pace of developing large scale heat networks. It will also give local communities the tools to accelerate the development of heat networks in their own areas and ensure that more homes and businesses can have access to greener, cheaper heat. It also has the potential to create tens of thousands of jobs across the country.

This report shows the Pilot programme outputs for Peterborough and is intended to showcase potential heat network zones in the city. The report indicates the heat network investment opportunity at a city scale, the potential location of heat network zones, and key opportunities for initial heat network development within those potential zones

Please note that all information presented in this report, including the location of identified heat network zones, is subject to change. These are the findings of Pilot programme that were developed alongside the emerging Heat Network Zoning policy and therefore reflect our understanding at a moment in time. As the methodology improves, we will update these reports to improve our understanding of how heat network zoning may be rolled out in each area. Any potential zones that are identified fully, or partly, in an adjacent local authority area will need to be discussed further once local zone co-ordinators are established.

Heat Network Zoning Pilot Methodology

Heat network zones will be identified using a standardised national zoning methodology[1]. The Heat Network Zoning Pilot Programme (hereafter Pilot programme) set out to develop a process to identify potential zones in a consistent and standardised manner across a range of towns and cities in England. The programme was fully funded and led by DESNZ, working alongside 28 Local Authorities, and multiple consultancy firms, to develop and test this approach at a local level. As such the final outputs are supported by each Local Authority but do not reflect an approved, endorsed, or adopted position on how zones may be delivered.

Lessons from the Pilot have been used to inform the development of the Heat Network Zoning policy. This includes improvements to the identification approach itself, but also wider policy design relating to the number and size of potential zones; existing heat networks; and the impacts of the policy on a range of stakeholders. Once the response to the heat network zoning consultation is published, we will update the methodology to reflect the final policy position.

The key concepts, definitions and complementary workstreams relevant to this report are introduced below. For a fuller description of the Heat Network Zoning policy, and up to date information regarding its implementation, please visit https://www.gov.uk/government/collections/heat-network-zoning.

Heat Network Zone Identification

Heat network zones will be identified using a standardised national zoning methodology. The December 2023 consultation on Heat Network Zoning proposes that the methodology will consist of two stages:

1. a national mapping exercise (using a data-led spatial energy model – the National Zoning Model, (or NZM), to identify indicative heat network zones across England;
2. a refinement stage where relevant local stakeholders will input to the review and refinement of potential heat network zones prior to formal designation.

For the purposes of this study, indicative heat network zones have been identified using a prototype version of the NZM. These indicative zones were then refined by technical consultants with input from local stakeholders. The NZM outputs are already of considerably higher quality than those shared for this work and therefore these reports will improve over time.

This study split heat network zones into two different categories. These are **'strategic'** zones – the largest zones which are generally seen as strategically significant to developing heat networks in an area; and **'other'** zones – which are generally smaller and discrete. These are terms specific to the Pilot programme and the report focuses primarily on the strategic zones.

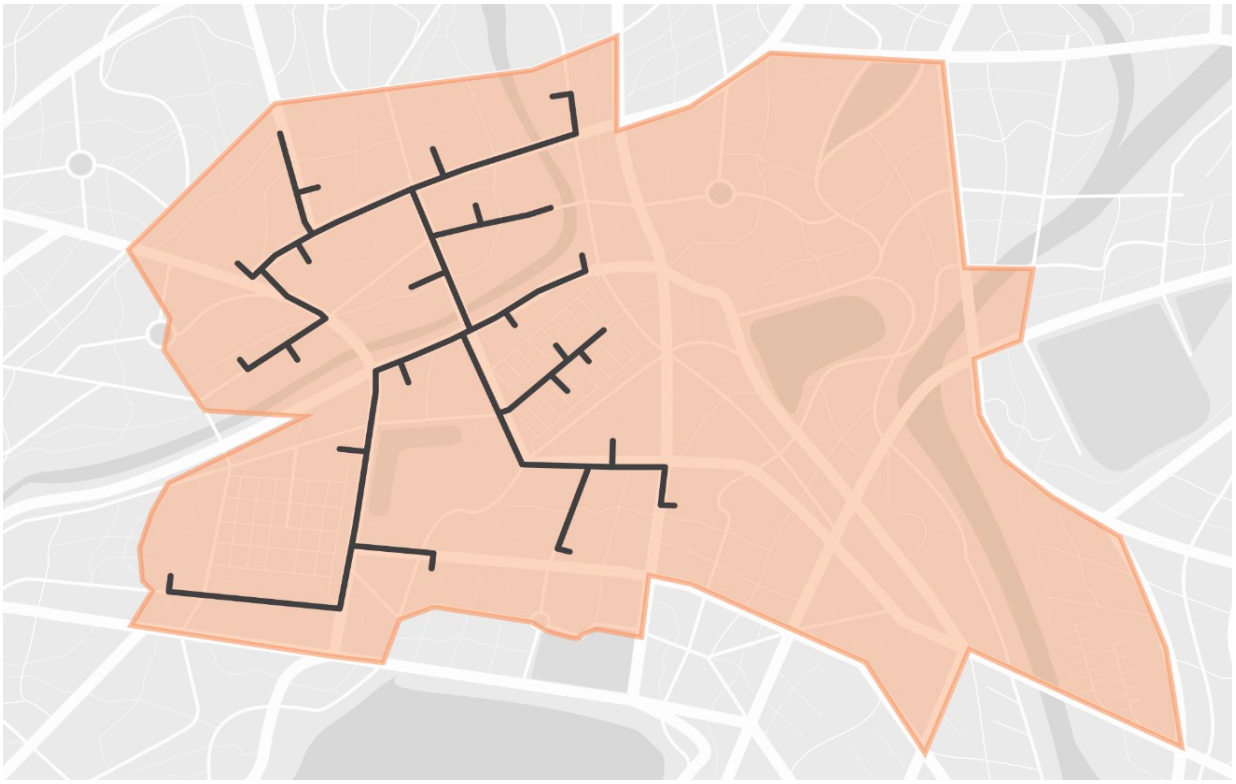
[1] More information can be found in the Heat Network Zoning Methodology Statements (Appendix 3, 4 & 5)

Initial Zone Opportunities

Alongside the identification of potential heat network zones, the Pilot programme has attempted to define areas within zones where the most attractive heat network development opportunities might exist. For the purposes of this programme *only* these are called an "initial zone opportunity" (or IZO). The approach considered economic viability, investment scale and returns, decarbonisation impact and deliverability. They were developed solely around buildings which could potentially be required to connect[2] under the proposed Heat Network Zoning policy and did not consider potential voluntary connections.

Initial zone opportunity design targeted a linear heat density (LHD) of 4MWh/m/yr, for the existing built environment. This is considered a relatively low proxy for economic viability with the heat network sector in England. A more flexible approach was used for new development sites, where different economic success criteria are likely to be applied. To standardise the way opportunities were assessed, the IZOs presented in this report may differ from, or overlap with, existing or planned heat network infrastructure. Campus style heat networks (e.g. in hospitals or university campuses) were considered as potential heat loads with a single point connection. Figure 2 below shows an example of a heat network zone and an IZO.

Figure 2: Illustration of a Heat Network Zone (HNZ) and an Initial Zone Opportunity (IZO)



[2] The building categories being considered as potentially required to connect include new developments, large non-domestic buildings, and communally heated residential blocks as described in Heat Network Zoning Consultation (2023)

Study Scope

This document is presented as a zone opportunity report as it was developed in advance of the final policy design. As such, the report does not include:

- references to the **central authority** or **zoning co-ordinator** roles;
- assumptions about rights of **existing heat networks,** or **zone delivery areas**;
- an options appraisal on which **routes to market** may be taken;
- calculations on the **cost of heat** (connection/tariffs) to specific buildings**;**
- any inferences as the suitability for **public/private sector delivery** unless it's matter of fact (existing network or Heat Network Investment Project/Green Heat Network Fund project);
- references to **local community benefit** or **consumer protection** (subject to a live consultation).

In the future, it is intended that a document, similar in style, will be produced to incorporate these policy design aspects and be used as a Zone Market Prospectus (ZMP) to market heat network zoning opportunities in an area. Further detail on the methodology and initial zone opportunity criteria is provided in Appendix 4 and Appendix 5.

2) Peterborough Heat Networks Context

2.1) Peterborough City Overview

Peterborough is a cathedral city in the East Midlands region of England with a population of approximately 216,300[3]. Peterborough City Council (PCC) is a unitary authority within the county of Cambridgeshire covering an area of approximately 45 square kilometres. It has a significant commuter population being situated within an hour's train journey from London. Financial services and distribution are the main centres of economic activity in the city. The land is largely flat with some areas below sea level. The River Nene is a major feature, passing through the centre of the city, as is the East Coast railway which provides connectivity with London, the North of England, and Scotland.

There are circa 17,000 social homes in Peterborough out of a total housing stock of circa 90,000[4]. As of 2023, PCC owned 112 of these homes. There are multiple registered providers, offering social housing in Peterborough. The largest of which is Cross Keys Homes, which has around 10,5000 homes.

2.2) Peterborough Net Zero Targets and Commitments

In July 2019, PCC formally declared a climate emergency[5] and stated an ambition for the Council's activities to be net-zero by 2030. Other key ambitions included to:

- Use planning powers to deliver net-zero carbon new developments and communities;
- Increase the efficiency of buildings, which will help to address fuel poverty;
- Achieve 100% clean energy across the Council's full range of functions by 2030; and
- Ensure that all strategic decisions, budgets and approaches to planning decisions are in line with a shift to zero carbon by 2030.

PCC joined with local enterprise partnerships (Cambridge and Peterborough, Hertfordshire, and New Anglia), to form a Local Energy East Strategy in the winter of 2018[6]. The project set out the regional ambitions for Clean Growth up to 2030.

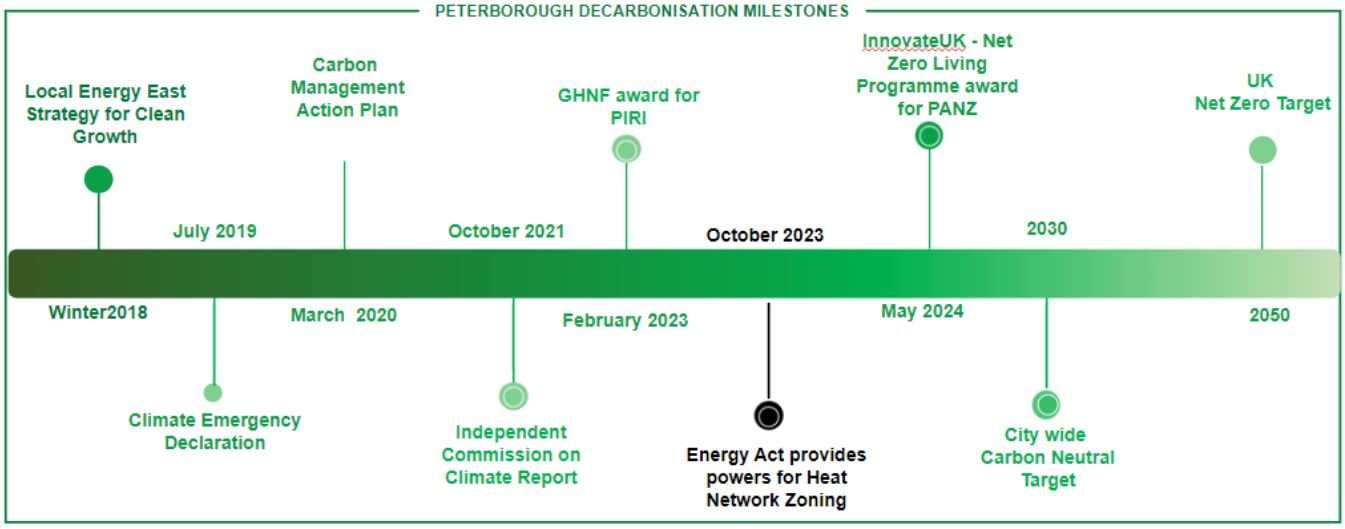
[3] Peterborough City Council. (2024). Population. [online] Available at: https://www.peterborough.gov.uk/council/about-peterborough/population
[4] Cambridgeshire Insight. (2022) *Cambridgeshire Insight*. Available at: https://cambridgeshireinsight.org.uk/
[5] Peterborough City Council. (2019) *Climate Change*. Available at: https://www.peterborough.gov.uk/council/campaigns/climate-change#:~:text=In%20July%202019%2C%20Peterborough%20City,need%20to%20take%20urgent%20action.
[6] GSE Net Zero Hub. (2019) *Local Energy East Energy Strategy*. Available at: https://gsenetzerohub.org.uk/wp-content/uploads/2019/09/LEE-Energy-Strategy.pdf

In March 2020, PCC initiated a Carbon Management Action Plan[7] which has been updated annually since. The Council tracks progress in reducing emissions against a baseline set in 2018/19; with Scope 1-3 emissions of circa 11,500 tonnes CO_{2e}.

The Energy Systems Catapult conducted a Local Area Energy Plan (LAEP)[8] for the city in 2022/23. The plan identified that heating for the city is mostly supplied by gas combustion, with oil used in rural areas, where more than half of the land area is not on the gas network. The study noted that the high voltage electricity network was expected to have sufficient capacity to cope with additional loads created by the electrification of heating but concluded that the low voltage network would require significant upgrades.

Figure 3 summarises key dates in the Council's plans for decarbonisation and demonstrates their progress towards decarbonisation targets announced.

Figure 3: Peterborough Decarbonisation Milestones



2.3) Delivering Heat Networks in Peterborough

Peterborough Integrated Infrastructure (PIRI)[9] is a flagship project to help the city transition to Net Zero. Central to the scheme is a smart-enabled heat and power network supplied by the council-owned energy recovery facility to customers in the Fengate and City Centre areas.

The PIRI project commissioned in 2020 by PCC and aims to integrate multiple renewable energy sources and technologies to reduce carbon emissions and energy costs and as a means to enable deeper decarbonisation of Peterborough whilst reducing energy costs for

[7] Peterborough City Council. (2020) *Environment Capital - Carbon Management Action Plan - Appendix B*. Available at: https://democracy.peterborough.gov.uk/documents/s4346/100115%20-%20Environment%20Capital%20-%20Carbon%20Management%20Action%20Plan%20-%20Appendix%20B.pdf.
[8] Peterborough City Council. (2023) *Develop a local area energy plan*. Energy Systems Catapult. Available at: https://es.catapult.org.uk/case-study/peterborough-city-council-develop-a-local-area-energy-plan/
[9] Peterborough City Council. (2020) *Peterborough Integrated Renewables Infrastructure (PIRI)*. Available at: https://www.peterborough.gov.uk/business/peterborough-integrated-renewables-infrastructure-piri.

consumers. The main driver for the scheme was to understand the commercial viability in taking heat from the Peterborough Energy Recovery Facility (PERF) in the Fengate area.

The project has received funding awards from InnovateUK and the Green Heat Network Fund (GHNF). Over £14.4m from the GHNF was recently awarded by Government for commercialisation and construction.[10,11] The PIRI project is also supported by an Innovate UK funding award for the Peterborough Accelerated Net Zero (PANZ) project that is part of national Net Zero Living Programme. This seeks to remove non-technical barriers to the development of Net Zero projects. A competitive dialogue was launched in February 2025 to seek a developer for the project. More information is provided in Section 3.1.2.

Please refer to Appendix 2 for further information about the evidence compiled for heat network opportunities in Peterborough. This includes a stakeholder directory and records of interactions with those stakeholders as well key studies and reports.

2.4) Peterborough Heat Network Zones

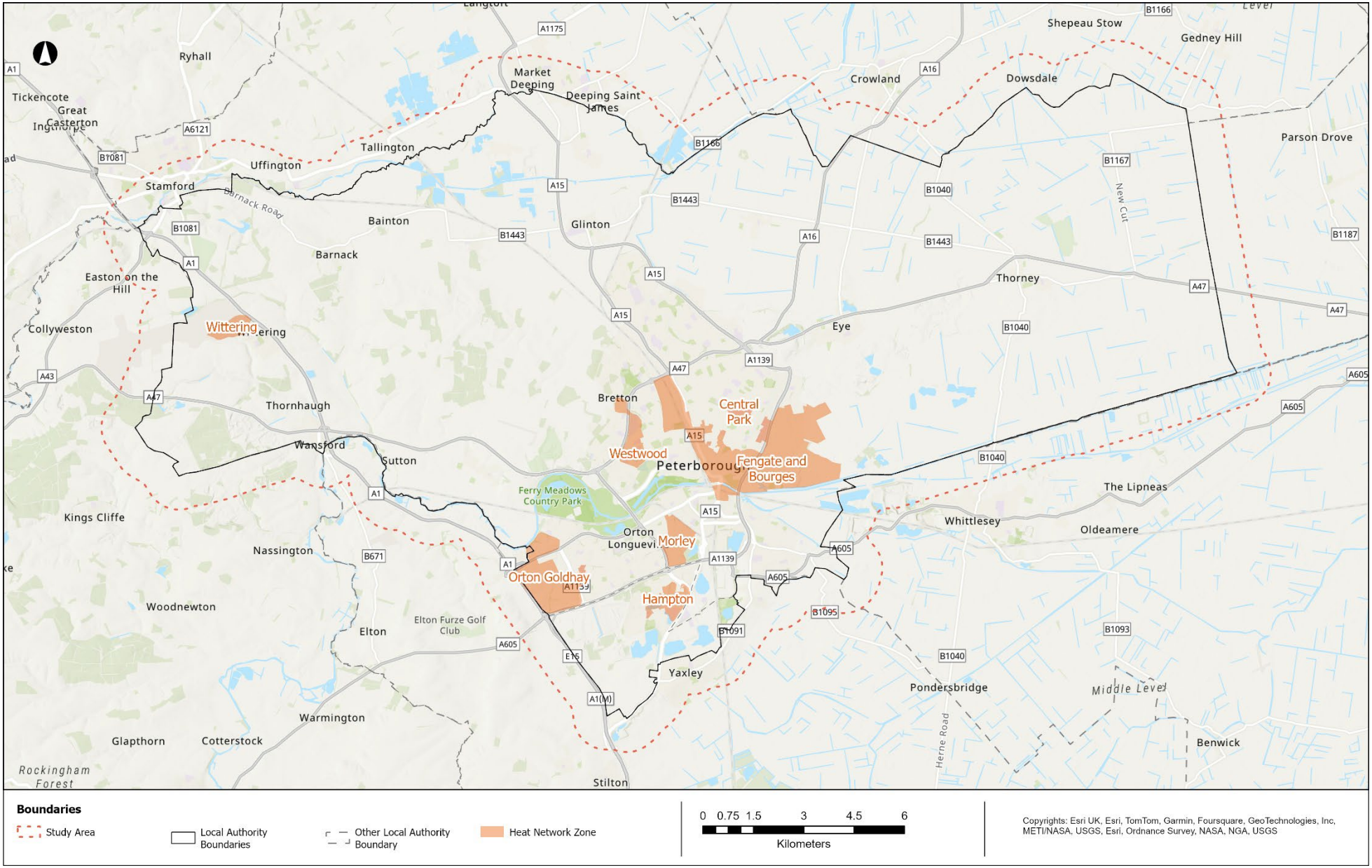
A total of seven potential HNZs were identified in Peterborough, with three considered Strategic HNZs. Figure 4, below, shows the study area boundary as well as the boundaries of all HNZs identified within Peterborough. Strategic and Other HNZs have been allocated a meaningful name agreed as relevant from a local perspective and these names are shown on the map.

Please see Appendix 1 for the following maps giving more detail:

- A: City Typology Map – Shows building typologies which dominate by area.
- B: Key Heat Loads Map – Highlights key potentially required to connect buildings by heat demand.
- C: Key Heat Sources and Potential Energy Centres – Highlights key heat sources by type and potential energy centre locations as well as any existing district heat network energy centres.
- D: Existing / Planned Heat Networks Map – Shows existing HNs and planned extensions to them as well as any planned HNs in advanced stages of development.
- E: Key Constraints Map – Shows key topographical constraints identified.
- F: Off Gas Grid – Presents areas with differing levels of properties off the gas grid within the study area.

[10] Peterborough City Council. (2023) *PIRI project moves a step closer*. Available at: https://www.peterborough.gov.uk/news/piri-project-moves-a-step-closer.
[11] Esri. (220) *StoryMap*. Available at: https://storymaps.arcgis.com/stories/e4d740a84c9b4df0a84be3d592e2e3b0

Figure 4: Heat Network Zones Identified within the Peterborough Study Area



3) Strategic Heat Network Zones

Strategic HNZs in Peterborough

This section examines the three strategic HNZs and the IZOs identified within each. This covers the key heat demands, heat sources, energy centre locations and potential constraints for each IZO identified. Heat network distribution routes are conceptual and designed to illustrate the potential size and scale of the heat network opportunity that may be realised as part of the upcoming Heat Network Zoning policy. Other heat network zones are listed in Section 4.

Table 1 below presents a high-level estimate of the scale of opportunities across Peterborough. Please refer to Appendix 4 for more detail.

Table 1: Annual Heat Demand for Buildings in All Zones, Strategic Zones and IZOs

Scope	Annual heat demand (GWh/yr)
All buildings required to connect in all zones[12]	175
All buildings required to connect in strategic zones	125
All buildings connected to the IZOs	75

Existing/planned heat networks that overlap with IZOs are described, though their locations may vary due to different approaches. The Pilot programme applied a standard set of technical and economic assumptions across each of the 28 areas that participated in the programme and uses a proxy for economic viability (see Section 1 and Appendix 4 for more detail). Existing and planned networks will often be based on more detailed design work and have taken account of strategic and commercial considerations that were relevant at the time of their development. Future iterations of this report will consider how to better align local studies whilst retaining a nationally consistent approach.

The three strategic zones are summarised below. Figure 5 illustrates the size of each, alongside the key potential heat source and the proportion of buildings that may potentially be required to connect.

Fengate and Bourges is the largest potential zone identified in terms of size and heat demand. It includes the city centre and a diverse mix of industrial, commercial, and new

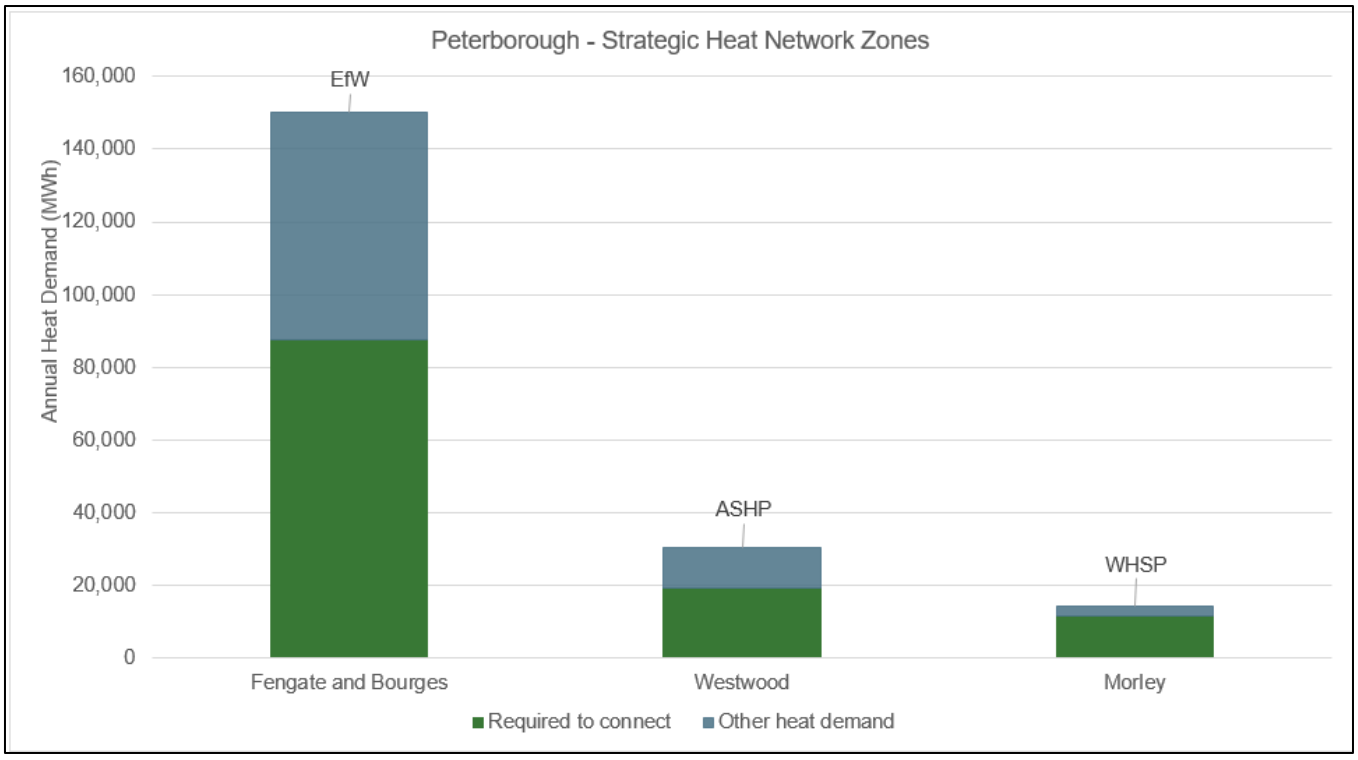
[12] Row 1 is an estimate of heat demand across buildings potentially required to connect in all zones identified. Row 2 is as per row 1, but only within strategic zones. Row 3 includes buildings connected to the IZOs described and largely comprise of buildings potentially required to connect. Figures are generally rounded up to the nearest 25 or 50GWh/yr.

residential developments. Within this zone, two IZOs have been identified; Fengate and Bourges. For more information, please see Section 3.1.

Westwood is an area in Peterborough located to the west of the city centre. It includes a diverse mix of buildings and includes Peterborough City Hospital serving as a main anchor load. Within this zone, a single IZO has been identified. For more information, please see Section 3.2.

Morley is non-domestic and industrial area located to the south of the city along the A1139. Within this zone, a single IZO has been identified. For more information, please see Section 3.3.

Figure 5: Summary of Heat Demands in all Strategic HNZs Identified



3.1) Fengate and Bourges

3.1.1) Fengate and Bourges – HNZ Summary

The city-level map in Figure 4 shows the Fengate and Bourges HNZ which covers Peterborough city centre and extends east to the A1139 Frank Perkins Parkway. It is dominated by existing industrial and commercial buildings including manufacturing, warehousing, and distribution centres as well as significant new residential developments and some public buildings.

There are approximately 220 buildings potentially required to connect within the zone. Key anchor loads include the Queensgate Shopping Centre and HM Prison Peterborough. The Fengate and Bourges HNZ has access to several low carbon heat sources such as Peterborough Energy Recovery Facility (PERF), as well as heat recovery from the River Nene using water source heat pumps (WSHP).

3.1.2) Fengate and Bourges - Existing Heat Networks

There are no operational district heat networks identified, however there is one planned heat networks which is in late stages of development, as described below and shown in Figure 6.

Planned Heat Networks – Late stage

PIRI Heat Network

The Peterborough Integrated Renewable Infrastructure (PIRI) Project is a Council-led scheme seeking an external delivery partner to finance, construct and operate an integrated heat and private wire network. The proposed scheme consists of the Peterborough Energy Recovery Facility (PERF) as the primary generation asset and is intended to operate in the Fengate and City Centre area.

PIRI launched in 2019 and received UKRI and HNDU funding to develop the project. In July 2020, PIRI secured £906k commercialisation funding and £13.5m construction funding from the Green Heat Network Fund (GHNF). It aims to deliver a smart local energy system (SLES), integrating next generation heat and electricity networks, all managed via intelligent digital platforms known as ‘energy as a service,’ potentially a blueprint for other cities. This will likely enable energy bill reduction alongside contributing to net zero ambitions. PIRI will provide place-based enabling infrastructure that makes use of existing assets to enable new renewable technologies whilst minimising impact on the local grid. It is designed to be input and technology-agnostic to support future growth.

Once constructed, the heat network could initially cover 7.5km in Peterborough and the potential to connect to multiple heat off-takers, including Peterborough City Council buildings in both the Fengate and city centre area. It is currently expected to deliver an average annual heat load of circa. 25GWh/yr. A competitive dialogue was launched in February 2025[13], seeking a long-term Development Partner to enter into a golden share corporate special

[13] https://www.find-tender.service.gov.uk/Notice/004314-2025

purpose vehicle (Project Co) with the Council for the development and delivery of the PIRI heat and power network. Key metrics are provided in Table 2 below, but please refer to the latest information about the PIRI project available online.

Table 2: PIRI Heat Network Key Metrics

Annual Demand	Heat Sources	Estimated CapEx	IRR	Construction Start Date
25GWh+	PERF	£50m+	Unknown	2025-2026

3.1.3) Fengate and Bourges - Initial Zone Opportunities

Two discrete IZOs were identified in the Fengate and Bourges zone. Potential routing for the IZOs is shown in Figure 6 and summary statistics provided in Table 3.

Table 3: Fengate and Bourges - Summary Statistics for Initial Zone Opportunities[14]

CapEx	Heat	Network	CO_2e savings	LHD	Heat Sources
~£150m	~75GWh	28km	~10ktCO_{2e}	2MWh/m	PERF & WSHPs

Both of the IZOs were chosen as they overlap with heat network Phases 1 and 2 of the PIRI project. **Please note that IZOs were identified using a standard national methodology piloted as part of this programme and therefore may differ from more recent detailed feasibility studies and commercialisation activity.**

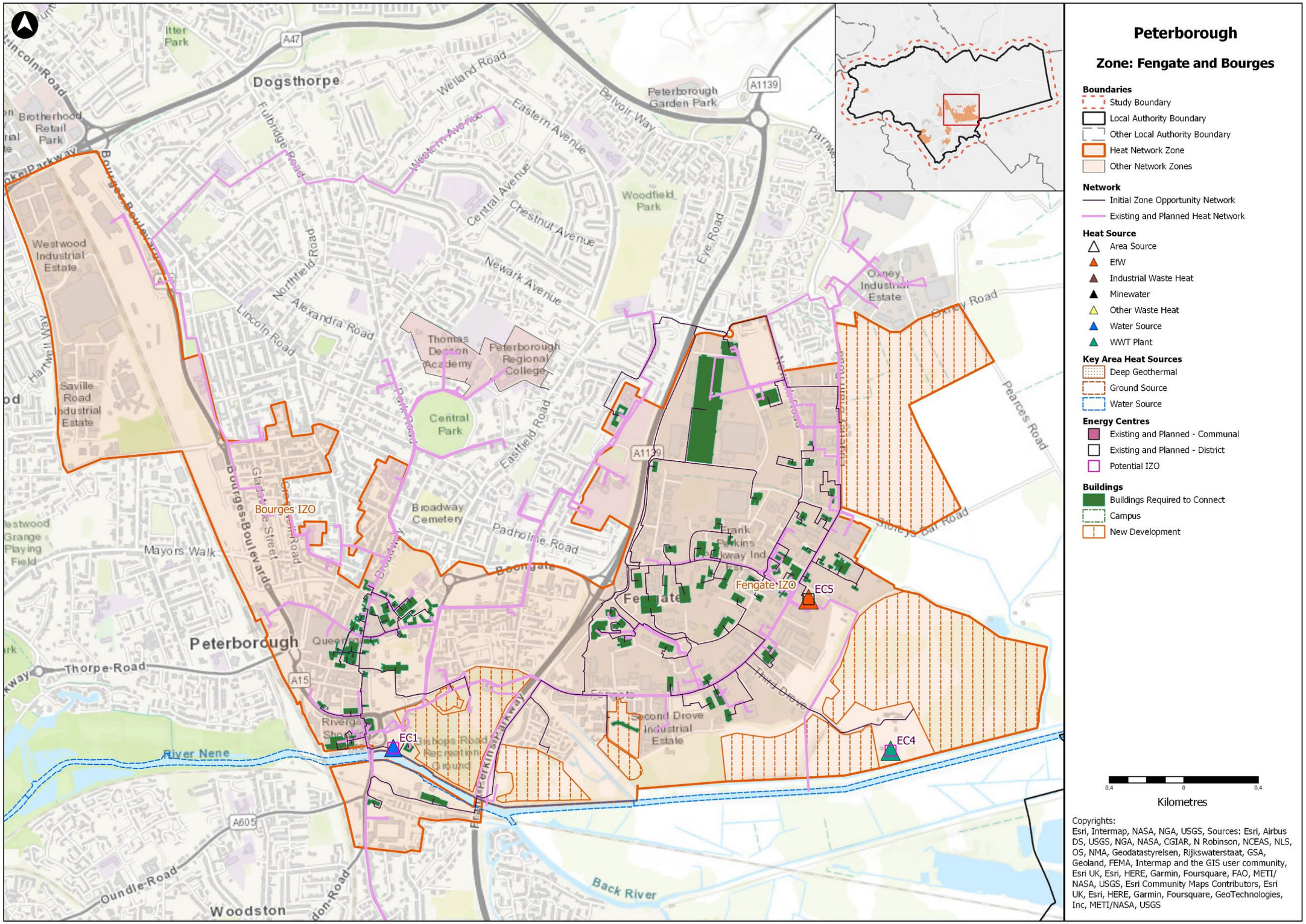
Key features of each IZO are described below:

The **Fengate IZO** is located in a large industrial area to the east of the city, containing various manufacturing, warehousing, and distribution centres. In addition, there are two large new residential developments to the east and smaller developments to the south. The estimated annual heat demand of buildings potentially required to connect is approximately 50GWh/yr. The length of the proposed network is approximately 23km and is estimated to require a CapEx of approximately £100m to deliver. The PERF is situated in the Fengate area and could be a potential source of low-carbon heat to the IZO.

The **Bourges IZO** is located at the heart of the city centre with a diverse mix of residential, commercial, and public sector heat demands. There is also a new development to the south. The estimated annual heat demand of buildings potentially required to connect is approximately 25GWh/yr. The length of the proposed network is approximately 5km and is estimated to require a CapEx of approximately £50m to deliver. It could be supplied with waste heat from the PERF and/or WSHPs recovering heat from the River Nene.

[14] Please see Appendix 3 – Glossary, “Specific definitions” of the main report for definitions related to this table.

Figure 6: Initial Zone Opportunities in Fengate and Bourges HNZ



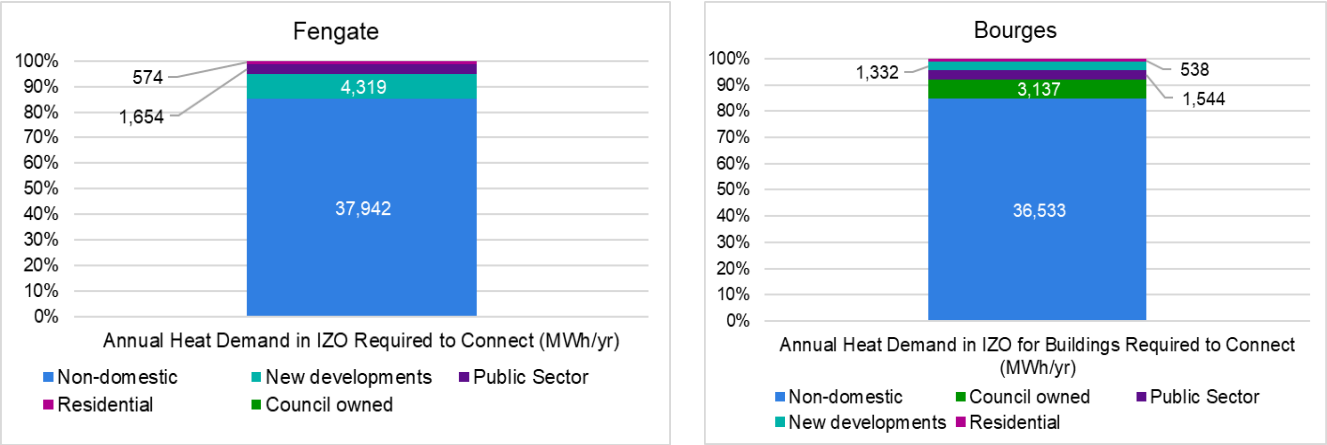
3.1.4) Fengate and Bourges – IZO Heat Demands

The heat demands identified within the two IZOs are described below. The Pilot programme used several sources including local data collected from building owners; national energy demand datasets; benchmarks applied via the National Zoning Model (NZM); and a standardised approach to estimate the potential heat demands of new development sites. More information is provided in Appendix 4.

Where there are different values between datasets, the methodology prioritised the use of the early prototype version of the National Zoning Model, for consistency. This has led to an overestimation of some commercial and light industrial heat demands presented in this report. Large anchor loads that are already connected to existing district-scale heat networks are not listed.

A breakdown of the categorisation of heat demands can be found in Figure 7. Further details of the key heat demands for buildings potentially required to connect are provided in Table 4.

Figure 7: Fengate and Bourges - Categorisation of Heat Demand for Buildings Potentially Required to Connect in the IZOs



In **Fengate**, the majority of the heat load potentially required to connect is industrial and commercial with the heat demand from non-domestic buildings comprising almost 90% of the total heat demand. The rest of the heat demand derives from new developments, as well as existing public sector and residential buildings.

Similarly, in **Bourges**, the majority of the heat demand comes from the non-domestic sector, comprising almost 85% of the total heat demand. The remaining heat demand is mainly related to council-owned buildings, public sector buildings, and new developments.

Table 4: Fengate and Bourges - Key Heat Demands Required to Connect in the IZOs[15]

Building name	Building category	Number of connections	Annual Heat Demand (MWh)	Data Source
Fengate				
Perkins Engines	Non-domestic (Industrial buildings)	3	11,800	Benchmark (NZM)
Anglian Water	New development (Residential)	Unknown	2,550	Pilot Methodology
Ideal Home House	Non-domestic (Offices)	1	1,400	Benchmark (NZM)
Sainsburys	Non-domestic (Retail)	3	875	Benchmark (NZM)
Anglian Water West	New development (Residential)	Unknown	850	Pilot Methodology
Showcase Cinema	Non-domestic (Entertainment)	1	775	Benchmark (NZM)
Keyline Builders Merchant LTD	Non-domestic (Retail)	3	675	Benchmark (NZM)
Hyperama	Non-domestic (Retail)	1	650	Benchmark (NZM)
The Range	Non-domestic (Retail)	1	650	Benchmark (NZM)
Bourges				
HM Prison	Public Sector	7	7,500	DEC
Queensgate Centre	Non-domestic (Retail)	19	5,250	Benchmark (NZM)
Beales	Non-domestic (Retail)	1	1,050	Benchmark (NZM)
British Telecom	Non-domestic (Offices)	1	975	Benchmark (NZM)
Stuart House	Non-domestic (Offices)	66	925	Benchmark (NZM)

[15] Please refer to Appendix 3 for definitions related to building categories in this table.

Building name	Building category	Number of connections	Annual Heat Demand (MWh)	Data Source
ASDA	Non-domestic (Retail)	1	875	Benchmark (NZM)
TK Maxx	Non-domestic (Retail)	2	725	Benchmark (NZM)
Food warehouse	Non-domestic (Retail)	2	725	Benchmark (NZM)
Former Royal Mail Sorting Office	Non-domestic (Offices)	2	650	Benchmark (NZM)

In **Fengate**, Perkins Engines occupies several large sites to the east of the Frank Perkins Parkway, providing the largest industrial heat demands. Two large new residential development areas to the east and southeast, Anglian Water and Anglian Water West, constitute other significant opportunities.

In **Bourges**, the largest anchor load is HM Prison Peterborough consisting of seven large buildings. Queensgate Shopping Centre, which includes a large number of retail outlets and associated commercial space, is the second-largest heat demand. The remaining heat demands consist of non-domestic buildings, including a combination of offices and retail buildings.

3.1.5) Fengate and Bourges – IZO Heat Sources

Low carbon heat source options have been identified in both IZOs. They are described below.

In **Fengate**, low carbon heat sources include waste heat recovery from the PERF, the Flag Fen Anglian Water Wastewater Treatment Works (WWTW), and WSHPs recovering heat from the River Nene. Waste heat from industry, such as Perkins Engines, could also be a potential heat source, subject to further investigation.

In **Bourges**, the River Nene is a significant low carbon heat source which can deliver heat to a district heat network.

Table 5 and Table 6 summarise the key heat sources and potential energy centre locations identified. These are also shown in the zone-level map in Section 3.1.3 above and on the city-level Map C in Appendix 1.

Table 5: Fengate and Bourges - Key Heat Source Opportunities for the IZOs

Heat source type	Full opportunity Capacity (kWp)	Temperature (Degrees Centigrade)	Potential Energy Centre (Ref number)
WSHP – River Nene	12,362	>0ºC	EC1
WWTW – Flag Fen	20,000	>10ºC	EC4
PERF	41,000	>20ºC	EC5

Table 6: Fengate and Bourges - Potential IZO Energy Centre Locations

EC Ref #	Site type	Size (m^2)	Ownership	Heat Source
EC1	Land next to the river	1,000	TBD	WSHP – River Nene
EC4	Land on WWTW site	74,000	Anglian Water	WWTW – Flag Fen
EC5	Industrial site	17,000	Viridor	PERF

The potential energy centre (EC) locations identified in Fengate and Bourges. EC1 is identified near to the River Nene to house a WSHP, using the river as its heat source. A high-level study has been conducted, but further studies are needed to determine its capacity and temperature levels. EC4 is the largest site and is located at the Flag Fen WWTW, owned by Anglian Water. EC5 is situated on an industrial site owned by Viridor and derives its heat from the PERF.

3.1.6) Fengate and Bourges – IZO Heat Distribution

The approach to developing the heat network route considered economic viability, investment scale and returns, decarbonisation impact and deliverability. These criteria were applied in a standardised manner across all opportunities identified in the Pilot programme and therefore may not reflect detailed designs or proposed routes identified in more detailed feasibility work. Routing within the site boundary of a building or campus may not have been included if insufficient information was available. The IZO routing was developed solely around buildings which could potentially be required to connect and did not consider potential voluntary connections.

The purpose of the concept heat network route is to define the scale, potential routing and identified associated constraints within the zone. Further work will be required to undertake a more detailed route assessment to take account of the buried utilities, building connections and other local strategic and local planning considerations. Table 7 below, shows the network

statistics including the combined network length and associated cost. Please see Appendix 5 for related methodology statements and assumptions.

The **Fengate IZO** transports heat over a 23km proposed network route. The network originates in the east of the zone with heat sourced from the PERF and the Flag Fen WWTW. The network then extends towards the centre, south, and north of the zone, connecting non-domestic buildings. Towards the south, southwest, and northwest, it connects to areas of new development. The network extends along the A1139 towards the north and crosses this road to connect to Peterborough City Academy, utilising the only available bridge to carry the heat network pipelines across. In the south, the network also crosses the river via the A1139 bridge. The network has been established based on the existing road infrastructure in the area.

The **Bourges IZO** will transport heat from the River Nene over a 5km proposed network route, centred around the city centre. The network originates in the south, from an energy centre located next to the River Nene, and extends northwards, connecting to building in the city centre such as Queensgate and the Town Hall. The northernmost proposed connection is the Central Library.

Table 7: Fengate and Bourges - Indicative Heat Network Statistics for the IZOs

IZO Heat network description	Network length (km)	Network cost (£m)
Fengate and Bourges	>28	~95

3.1.7) Fengate and Bourges – IZO Key Constraints and Mitigations

[C1] Road crossing: The A1139 is a constraint for heat network development in this zone. Two bridges could be used, one in the north (Eastfield Road) to connect to Peterborough City Academy, and one in the south (A1139 itself) to cross the River Nene and connect to the buildings on the south side of the river. Further studies will be required to assess feasibility, complete design and planning for these bridges to carry heat networks, with relevant Highways teams.

[C2] River and rail crossing: The River Nene and the main east-coast railway between Leeds and London are constraints in this zone. A potential crossing for the River Nene has been identified via the Town bridge which currently has no other infrastructure, such as electricity cables, attached to it. An options assessment and feasibility study involving stakeholder engagement with Network Rail would be required.

[C3, C4] Road crossing: The A15 road is a major artery enabling access to the city. There is potential to crossing this road at the Bridge Street intersection. A feasibility assessment involving stakeholder engagement with National Highways would be required.

3.2) Westwood

3.2.1) Westwood – HNZ Summary

Westwood is the second-largest Strategic HNZ in terms of area and heat demand, situated to the northwest of the city, as shown in Figure 4. It encompasses the Peterborough City Hospital as well as schools, shopping areas and residential areas with a diverse range of housing types, from detached and semi-detached houses to apartment buildings.

There are about 34 buildings identified as potentially required to connect in this zone. In addition to Peterborough City Hospital, other key anchor loads in the zone include The Cavell Centre and Jack Hunt School.

3.2.2) Westwood - Existing Heat Networks

There are no existing, planned or proposed heat networks identified in the Westwood HNZ.

3.2.3) Westwood – Initial Zone Opportunities

A single IZO was identified in the Westwood zone. Potential routing[16] is shown in Figure 8 and summary statistics provided in Table 8.

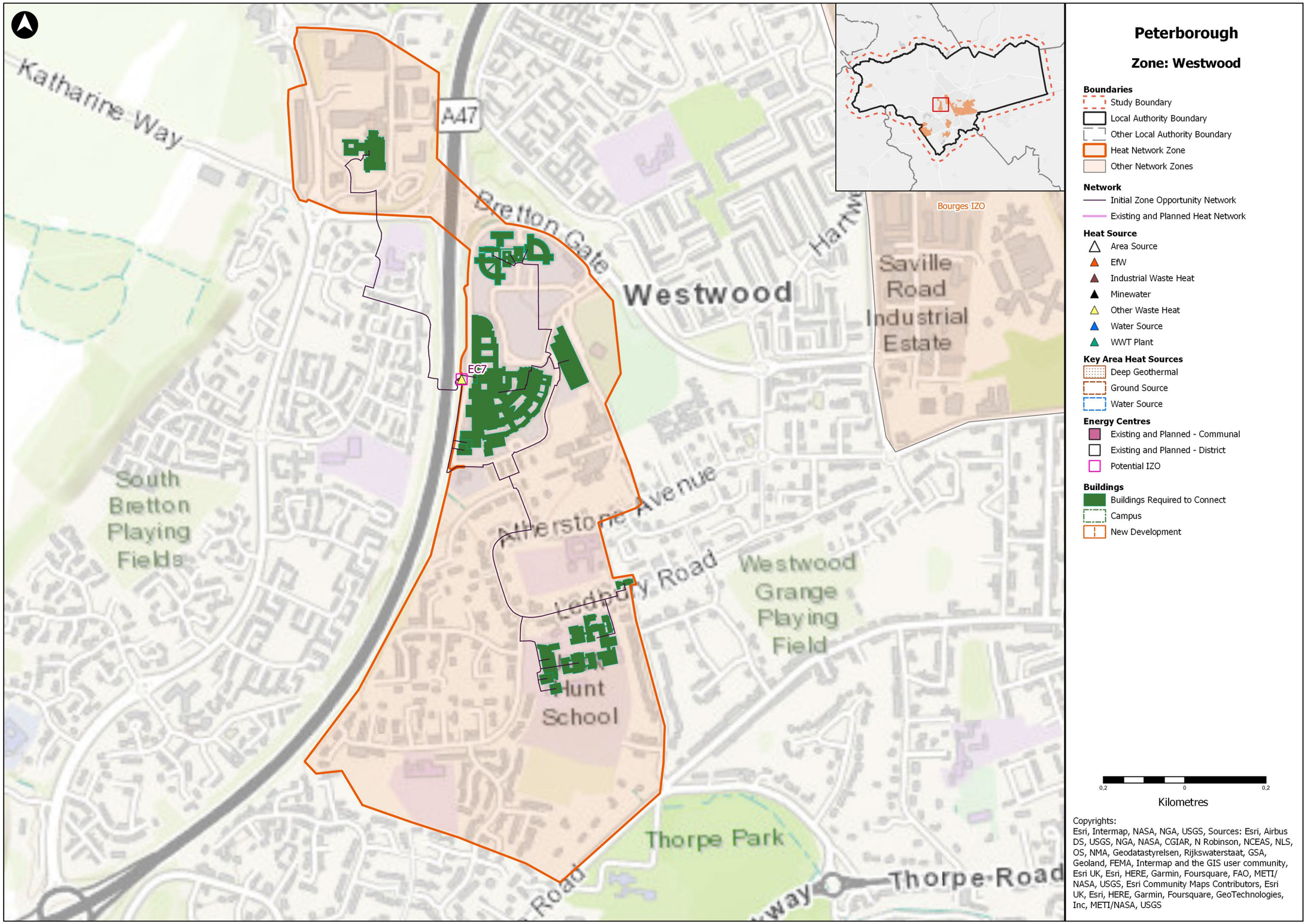
Table 8: Westwood - Summary Statistics for Initial Zone Opportunities[17]

CapEx	Heat	Network	CO_2e savings	LHD	Heat Sources
~£25m	~25GWh	~4km	~5ktCO_{2e}	4.1 MWh/m	ASHP

The proposed IZO connects the Peterborough City Hospital and other opportunities nearby. The estimated annual heat demand of buildings potentially required to connect is approximately 25GWh/yr. This is supplied with low-carbon heat from air source heat pumps (ASHPs) with an estimated total capacity of 15MW. The length of the proposed network is approximately 4km and is estimated to require a CapEx of approximately £25m to deliver.

[16] Routes can be expected to change as a better understanding of local constraints is developed through design.
[17] Please see Appendix 3 – Glossary, “Specific definitions” of the main report for definitions related to this table.

Figure 8: Initial Zone Opportunity in Westwood HNZ



3.2.4) Westwood – IZO Heat Demands

The majority of the heat demand comprises public sector buildings including the Peterborough City Hospital. Other heat demands include buildings in the health and education sectors as well as residential buildings (see Figure 9).

Further details of the key heat demands for buildings potentially required to connect are provided in Table 9. The proposed network connects to a mix of commercial, residential, and educational buildings. Public sector buildings such as Peterborough City Hospital, The Cavell Centre (a mental health facility) and Jack Hunt School are some of the largest heat demands.

Figure 9: Westwood - Categorisation of Heat Demand for Buildings Potentially Required to Connect in the IZO

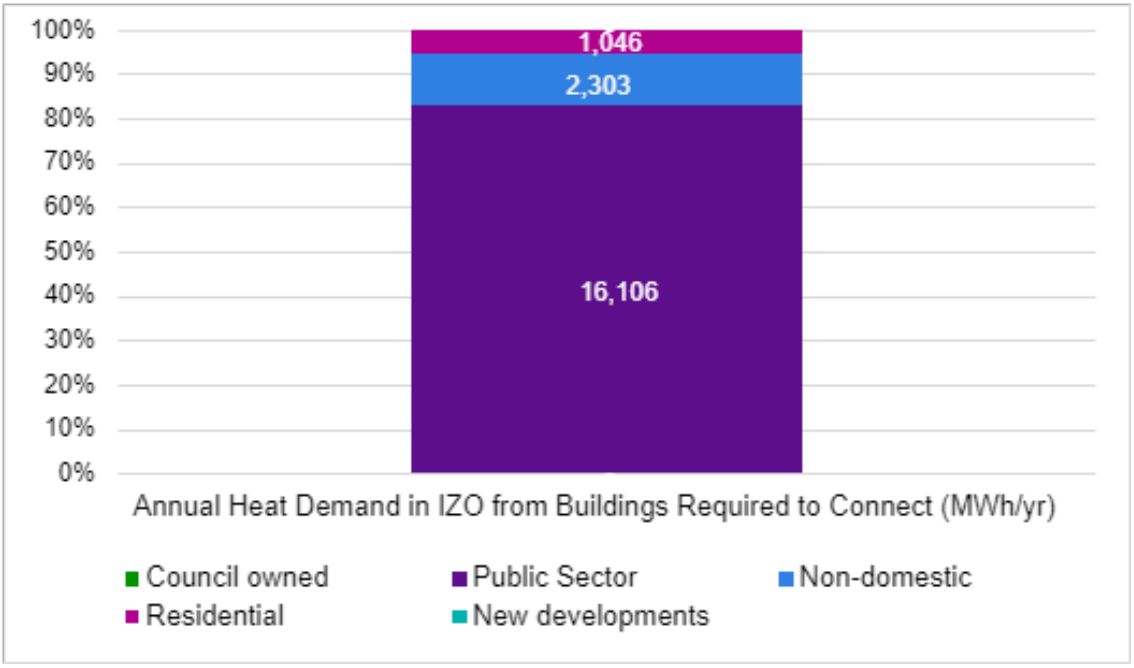


Table 9: Westwood - Key Heat Demands Required to Connect in the IZO[18]

Building name	Building category	Number of connections	Annual Heat Demand (MWh)	Data Source
Peterborough City Hospital	Public sector	61	12,000	ERIC
The Cavell Centre	Public Sector	1	2,575	DEC
Jack Hunt School	Public sector	1	1,725	DEC
The Cresset Centre	Residential	101	875	Benchmark (NZM)

[18] Please refer to Appendix 3 for definitions related to building categories in this table.

Bretton Centre	Non-domestic	6	650	Benchmark (NZM)
Budget Insurance Co.	Non-domestic (Offices)	1	550	Benchmark (NZM)
Westwood Farm	Non-domestic (Industrial buildings)	1	325	Benchmark (NZM)
Royal Haskoning DHV	Non-domestic (Offices)	1	250	Benchmark (NZM)
Longthorpe Primary school	Public sector	1	200	DEC
Aldi	Non-domestic	1	200	Benchmark (NZM)

3.2.5) Westwood – IZO Heat Sources

No significant low-carbon heat sources have been identified in this zone. Therefore, ASHP(s) are the preferred low-carbon option to meet the heat demand. The preferred location for an energy centre is on land next to the hospital, due to the proximity to this key heat demand however this would need to be explored further as part of a feasibility study.

Table 10 and Table 11 summarise the key heat sources and potential energy centre locations identified. These are also shown in the zone-level map in Section 3.2.3 above and on the city-level Map C in Appendix 1.

Table 10: Westwood - Key Heat Source Opportunities for the IZO

Heat source type	Supplied Capacity (kWp)	Temperature (Degrees Centigrade)	Potential Energy Centre (Ref number)
ASHP	15,800	>40ºC[19]	EC7

Table 11: Westwood - Potential IZO Energy Centre Locations

EC Ref #	Site type	Size (m^2)	Ownership	Heat Source
EC7	Land	2,500	North West Anglia NHS Foundation Trust	ASHP

[19] *The temperature at which heat will be distributed to heat offtakers, after upgrade processes*

3.2.6) Westwood – IZO Heat Distribution

Table 12 shows the network statistics including the network length and associated costs. Please refer to Section 3.1.6 and Appendix 5 for the assumptions used.

The network transports heat over a 4km proposed network route. The network originates at the Peterborough City Hospital site and travels south to connect to educational loads such as Thorpe School and Jack Hunt School, and north to The Cavell Centre. The network crosses the A47 via the only bridge close to the Hospital. The location of the energy centre was also selected to be close enough to the bridge to minimise the length of the required pipework.

Table 12: Westwood - Indicative Heat Network Statistics for the IZO

IZO Heat network description	Network length (km)	Network cost (£m)
Westwood	~4	>10

3.2.7) Westwood – IZO Key Constraints and Mitigations

[C6] Road crossing: The A47 Soke Parkway is a major trunk road in Peterborough. There is a small bridge present which might be suitable for crossing the A47. However, further investigation is required to assess the feasibility of deploying the bridge for the heat network crossing. For more details, see Map E in Appendix 1.

3.3) Morley

3.3.1) Morley – HNZ Summary

Morley is a small zone in the south of the city, above the A1139 as shown in Figure 4. It predominantly includes industrial and commercial buildings such as Lawrence David Limited, Bestway Peterborough, Big Motoring World, Booker Peterborough, and Big Sky Play and Party Venue. In total, 26 buildings are potentially required to connect. Key heat sources identified within this zone include WSHPs.

3.3.2) Morley - Existing Heat Networks

There are no existing, planned or proposed heat networks identified in the Morley HNZ.

3.3.3) Morley – Initial Zone Opportunities

A single IZO was identified in the Morley zone. Potential routing[20] is shown in Figure 10 and summary statistics provided in Table 13.

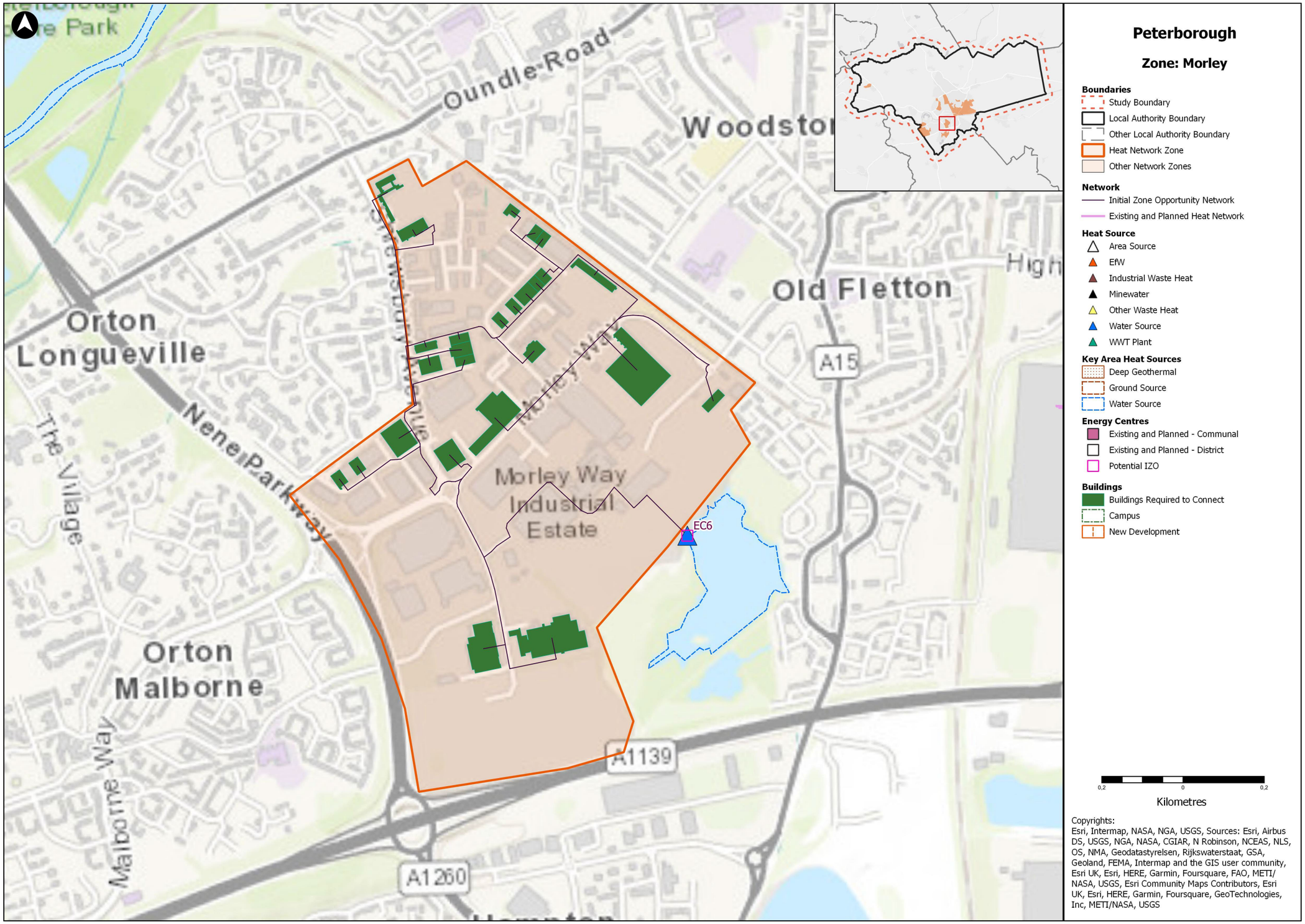
Table 13: Morley - Summary Statistics for Initial Zone Opportunities[21]

CapEx	Heat	Network	CO_2e savings	Linear Heat Density	Heat Sources
~£25m	>5GWh	>2km	~1ktCO_{2e}	2.1 MWh/m	WSHP

The proposed heat network supplies low carbon heat predominantly to commercial heat demands from offices and industrial buildings on the Morley Way Industrial Estate, using heat recovered from the nearby Stillwell Lake. The estimated annual heat demand connected is 5GWh/yr. The length of the network is approximately 2km and is estimated to require a CapEx of approximately £25m to deliver.

[20] Routes can be expected to change as a better understanding of local constraints is developed through design.
[21] Please see Appendix 3 – Glossary, “Specific definitions” of the main report for definitions related to this table.

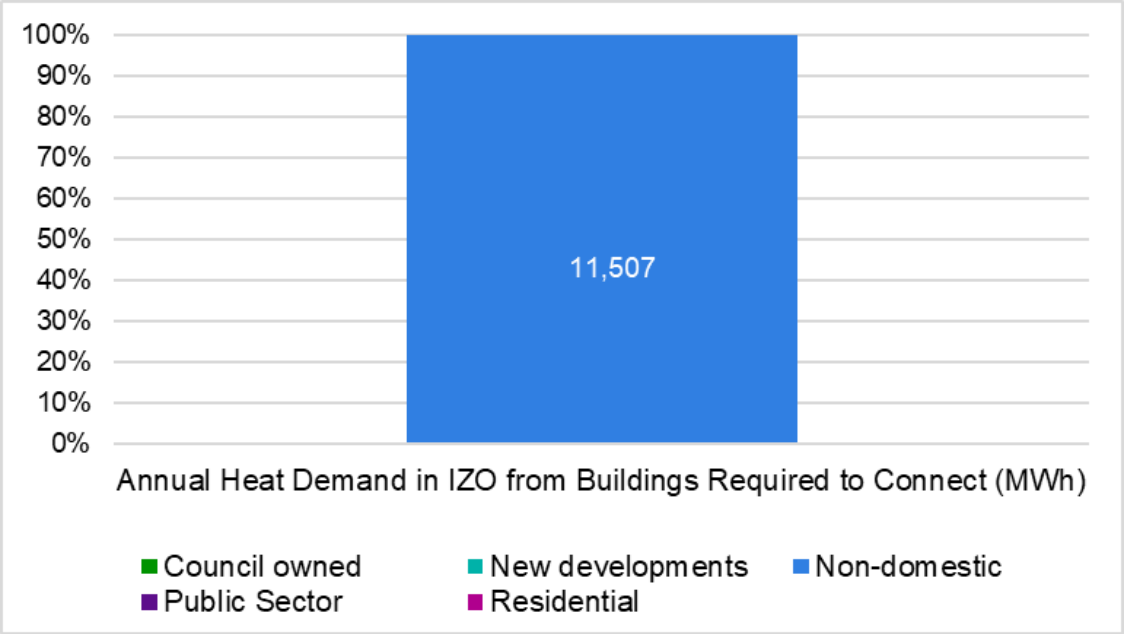
Figure 10: Initial Zone Opportunity in Morley HNZ



3.3.4) Morley – IZO Heat Demands

The buildings potentially required to connect to the Morley IZO consist entirely of non-domestic buildings, as shown in Figure 11. Further details of the key heat demands for buildings potentially required to connect are provided in Table 14 and discussed further below.

Figure 11: Morley - Categorisation of Heat Demand for Buildings Potentially Required to Connect in the IZO



Non-domestic anchor loads include organisations in the retail sector such as Best Ways and Booker and others such as truck manufacturer, Lawrence David Limited, second-hand car dealer, Big Motoring World, and entertainment park, Big Sky Play. These buildings are likely to have specific heating requirements and therefore the estimates provided here may over-estimate the extent of this opportunity. This includes checking for compatibility of connecting existing systems to a heat network.

Table 14: Morley - Key Heat Demands Required to Connect in the IZO[22]

Building name	Building category	Number of connections	Annual Heat Demand (MWh)	Data Source
Big Motoring World	Non-domestic (Industrial buildings)	1	2,325	Benchmark (NZM)
Lawrence David Holdings	Non-domestic (Industrial buildings)	1	1,750	Benchmark (NZM)
Best Ways Cash & Carry	Non-domestic	1	1,200	Benchmark (NZM)
Booker Cash & Carry	Non-domestic	1	1,200	Benchmark (NZM)
Big Sky Co	Non-domestic (Entertainment)	2	550	Benchmark (NZM)
Opals Group	Non-domestic (Industrial buildings)	1	510	Benchmark (NZM)
Cross Keys Homes	Non-domestic (Offices)	1	375	Benchmark (NZM)
Lloyds TSB Bank Plc	Non-domestic (Offices)	1	375	Benchmark (NZM)
Lawrence David (Maxwell Road)	Non-domestic (Industrial buildings)	11	350	Benchmark (NZM)
Lawrence David	Non-domestic (Industrial buildings)	1	350	Benchmark (NZM)

3.3.5) Morley – IZO Heat Sources

A WSHP has been identified as the preferred low carbon heat source recovering heat from Stillwell Lake adjacent to Morley Way Industrial Estate. There is potential to use a parcel of brownfield land on the north-west shore of the lake where the industrial estate is closest to the water.

[22] Please refer to Appendix 3 for definitions related to building categories in this table.

Table 15 and Table 16 in this section summarise the key heat sources and potential energy centre locations identified. These are also shown in the zone-level map in Section 3.3.3 above and on the city-level Map C in Appendix 1.

Table 15: Morley - Key Heat Source Opportunities for the IZO

Heat source type	Supplied Capacity (kWp)	Temperature (Degrees Centigrade)	Potential Energy Centre (Ref number)
WSHP – Stillwell Lake	1,400	10ºC	EC6

Table 16: Morley - Potential IZO Energy Centre Locations

EC Ref #	Site type	Size (m^2)	Ownership	Heat Source
EC6	Industrial land	1,000	Unknown	WSHP

3.3.6) Morley – IZO Heat Distribution

Table 17 shows the network statistics including the network length and associated costs. Please refer to Section 3.1.6 and Appendix 5 for the assumptions used.

Heat recovered from Stillwell Lake is transported across a 2km distribution network to heat buildings throughout the Morley industrial area. The network subsequently branches out to serve various heat demands, including commercial entities like Lawrence David Holdings, Best Ways Cash & Carry, and Booker Cash & Carry.

Table 17: Morley - Indicative Heat Network Statistics for the IZO

IZO Heat network description	Network length (km)	Network cost (£m)
Morley	>2	~10

3.3.7) Morley – IZO Key Constraints and Mitigations

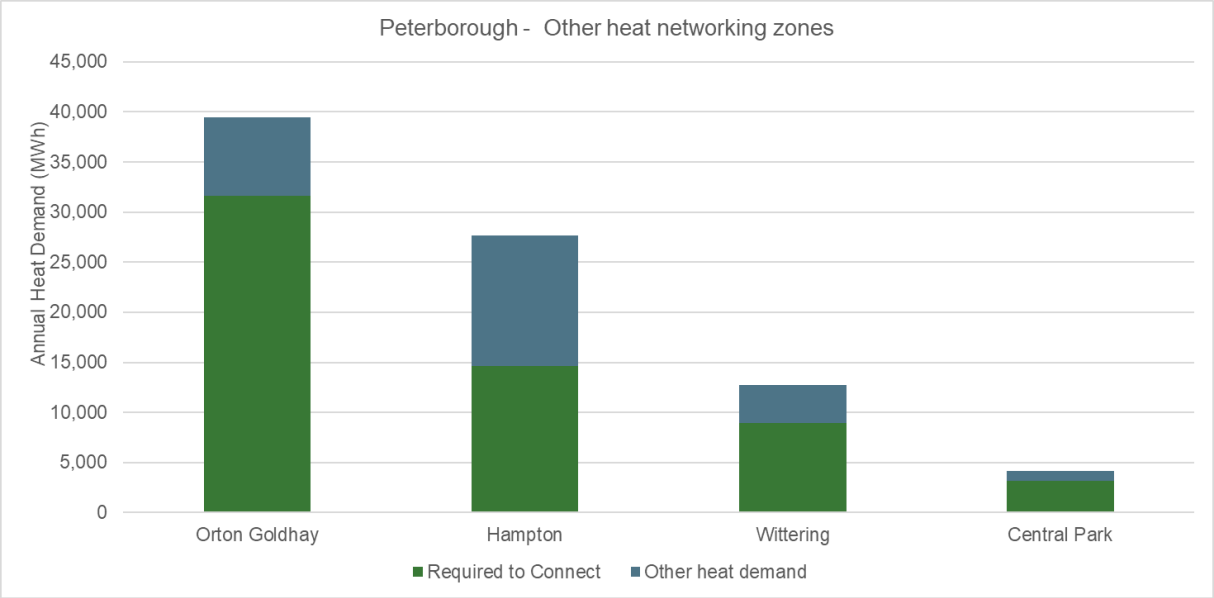
There are no major constraints identified for the proposed IZO network route.

4) Other Heat Network Zones

This section describes the 'Other' potential heat network zones that were identified in Peterborough. These are areas where heat networks were deemed to offer the lowest carbon route to decarbonising heat but are often much smaller or discrete in nature than the 'Strategic' heat network zones identified. The approach taken in the Pilot programme did not apply a minimum threshold for zone identification and therefore future work will need to consider factors such as size and aggregation to ensure efficient and effective delivery of heat networks in the area.

Figure 12 illustrates the total annual heat demand, and the proportion of which is associated with buildings that may potentially be required to connect within each zone. A map of all zones can be found in Figure 4.

Figure 12: Total Heat Demand and Proportion Required to Connect in Other HNZs



Orton Goldhay: is located southwest of the city centre and south of the River Nene. It encompasses a mix of offices, industrial buildings, and retail businesses. Key areas within this zone include Orton Southgate, Peterborough Business Park, and The Pearl Centre.

Hampton: is located south of the city centre, just below Morley. The area features a mix of retail outlets and public sector buildings. Key heat demands in this zone include the Serpentine Green Shopping Centre, Hampton College, and Hampton Library and Leisure Centre. Serpentine Lake is regarded as a potential low-carbon heat source for the zone.

Wittering and Central Park: are smaller areas including the Thomas Deacon Academy and Peterborough Regional College. No major low carbon heat sources have been identified in these two zones.

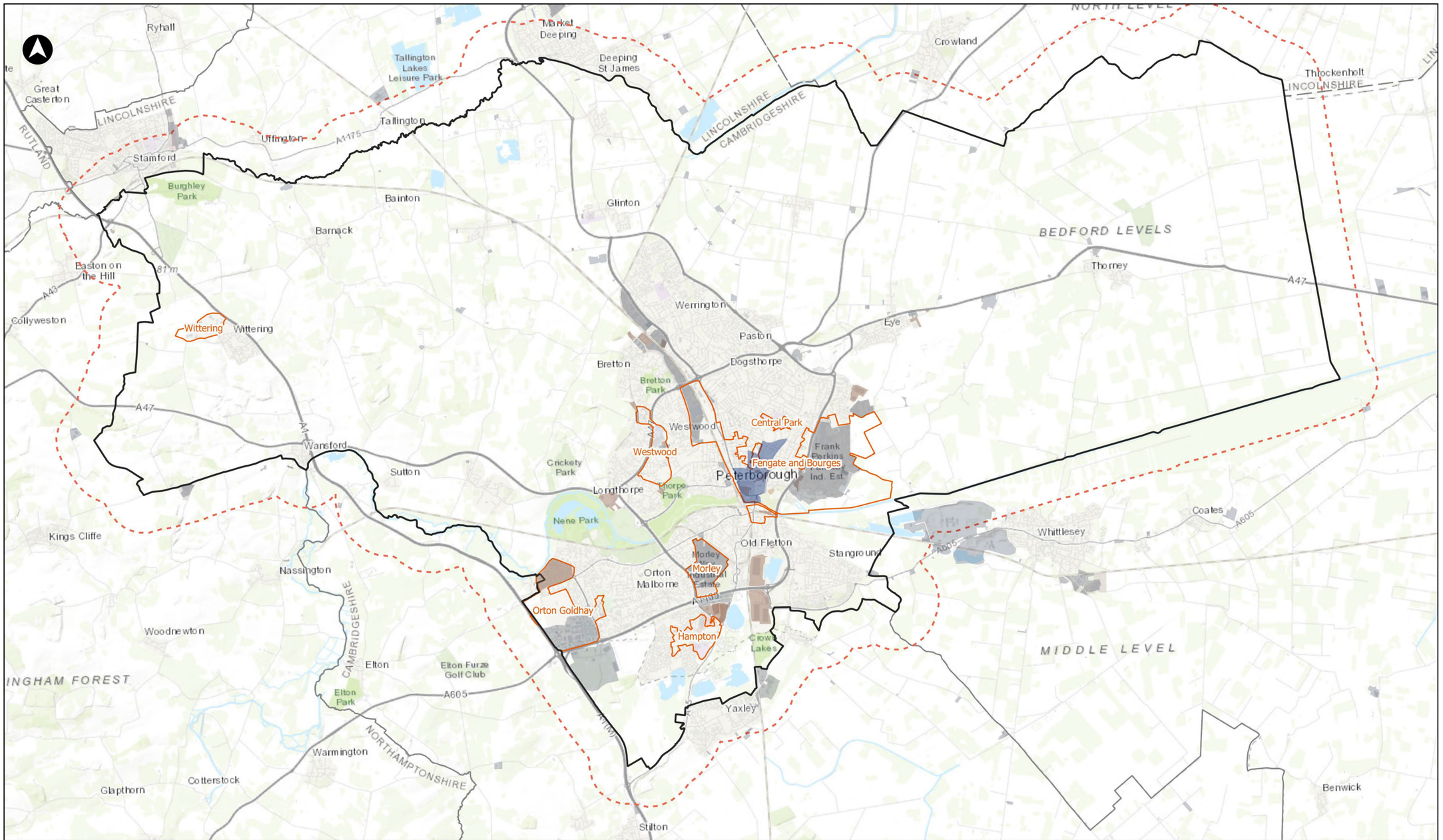
Appendix 1: Maps and Legends

This section provides guidance on interpreting the icons and legends used throughout this report and Maps A-F that follow:

Legend / icon	Relevant map(s)	What this represents on the map	Comments on interpretation
	Report maps	Study boundary	Extends 1km beyond Local Authority boundary to include cross boundary opportunities
	Report maps	Local Authority boundary	
	Report maps	Other Local Authority boundary	
	Report maps	Heat network zones	This includes both Strategic HNZs and Other HNZs.
	Report maps	Other heat network zones	Smaller or discrete heat network zone opportunities
	Report maps	New developments	New development within heat network zones and IZOs that will still be in construction post-2025
Gates Hill	Report maps	Heat network zone name / reference number	‘Strategic’ zones are named; ‘Other’ zones are represented by a reference number
	Report maps	Buildings potentially required to connect	Buildings that could be required to connect (as described in the HNZ Consultation 2023)
	Report maps	Campuses	Multiple buildings owned and operated by the same organisation (e.g. Universities, Hospitals)
	Report maps	Initial Zone Opportunity concept network route	Conceptual heat network pipe routes between buildings that could be required to connect
	Report maps	Existing and Planned Heat Networks	Known existing or planned heat network pipe routes as provided by local stakeholders
	Report maps	Potential energy centre - IZO	Potential energy centre location for an IZO (see section 3)
	Report maps	Existing/planned energy centre - Communal HNs	‘Communal’ energy centres are those operated within a single building or across a campus
	Report maps	Existing/planned energy centre - District HNs	‘District’ energy centres supply multiple buildings across multiple sites
Appendix 1: A – Typology map			
	Appendix 1: Map A	Dense City Centre	Locally recognised as the City or Town centre, where buildings development is most dense
	Appendix 1: Map A	City Centre Fringe	Around the City or Town Centre or at its outskirts, where both building density reduces
	Appendix 1: Map A	Mixed Use District	A variety of building typologies, with no single typology prevailing in the area
	Appendix 1: Map A	Social Housing	Public, private and third sector social housing
	Appendix 1: Map A	Campus (health / education)	Buildings that are owned and operated together (e.g. Universities, Hospitals)

	Appendix 1: Map A	Commercial / business office	Public & private office space
	Appendix 1: Map A	Industrial areas	Primarily used for manufacturing, engineering, and warehousing
Appendix 1: B – Key heat demands			
	Appendix 1: Map B	Top 10 Heat Demands	The largest (anchor) heat loads within the Pilot programme study area (see Section 3)
	Appendix 1: Map B	Local Authority	Buildings owned or operated by the Local Authority
	Appendix 1: Map B	Other public sector	Other buildings owned or operated by the public sector (e.g. hospital, universities, Govt. estates)
	Appendix 1: Map B	Residential with existing communal heating	Residential buildings with existing communal heating systems installed
	Appendix 1: Map B	Non-domestic private	Non-domestic private buildings (e.g. commercial, offices)
	Appendix 1: Map B	Industrial	Mixed industrial sites (e.g. light or heavy industry, manufacturing, warehouses and distribution)
400 - 600	Appendix 1: Map B	Building heat demand (MWh/yr)	Circle size increases with size of heat demand
Appendix 1: C – Key Heat Sources and Potential Energy Centres			
	Appendix 1: Map C	EfW plant	**Point heat sources** have known or likely points of heat offtake/abstraction Mine water and water source ‘points’ indicate potential abstraction points. Other waste heat sources include sewers, electrical substations and other sources of heat. See section 3 for more detail on heat source capacities, where known. On the City-level Map C only, the heat waste symbol is sized according to its scale in GWh/yr
	Appendix 1: Map C	Industrial Waste Heat	
	Appendix 1: Map C	Mine water	
	Appendix 1: Map C	Other Waste Heat	
	Appendix 1: Map C	Water Source	
	Appendix 1: Map C	Waste Water Treatment	
	Appendix 1: Map C	Deep geothermal or mine water heat	**Area heat sources** differ from point-heat sources in that the exact location for extracting heat from the resource is not yet determined
	Appendix 1: Map C	Ground source	
	Appendix 1: Map C	Water source	
Appendix 1: D – Existing and planned heat networks			
	Appendix 1: Map D	Existing and planned heat networks	At this scale the route of an existing HN cannot be displayed, so an area outline is used instead
Appendix 1: E – Physical constraints			
	Appendix 1: Map E	Key constraints	Key heat network routing constraints as described in section 3

A. Peterborough Typology Map



Boundaries

- Study Boundary
- Local Authority Boundary
- Other Local Authority Boundary
- Heat Network Zones

Key Typologies

- Dense city centre
- City centre fringe
- Mixed use district
- Social housing
- Campus (health/education)
- Commercial / business office district
- Industrial areas

3 0 3

Kilometres
Scale: 1:90,000
Coordinate System: OSGB36 / British National Grid

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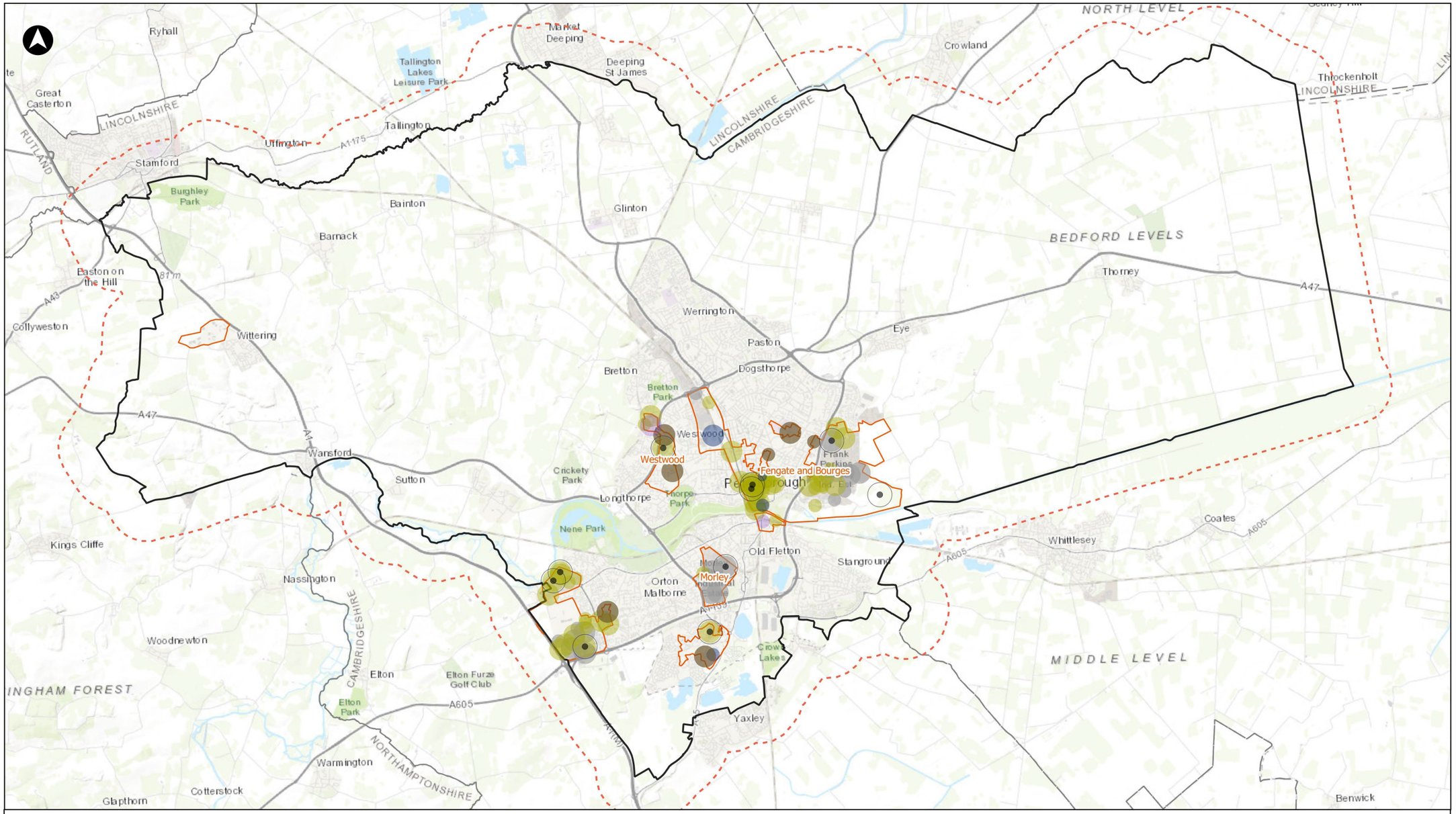
Peterborough

Map A

City Typologies

B. Key Heat Demands



Boundaries
- Study Boundary
- Local Authority Boundary
- Other Local Authority Boundary
- Heat Network Zones
- New Development

Key Heat Demand
- Local authority loads
- Other public sector loads
- Residential with communal heating
- Non-domestic private buildings
- Industrial
- Top 10 heat demands

Heat Demand (MWh/Year)
- 100 - 200
- 200 - 400
- 400 - 600
- 600 - 1000

6 0 6
Kilometres
Scale: 1:90,000

Coordinate System: OSGB36 / British National Grid

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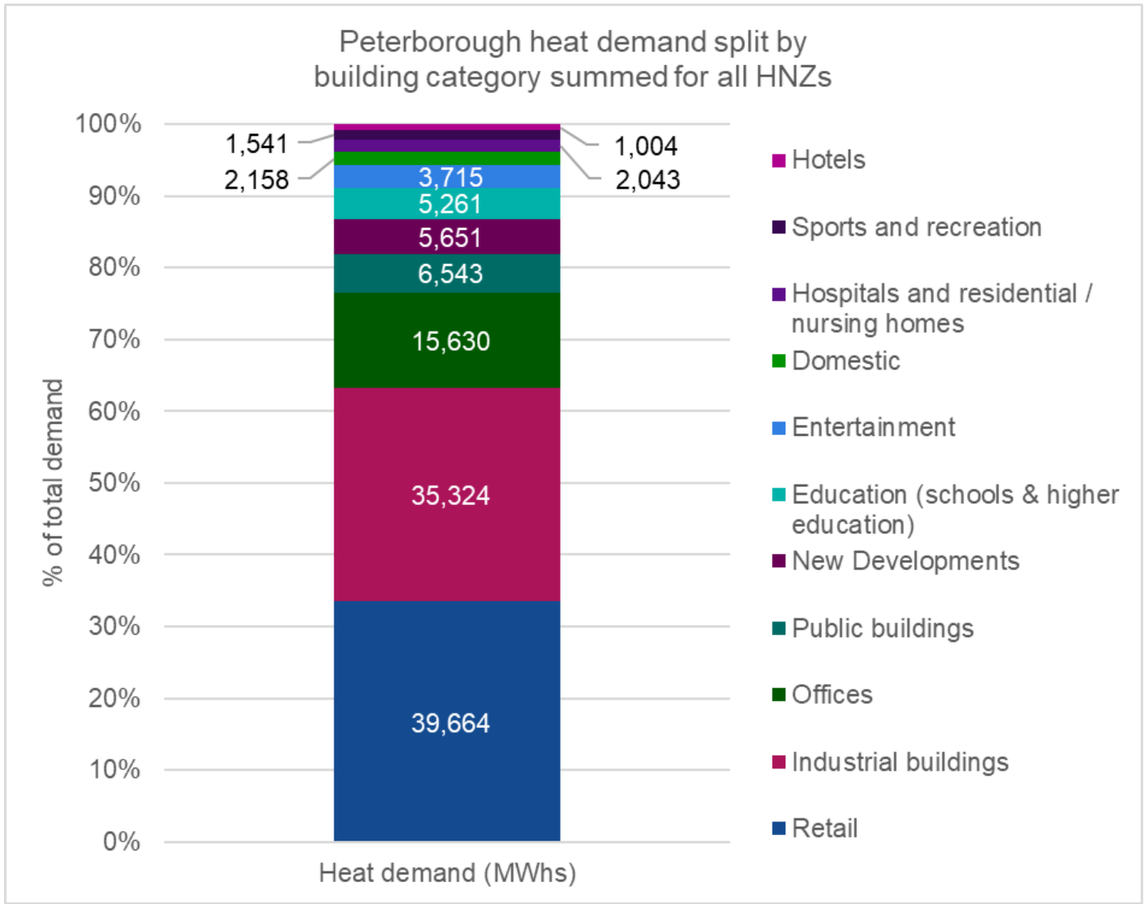
Map B

Key Heat Demand

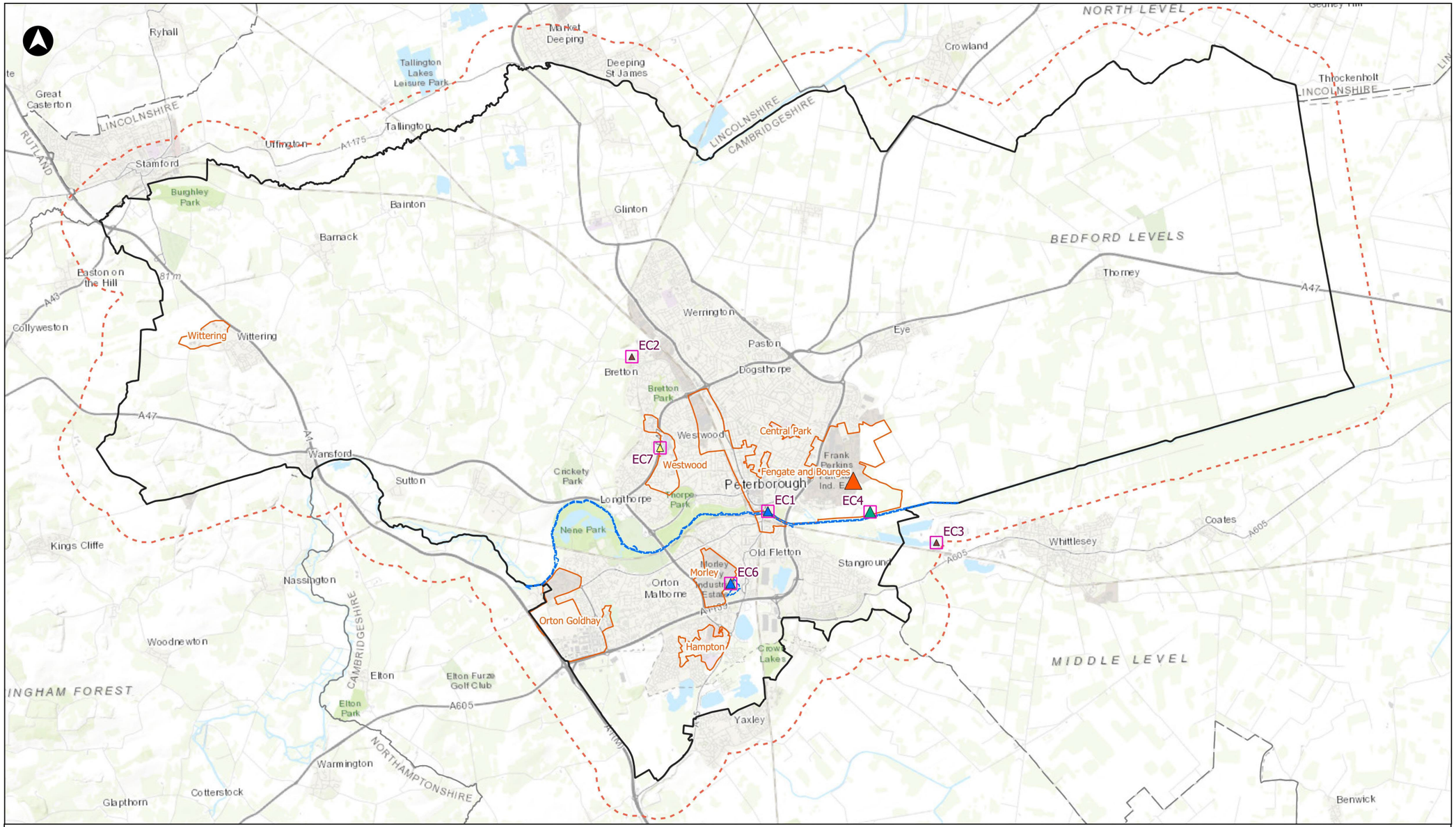
Table 18: Heat Demand split further by Building Categories across all Initial Zone Opportunities identified in Strategic HNZs in the Study Area

Building category (based on CIBSE)	Number of Buildings Required to Connect in this category	Annual Heat Demand of Buildings Required to Connect across Strategic HNZs (MWh)
Domestic	5	2,150
Education (schools & higher education)	16	5,250
Entertainment	9	3,725
Hospitals and residential/nursing homes	4	2,050
Hotels	5	1000
Industrial buildings	73	35,324
Offices	55	15,630
Public buildings	18	6,550
Retail	79	39,675
Sports and recreation	7	1,550
New developments	14	5,650
Totals	**285**	**118,525**



Note: In Peterborough there are three Strategic HNZs with a total of four IZOs identified across them. The table and graph above summarise the heat demand for buildings potentially required to connect in the Strategic HNZs.

C. Key Heat Sources and Potential Energy Centres



Boundaries
- Study Boundary
- Local Authority Boundary
- Other Local Authority Boundary
- Heat Network Zones

Key Area Heat Sources
- Deep Geothermal
- Ground Source
- Water Source

Heat Source
- Area Source
- EfW
- Industrial Waste Heat
- Minewater
- Other Waste Heat
- Water Source
- WWT Plant

Capacity (GWh/year)
- 0 - 2
- 2 - 4
- 4 - 6
- 6 - 8

Energy Centres
- Potential IZO

3 0 3
Kilometres
Scale:1:89,999,928335
Coordinate System: OSGB36 / British National Grid

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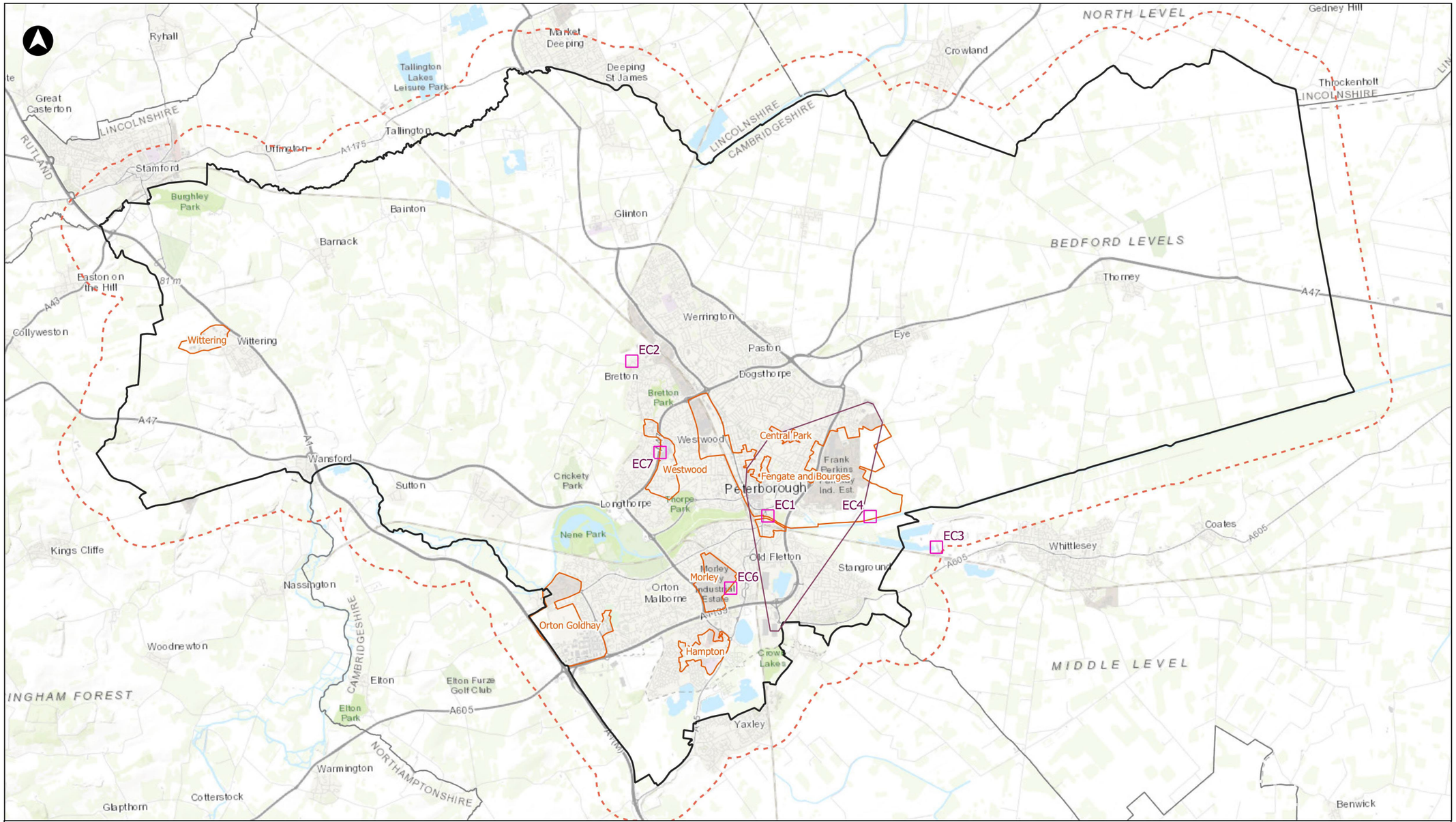
Peterborough

Map C

Key Heat Sources and Energy Centres

D. Existing and Planned Heat Networks



Boundaries
- Study Boundary
- Local Authority Boundary
- Other Local Authority Boundary
- Heat Network Zones

Existing and Planned Heat Networks

Energy Centres
- Potential IZO site

6 0 6
Kilometres
Scale 1:89,999,928335
Coordinate System: OSGB36 / British National Grid

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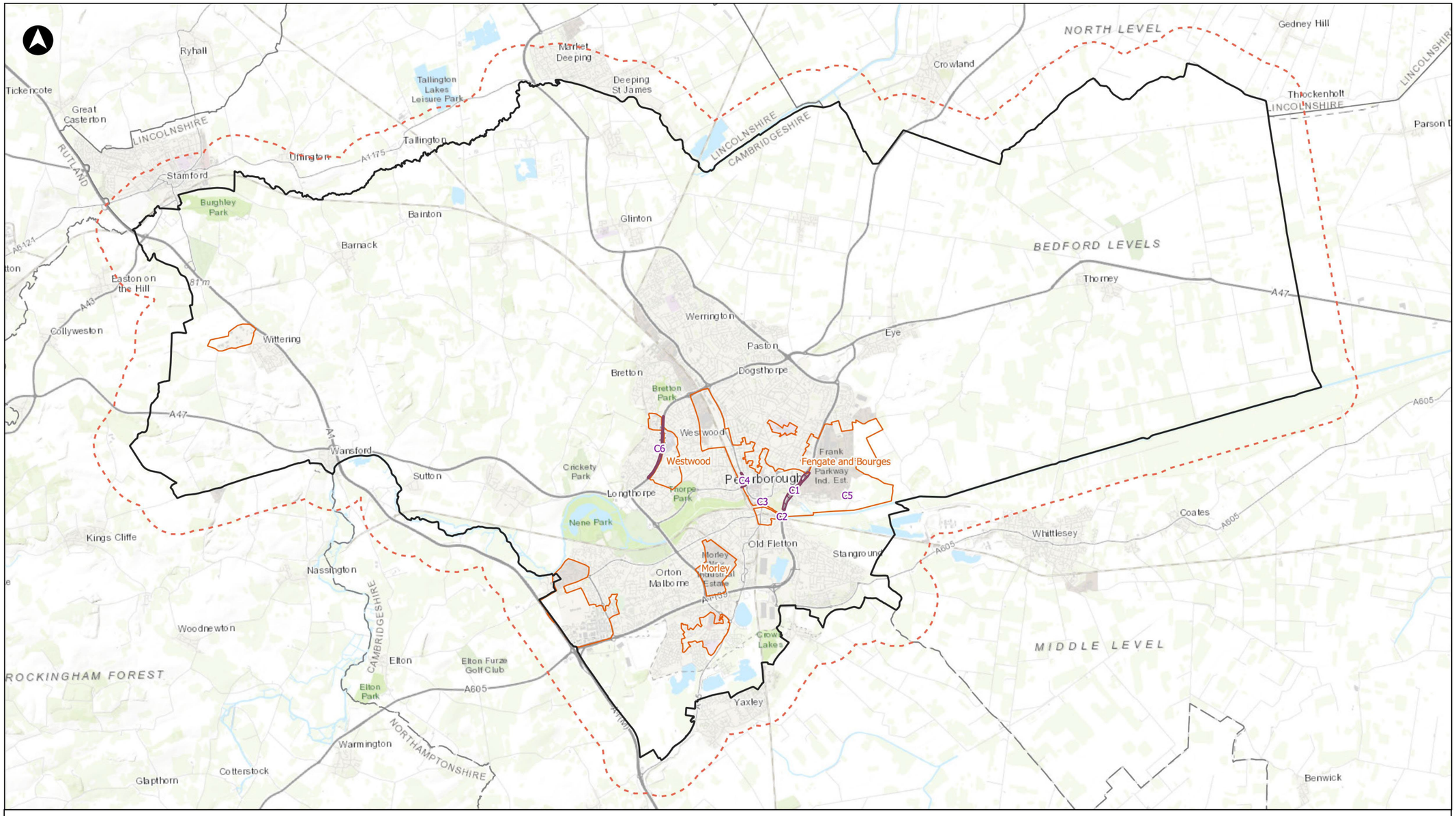
Map D

Existing and Planned Heat Networks

E. Physical Constraints



Boundaries

- Study Boundary
- Local Authority Boundary
- Other Local Authority Boundary
- Heat Network Zones

Key Constraints

6 0 6

Kilometres
Scale 1:95,000

Coordinate System: OSGB36 / British National Grid

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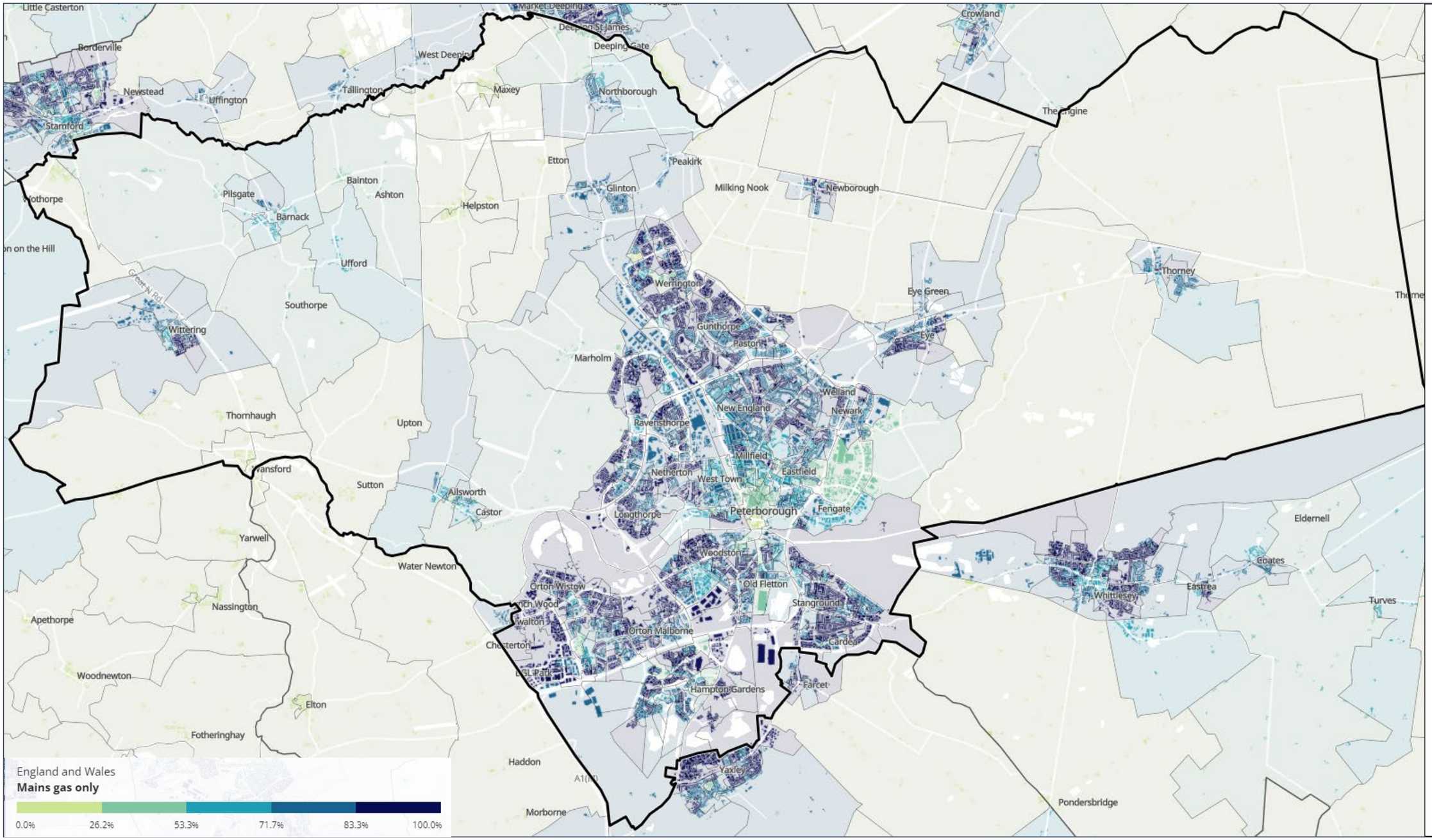
Map E

Physical Constraints

F. Off-Gas Grid Areas in Peterborough



Credit: This is an excerpt from the ONS Census Maps 2021 which is available to explore online. The data shown is subject to Crown copyright protection, is published under the Open Government Licence (OGL) and embeds map data which is copyright of Ordnance Survey and Street maps.

Appendix 2: Data Room Resources

Throughout the delivery of the Pilot programme, information resources have been compiled for future use in relation to the development of heat network zones.

These resources will remain restricted to DESNZ and the local authority. This is to ensure that the department remains within its Data Privacy Notice as shared with stakeholders providing the information. GIS outputs are not being published alongside the report as they are subject to change.

Table 19: Pilot Programme Standardised Information Resources

Information resource	Description of resource
Stakeholder Directory	A directory listing key stakeholders identified and approached during the Pilot programme, including organisation name, address, or website, contact names, work title and contact details.
Stakeholder meetings log and records	A log of key meetings held and related meeting records.
Datasets Directory	A list of datasets / reports shared by stakeholders cross-referencing who provided the item from the stakeholder directory and a description of the dataset.
Geospatial packages and related geo-coded datasets	Geo-coded datasets and descriptions related to maps produced in this report.

Table 20: Pilot Programme Study-Area-Specific Information Resources

Information resource	Description of resource
Peterborough Energy Recovery Facility	Data and Information supplied during site visit and meetings
Peterborough City Council Network Route	Photographs and information following route walk of the Fengate and Bourges Zone
Queensgate Shopping Centre	Small quantity of data and information following site visit. Tenants of the centre organise their own energy supplies
Anglian Water	Data and information about site and future expansion plans following meetings
Cross Keys Homes	Full data set for all their properties in Peterborough following many meetings. Cross Keys Homes has adopted all the Peterborough Council housing stock. They manage the great majority of social homes in the city.

Information resource	Description of resource
Canals and Rivers Trust	Data for all of the Canals and Rivers Trust assets across the UK secured including data for Peterborough.
Perkins Engines	Information and some high-level data secured
PIRI project	Data and reports including DPD associated with PIRI supplied by Peterborough City Council and DPD consultants
Energy Systems Catapult (ESC)	Detailed data sets secured from ESC from the Peterborough City Council LAEP. Further meetings with ESC secured additional LAEP data and background information
Peterborough City Council	Detailed information additional to core project submissions e.g. River Nene bridge crossing constraints, Crematoria, New Developments

This publication is available from: https://www.gov.uk/government/collections/heat-networks

If you need a version of this document in a more accessible format, please email alt.formats@energysecurity.gov.uk. Please tell us what format you need. It will help us if you say what assistive technology you use.