

# Agenda

## Special Meeting of Infrastructure, Regeneration and Economic Development Committee

**Date:** Wednesday, 21 February 2024

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**Time:** 16:00

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**Format:** Hybrid meeting

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**Contact:** Email: Nicola Moorcroft, Committee Officer  
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Dear Member

Please attend a Special meeting of the **Infrastructure, Regeneration and Economic Development Committee** as detailed above.

Members will have the option to attend the meeting remotely or in person at the Civic Space, 16 Church Street, Dumbarton.

The business is shown on the attached agenda.

Yours faithfully

**PETER HESSETT**

Chief Executive

Distribution:-

Councillor David McBride (Chair)  
Councillor Jonathan McColl  
Councillor Michelle McGinty  
Councillor John Millar  
Councillor Lawrence O'Neill (Vice Chair)  
Councillor Lauren Oxley  
Councillor Chris Pollock  
Councillor Martin Rooney  
Councillor Gordon Scanlan  
Councillor Hazel Sorrell  
Councillor Clare Steel  
Councillor Sophie Traynor

All other Councillors for information

Chief Executive  
Chief Officer – Regulatory and Regeneration  
Chief Officer – Resources  
Chief Officer – Roads and Neighbourhood

Date of Issue: 16 February 2024

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**INFRASTRUCTURE, REGENERATION AND ECONOMIC  
DEVELOPMENT COMMITTEE**

**WEDNESDAY, 21 FEBRUARY 2024**

**AGENDA**

**1 STATEMENT BY CHAIR – AUDIO STREAMING**

The Chair will be heard in connection with the above.

**2 APOLOGIES**

**3 DECLARATIONS OF INTEREST**

Members are invited to declare if they have an interest in the item of business on this agenda and the reasons for such a declaration.

**4 RECORDING OF VOTES**

The Committee is asked to agree that all votes taken during the meeting be done by roll call vote to ensure an accurate record.

**5 LOCAL HEAT AND ENERGY EFFICIENCY STRATEGY (LHEES) CONSULTATIVE DRAFT 5 - 92**

Submit report by Chief Officer – Regulatory and Regeneration, seeking approval for a draft Local Heat and Energy Efficiency Strategy (LHEES) 2024-2029.

**6 NET ZERO COOPERATION AGREEMENT 93 - 99**

Submit report by Chief Officer – Roads and Neighbourhood, seeking permission to enter a Net Zero Cooperation Agreement developed between West Dunbartonshire Council and Glasgow City Council. The Agreement proposes to share expertise, skills, resources and infrastructure to help deliver the Council's Climate Change Action Plans to deliver Net Zero ambitions.

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**7 LEASE OF WEST DUNBARTONSHIRE ACTIVITY CENTRE 101 - 104**  
**73 ARDOCH CRESCENT, BRUCEHILL, DUMBARTON G82 4EN**

Submit report by Chief Officer – Resources seeking approval of the lease of West Dunbartonshire Activity Centre to West Dunbartonshire Gymnastics Club.

**8 LEASE OF EAST END FOOTBALL PITCH GLASGOW ROAD, 105 - 108**  
**DUMBARTON G82 1RH**

Submit report by Chief Officer – Resources seeking approval to transfer East End Football Pitch and associated Pavilion, Glasgow Road, Dumbarton G82 1RH to St Patrick's Former Pupils.

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**WEST DUNBARTONSHIRE COUNCIL****Report by Chief Officer Regulatory & Regeneration****Infrastructure Regeneration and Economic Development Committee:  
21 February 2024**

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**Subject: Local Heat and Energy Efficiency Strategy (LHEES) 2024-2029**

**1. Purpose**

**1.1** The purpose of this report is to obtain approval for a draft Local Heat and Energy Efficiency Strategy (LHEES) 2024-2029.

**2. Recommendations**

**2.1** The Committee is invited to:

- (i) Approve the draft Local Heat and Energy Efficiency Strategy 2024-2029 and delegate authority to the Chief Officer Regulatory & Regeneration to deliver against this plan;
- (ii) Authorise commencement of public consultation of draft LHEES, following approval; and
- (iii) Authorise development of Local Heat and Energy Efficiency Delivery Plan (LHEEDP) in line with the draft LHEES.

**3. Background**

**3.1** Scottish Government has set ambitious targets that aim to ensure our homes and buildings produce net zero carbon emissions and no longer contribute to climate change or fuel poverty by 2045. To meet these targets almost all homes, public buildings and businesses will need to increase their energy efficiency and install zero emissions heating. A statutory order was passed by the Scottish Government that requires all local authorities to develop Local Heat and Energy Efficiency Strategies (LHEES) and Delivery Plans. Locally-led planning, coordination and delivery of heat transitions across public and private sectors will ensure the specific needs of communities are met and LHEES will be the principal mechanism to develop this approach.

**3.2** The LHEES for West Dunbartonshire will underpin an area-based, local authority wide approach to heat and energy efficiency planning and delivery. An LHEES sets out the strategic framework for decarbonising heat and improving energy efficiency within buildings in West Dunbartonshire. This Strategy is the first for West Dunbartonshire, and will be required to then be updated at intervals of no more than five years. The strategic plan has been

developed by following Scottish Government's LHEES methodology and is therefore framed around the following considerations:

- Heat Networks;
- Off Gas Buildings;
- On Gas Buildings;
- Poor Building Energy Efficiency / Poor Building Energy Efficiency as a Driver for Fuel Poverty; and
- Mixed Tenure, Mixed Use and Historic Buildings.

**3.3** Delivering on their LHEESs is the principal way in which local authorities will contribute to achieving the ambitious targets set out in Scotland's Heat in Buildings Strategy. The Heat in Buildings Strategy (2021) sets the Scottish Government's vision for the future of heat in buildings, with targets for 2030 including:

- Emissions from homes and non-domestic buildings to fall by 68% (versus 2020);
- At least 22% of heat in buildings is to be directly supplied from renewable sources;
- Where technically and legally feasible, and cost-effective, a large majority of buildings should achieve a good level of energy efficiency; and
- Over 50,000 non-domestic buildings are converted to zero emissions heat.

**3.4** LHEES Strategies should also consider how they contribute to meeting statutory targets for greenhouse gas emissions reduction and fuel poverty, including:

- Net zero emissions by 2045 and 75% reduction by 2030; and
- In 2040, as far as reasonably possible, no household in Scotland is in fuel poverty.

**3.5** West Dunbartonshire Council's LHEES is further driven by local emissions and fuel poverty ambitions set out in Climate Change Strategy and Climate Change Action Plan. The Council aims to:

- Achieve 'net-zero' by 2045, with interim carbon reduction targets of 61% by 2030-31 and 87% by 2040-41;
- Continue to take action to reduce energy consumption and improve energy and water efficiency in our buildings and across our operations;
- Continue to reduce energy demand and decarbonise heat supply in the Clydebank area and Queens Quay heat network; and
- Further reduce energy consumption and improve energy efficiency in our social housing and fuel poor households, ensuring fuel poverty and the decarbonisation of housing are key to achieving a net zero carbon future.

## **4. Main Issues**

### **4.1** The aim of the LHEES document is to:

- Set out how the building stock needs to change to meet national and local objectives, including achieving net zero carbon emissions in the building sector, and the removing poor energy efficiency as a driver of fuel poverty;
- Identify strategic heat decarbonisation zones, and set out the principal measures for reducing buildings emissions within each zone; and
- Prioritise areas for delivery, against national and local priorities.

### **4.2** West Dunbartonshire's current building stock was modelled in terms of its characteristics, energy efficiency and level of heat decarbonisation, split by domestic and non-domestic properties to provide a baseline analysis. Domestic building stock equates to a total of 93.6% of all the buildings within the local authority, with a total count of 46,252, and a heat demand of 517.4 GWh per year (80% of the local authority's total). Of the c.46,000 homes in West Dunbartonshire:

- Almost half (44%) of domestic properties are small blocks of flats/converted flats and blocks of flats; 23%, and 21% respectively, presenting greater opportunities for more holistic energy efficiency and heat decarbonisation interventions;
- Four in ten (40%) of all wall types remain uninsulated, including 15% cavity wall construction, and 8% of lofts have less than 99mm of insulation, showing potential for low regrets energy efficiency improvements (low regrets are relatively low cost interventions, with relatively large benefits based on projected future climate changes); and
- The vast majority of domestic properties (91%) use gas as their main heating fuel, this is significantly higher than the national average (80%), and present a greater heat decarbonisation challenge.

### **4.3** Within West Dunbartonshire the non-domestic building stock equates to a total of 6.4% of all the buildings, with a total count of 3,147, and a heat demand of 144.5 GWh per year (20% of the local authority total). The c.3k non-domestic building stock within West Dunbartonshire have been summarised by various characteristics, providing counts and heating demand for each characteristic category:

- The majority of non-domestic buildings, 68%, are comprised of retail, office and light manufacturing and account for 51% of heat demand across the local authority area; and
- Over one third of buildings were built before 1919, which will like make it more challenging to significantly increase energy efficiency.

**4.4** Data on the building stock of West Dunbartonshire has been analysed to inform the selection of LHEES Strategic Zones, which are large areas of focus for wide-scale delivery of heat decarbonisation solutions. Strategic Zones are useful to understand the baseline performance, the scale of potential and initial areas of focus, which can be used to inform the identification of Delivery Areas and follow-on engagement.

### **Heat Network Strategic Zones**

**4.5** The LHEES has developed a series of Heat Network Zones, within which a focus will be given to developing heat networks. In order to identify Heat Network Zones, “heat-dense” areas have been identified – that is, areas in which a heat network would be able to deliver a lot of heat with a small length of pipework. As an initial indication of heat network viability, a linear heat density threshold of 4 MWh/year/m has been used. Anchor loads are buildings in heat networks with high heat demand and that would be simple to connect to – for example public sector buildings like leisure centres and schools. Heat Network Zones with a higher number of anchor loads – buildings with high heat demand and simple connection potential, such as leisure centres and schools - have been prioritised. Through stakeholder engagement, fuel poverty has been identified as an ongoing focus for West Dunbartonshire. Therefore, indicators of fuel poverty and extreme fuel poverty have been used to identify Heat Network Zones within which there is a greater number of properties in fuel poverty. Five Heat Network Zones ranked highest for overall viability were selected for inclusion in the Strategy. A total of seven Heat Network Strategic Zones were identified using this analysis and further stakeholder consultation:

- Clydebank, including existing Queens Quay Heat Network;
- Golden Jubilee Hospital;
- Dalmuir;
- Littleholm;
- Kilbowie;
- Dumbarton; and
- Alexandria.

### Clydebank Combined Heat Network Strategic Zone

**4.6** The three most southerly networks of the five top ranking zones (Clydebank, Littleholm and Kilbowie) were combined into a larger Combined Heat Network Zone. This provides a larger area in the vicinity of the existing Queens Quay heat network in which new heat networks, or extensions of existing, may be delivered.

**4.7** In addition to the three Zones identified through the LHEES analysis and ranking exercise, the stakeholder consultation recommended the addition of two other Heat Network Zones within the Combined Heat Network Zone; the Golden Jubilee Hospital, and Dalmuir Flats. Radnor Park Kilbowie is also highlighted within the Combined Heat Network Zone as an additional potential area of expansion.



- 4.8** Expansion options for the existing Queens Quay heat network were assessed in an Outline Business Case (OBC) in 2022, which indicated initial economic viability of a potential for expansion of the network from Clydebank to the Golden Jubilee Hospital (currently being actively pursued) and Dalmuir Flats. Another future expansion to Radnor Park, Kilbowie was also identified in this study, although not an initial priority. Further expansion potential of the network may be possible at Exxon and Carless site and will be reviewed as the sites progress.
- 4.9** A heat network in this Combined Heat Network Zone could be supplied by the existing Queens Quay Energy Centre, which currently houses two Water Source Heat Pumps with a heating capacity of 2.65 MW each, and two backup boilers (7 MW each), supplying flow temperatures of approximately 75°C, and return temperatures of 45°C. A cross-boundary extension of heat networks eastwards into Glasgow is a further possibility following engagement with Glasgow City Council. The case is strengthened by the presence of West Dunbartonshire's large area of interest for heat networks north of Clydebank, on the local authority boundary.

#### Dumbarton Heat Network Strategic Zone

- 4.10** Analysis identifies Dumbarton as an area of strategic interest for Heat Network Zone development due to a high heat demand of 23.1GWh/year, with 10.2GWh/year from five anchor loads within the zone (St James Retail Park; Morrisons Superstore; Dumbarton Football Stadium; Unit 23 Skatepark; Castle Street (Local Development Plan (LDP) Site). Two Local Development Plan sites are located within the zone with a total of 305 residential units. Potential heat sources within the zone include: River Clyde and Leven with possibility for Water Source Heat Pumps, and potential heat resources at Energie Fitness; and Dumbarton Primary Substation. There are constraints at this site, namely A814 Glasgow Road isolating St James Retail Park from other four anchor loads and limiting any expansion North. This site would require initial preliminary feasibility studies to determine financial viability and identify low carbon heat opportunities in the area.

#### Alexandria Heat Network Strategic Zone

- 4.11** Due to a high proportion of publicly owned anchor loads, Alexandria has also been identified as an area of strategic interest for Heat Network Zone development. Four identified anchor loads (Vale of Leven District Hospital; The Vale Centre GP Practice; Vale Of Leven Swimming Pool; Lomond Galleries Shopping Centre) have a combined heat demand of 5.1 GWh/year; 8.8GWh/year total heat demand for the strategic zone. A Biomass Boiler is present within the Vale of Leven District Hospital with greenspace South in Christie Park potential for Ground Source Heat Pump boreholes. The zone is also within an area of "Hot Sedimentary Aquifers", which are potential good sources of geothermal energy. Balloch Primary Substation is also a potential heat resource. There are no major infrastructure constraints for heat network

deployment within the identified zone. As with Dumbarton Heat Network Strategic Zone, this site would require preliminary feasibility studies to determine financial viability and certainty of low carbon heat opportunities.

### **Heat Network Strategic Zones Summary**

**4.12** The LHEES has identified a total of 7 Heat Network Strategic Zones, with a combined heat demand of 162.6 GWh/year. Delivering these heat networks could therefore deliver 19% of the total heat demand for West Dunbartonshire, exceeding the 8% target for heat networks set nationally in the Heat Networks (Scotland) Act.

### **Off Gas and On Gas Grid Strategic Zones**

**4.13** The LHEES Off Gas Grid and On Gas Grid Considerations focus on how to decarbonise homes by installing heat pumps. Heat pumps operate most efficiently in buildings that are well insulated and therefore can operate heating systems at lower temperatures. For this reason, analysis of the impact of the Off Gas Grid and On Gas Grid Considerations include energy efficiency interventions that may need to be carried out to properties to be able to install heat pumps. The analysis separates buildings into four different categories depending on their “heat pump readiness” based on several different characteristics of the building fabric:

- Heritage – listed buildings and those in conservation areas can be more difficult to install heat pumps due to affordability of energy efficiency retrofit and visual amenity of the Heat Pump unit;
- Building fabric - properties with insulated walls, loft insulation and double glazing already installed are more readily suitable for heat pump retrofit; and
- Current heating fuel – properties already heated with low carbon systems are excluded from the analysis. Properties heated by solid fuels, LPG and oil indicate more immediate potential for heat pump retrofit.

**4.14** Each Off Gas and On Gas Data Zone undergoes a second weighted ranking process encompassing additional indicators relating to Fuel Poverty and the Scottish Index of Multiple Deprivation (SIMD) which impact West Dunbartonshire’s roll-out of retrofitting within the local authority. This analysis indicates five top ranking Off Gas Strategic Zones where heat pump installation could be considered:

- Singer and Clydebank South;
- Drumry;
- Leven;
- Drumry; and
- Clydebank East.

A further five On Gas Strategic Zones are also indicated as potentially suitable areas to focus heat pump installation:

- Lomond;
- Alexandria;
- Dumbarton;
- Bonhill; and
- Dalreoch.

### **Poor Building Energy Efficiency and Poor Building Energy Efficiency as a Driver of Fuel Poverty Strategic Zones**

**4.15** These LHEES considerations aim to tackle poor building energy efficiency in West Dunbartonshire by identifying Strategic Zones to focus rolling out retrofit programmes that bring homes up to a higher standard. For properties in fuel poverty, additional consideration is given to how poor energy efficiency may be impacting the ability of occupants to afford heating their homes. Some simple indicators of poor building energy efficiency and fuel poverty have been used to identify properties with poor energy efficiency and poor energy efficiency as a driver of fuel poverty in West Dunbartonshire:

- Uninsulated walls;
- Loft insulation <100mm;
- Fuel poverty: estimated fuel bill is >10% of income after housing costs;
- Extreme fuel poverty estimated fuel bill is >20% of income after housing costs; and
- SIMD is also used to identify areas with other causes of deprivation.

**4.16** Poor building energy efficiency is a recognised factor that can contribute to fuel poverty, thus the removal of poor energy efficiency measures will impact and contribute to Scotland's statutory target of no households being in fuel poverty as far as reasonably possible by 2040. The top ranking Poor Building Energy Efficiency Strategic Zones where energy efficiency retrofit programmes should be focused are:

- Singer and Clydebank South;
- Drumry;
- Alexandria;
- Clydebank; and
- Balloch;

### **Mixed tenure, mixed use and buildings in Conservation Areas Strategic Zones**

**4.17** This LHEES consideration aims to highlight areas in which heat decarbonisation may be difficult to deliver, due to ownership and tenure of the properties, or the potential heritage impacts of installing heat pumps and retrofitting buildings to higher levels of energy efficiency. This analysis covers four main focus areas:

- Mixed tenure buildings;

- Mixed use buildings;
- Listed buildings; and
- Conservation areas.

**4.18** To enable the identification of the top five Data Zones for integration and further interrogation within an LHEES Delivery Plan, all 121 Data Zones within West Dunbartonshire have been ranked based upon aggregated counts of properties within each indicators, with a weighting per indicator rank also applied to generate an overall ranking. The Strategic Zones for Mixed Tenure, Mixed Use and Conservation Areas are:

- Dumbarton;
- Dalreoch;
- Kilpatrick;
- Dumbarton; and
- Dumbarton.

### **Local Heat and Energy Efficiency Delivery Plan**

**4.19** Local Heat and Energy Efficiency Delivery Plan (LHEEDP) for West Dunbartonshire will be developed over the coming months. This Delivery Plan will cover the first five-year period of heat decarbonisation and energy efficiency interventions, based on the priorities set out in the Strategy. This will focus on projects at a more granular scale and Delivery Areas, which includes smaller clusters of buildings and individual streets. Stakeholder engagement is a key theme through LHEES, and as part of the Delivery Plan a Monitoring and Evaluation Plan will be developed. This will set out how the Council will approach engagement with stakeholder groups and may also include more targeted awareness and engagement campaigns in the prioritised Strategic Zones and Delivery Areas. The Council will ensure Delivery Areas and actions set out in the LHEEDP will align with existing heat decarbonisation and energy efficiency programmes and plans in the local authority, and can draw on existing funding programmes and schemes. LHEEDP will be subject to a further report to Committee prior to publication.

### **Challenges**

**4.20** The delivery of heat network zones and energy efficiency retrofit across the entire local authority area is a vast undertaking and there are many challenges that West Dunbartonshire Council and our businesses and communities will have to address:

- Funding gap – financing large scale infrastructure and energy efficiency interventions is expected to have colossal costs. Funding from Scottish Government and other public funding sources needs to be maximised, private sector funding needs to be leveraged in, and support is required for local

businesses and communities to ensure they access available funding streams;

- Viability – heat networks require electricity for operation, irrespective of the renewable heat source, and many potential developments will only be viable if electricity can be supplied directly from a renewable source;
- Retrofit – progress is being made in the retrofit of energy efficiency measures, however a more holistic ‘whole home’ approach is needed to maximise available funding and ensure a no regrets delivery;
- Skills gap – both within the Council and across the market there is a significant gap in skills and knowledge. We need to consider training for staff internally to ensure concerns about renewable technologies and procedures for retrofit heat and energy efficiency measures are addressed. There is a significant lack of skilled workforce within the green jobs sector and this requires our influence to boost education and training in green industries within the local authority area;
- Behaviour change – heat decarbonisation and energy efficiency retrofit can change the way that homes and buildings operate to ensure efficiency. Public acceptance of new technologies and behaviour change towards heating controls and operating systems will need a clear focus; and
- Just Transition – when making evidence based decisions on the delivery of LHEES, there needs to be an assurance that we do not adversely affect our communities and businesses; the cost to achieve net zero should not burden those least able to pay.

## **5. People Implications**

**5.1** There are no additional people implications related to this Strategy.

## **6. Financial and Procurement Implications**

**6.1** Scottish Government funding of £75,000 per year has been allocated to the development of LHEES and has enabled the appointment of an LHEES Officer and Consultancy for data analysis. There is scope to use this funding for further engagement and feasibility studies to inform the development of the Local Heat and Energy Efficiency Delivery Plan. More detailed costings will be provided for specific projects in the LHEEDP, alongside plans to access Scottish Government, private sector and external funding mechanisms.

**6.2** There are no procurement issues in relation to the Strategy within this paper; however each potential project identified during the development of the Delivery Plan will require an appropriate procurement process.

## **7. Risk Analysis**

**7.1** The consultation process with partners and key stakeholders ensured that the content of the strategy is appropriate, and through development of the Delivery Plan risk will be assessed and managed.

## **8. Environmental Sustainability**

- 8.1** The Environmental Assessment (Scotland) Act 2005 sets a statutory requirement for Scottish public bodies to carry out a Strategic Environmental Assessment (SEA) of the expected environmental impacts of strategies expected to have a significant environmental impact. At this stage, the Strategy is in Draft and following consultation, a screening assessment will be completed to determine the need for an SEA.

## **9 Equalities Impact Assessment (EIA)**

- 9.1** The Strategy has been impact assessed and is relevant to the general equality duty. The Strategy will assist with reducing inequality and has potential to produce positive impacts. A range of actions in support of this are noted in the EIA which is available as Appendix 2 to this report.

## **10. Consultation**

- 10.1** An internal stakeholder consultation process across Council services was undertaken to obtain feedback the baselining data and proposed Strategic Zones. Finalised Delivery Areas were interrogated at an external stakeholder consultation with key contributors including: RSLs; NHS; Police Scotland; Scottish Water; and low carbon heating specialists. The draft Strategy was also presented to Chief Officers for initial comment.
- 10.2** Following the approval of the draft Strategy, a full public consultation will commence over a six week period. The Consultation plan will be developed to ensure meaningful and targeted engagement with groups and organisations of interest through surveys and social media. Comments from the consultation will be included in revisions to the final Strategy.

## **11. Strategic Assessment**

- 11.1** The Local Heat and Energy Efficiency Strategy 2024-2029 provides a clear strategic area-based, local authority wide approach to heat and energy efficiency planning and delivery. The Strategy will help determine how and where we focus our resources and to achieve our ambitious net zero and fuel poverty aims. It responds to various local, regional and national policies and strategies. These include:
- West Dunbartonshire - Council Strategic Plan;
  - West Dunbartonshire - Climate Change Strategy;
  - Scottish Government - Heat in Buildings Strategy (2021);
  - Scottish Government – Tackling Fuel Poverty in Scotland: A Strategic Approach (2021); and
  - Scottish Government – Heat Networks (Scotland) Act 2021.

**Alan Douglas**  
**Chief Officer, Regulatory & Regeneration**  
**Date: 14 February 2024**

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**Appendices:** Appendix 1 - Glossary  
Appendix 2 - EIA- Local Heat and Energy Efficiency  
Strategy (LHEES) 2024-2029  
Appendix 3 - Local Heat and Energy Efficiency Strategy  
(LHEES) 2024-2029 Draft

**Wards Affected:** All Wards

**Glossary**

EPC	Energy Performance Certificate
DZ	Data Zone
GSHP	Ground Source Heat Pump
HN	Heat Network
HNZ	Heat Network Zone
IZ	Intermediate Zone
LDP	Local Development Plan
LHEES	Local Heat and Energy Efficiency Strategy
LHEEDP	Local Heat and Energy Efficiency Deli
LPG	Liquified Petroleum Gas
MW	Mega Watt
MWh	Mega Watt Hour
OBC	Outline Business Case
SIMD	Scottish Index of Multiple Deprivation
WSHP	Water Source Heat Pump



<b>AssessmentNo</b>	875	<b>Owner</b>	amanda.kean
<b>Resource</b>	Regeneration, Environment and Growth		<b>Service/Establishment</b> Regeneration
	First Name	Surname	<b>Job title</b>
<b>Head Officer</b>	Amanda	Kean	Local Heat and Energy Efficiency Strategy (LHEES) Officer
	(include job titles/organisation)		
<b>Members</b>	Rachel Moir, Climate Change and Energy Coordinator; Ricardo Rea, P and S Officer		
	<i>(Please note: the word 'policy' is used as shorthand for strategy policy function or financial decision)</i>		
<b>Policy Title</b>	Local Heat and Energy Efficiency Strategy (LHEES) 2024-2029		
	<b>The aim, objective, purpose and intended out come of policy</b>		
	Local Heat and Energy Efficiency Strategies (LHEES) are at the heart of a place based, locally led and tailored approach to the heat transition. The LHEES Strategy for West Dunbartonshire will underpin an area-based approach to heat and energy efficiency planning and delivery. An LHEES Strategy sets out the strategic framework for decarbonising heat and improving energy efficiency within buildings in West Dunbartonshire. The LHEES and LHEEDP will affect buildings in the local authority – both domestic and non-domestic, for example by targeting areas in which energy efficiency projects and heat pump rollouts may be carried out. This Strategy is the first for West Dunbartonshire, and will be required to then be updated at intervals of no more than five years.		
	<b>Service/Partners/Stakeholders/service users involved in the development and/or implementation of policy.</b>		
	Housing, Planning, Asset Management, Roads, Communities		
<b>Does the proposals involve the procurement of any goods or services?</b>			<b>Yes</b>
<b>If yes please confirm that you have contacted our procurement services to discuss your requirements.</b>			<b>No</b>
<b>SCREENING</b>			
<i>You must indicate if there is any relevance to the four areas</i>			
<b>Duty to eliminate discrimination (E), advance equal opportunities (A) or foster good relations (F)</b>			<b>Yes</b>
<b>Relevance to Human Rights (HR)</b>			<b>Yes</b>
<b>Relevance to Health Impacts (H)</b>			<b>Yes</b>
<b>Relevance to Social Economic Impacts (SE)</b>			<b>Yes</b>
<b>Who will be affected by this policy?</b>			
Members of the public, community planning partners, businesses in WDC, Council staff, community organizations			
<b>Who will be/has been involved in the consultation process?</b>			
An internal stakeholder consultation process across Council services was undertaken to obtain feedback the baselining data and proposed Strategic Zones. Finalised Delivery Areas were interrogated at an external stakeholder consultation with key contributors			

including: RSLs; NHS; Police Scotland; Scottish Water; and low carbon heating specialists. The draft Strategy was also presented to Chief Officers for initial comment. Following the approval of the draft Strategy, a full public consultation will commence over a six week period. The Consultation plan will be developed to ensure meaningful and targeted engagement with groups and organisations of interest through surveys and social media. Comments from the consultation will be included in revisions to the final Strategy.

**Please outline any particular need/barriers which equality groups may have in relation to this policy list evidence you are using to support this and whether there is any negative impact on particular groups.**

	<b>Needs</b>	<b>Evidence</b>	<b>Impact</b>
<b>Age</b>	Young people should be engaged in the Strategy. The needs of older people and their carers should be addressed.	In the UK in 21/22, Working age people are slight more likely (1 in 5) to be in poverty compared to pensioners (1 in 6).	A key driver for LHEES is our statutory target for fuel poverty, that in 2040, as far as reasonably possible, no household in Scotland is in fuel poverty. LHEES will have a particular focus on understanding where poor energy efficiency is a driver of fuel poverty, facilitating the targeting of support to help alleviate fuel poverty.
<b>Cross Cutting</b>	We should examine Intersectional impacts.	For examples, poverty and fuel poverty higher for women, BME, disabled people multiples negative impacts for people who are members of more than one of these groups.	Potentially beneficial if fuel poverty is reduced.
<b>Disability</b>	Disabled people are a priority group of tackling child poverty	Disabled people are more likely to be income deprived/be in relative poverty. This is partly driven by higher costs correlated with being disabled	A key driver for LHEES is our statutory target for fuel poverty, that in 2040, as far as reasonably possible, no household in Scotland is in fuel poverty. LHEES will have a particular focus on understanding where poor energy

			efficiency is a driver of fuel poverty, facilitating the targeting of support to help alleviate fuel poverty.
<b>Social &amp; Economic Impact</b>	We have a globally competitive, entrepreneurial, inclusive and sustainable economy. We live in communities that are inclusive, empowered, resilient and safe	Businesses are struggling to meet rising fuel costs and still recovering from impact of the pandemic. More than 1 in 5 people in the UK (22%) were in poverty in 2021/22 – 14.4 million people. This included: 8.1 million (or around 2 in 10) working-age adults 4.2 million (or nearly 3 in 10) children 2.1 million (or around 1 in 6) pensioners. Poverty rates have returned to around their pre-pandemic levels, as middle-income household incomes rose at the same time as a range of temporary coronavirus-related support was withdrawn.	The LHEES Strategies and Delivery Plans will help target public and private funding and finance into local heat decarbonisation and energy efficiency projects. LHEES will provide a platform for local community engagement in the heat transition, creating opportunities for communities to help shape the net zero heat transition in their locality.
<b>Sex</b>	Women who comprise 90% of single parents for example, are a propriety in terms of tackling child poverty	Women are more likely to be income deprived/be in relative poverty.	A key driver for LHEES is our statutory target for fuel poverty, that in 2040, as far as reasonably possible, no household in Scotland is in fuel poverty. LHEES will have a particular focus on understanding where poor energy efficiency is a driver of fuel poverty, facilitating the targeting of support

			to help alleviate fuel poverty.
<b>Gender Reassign</b>	All homes and buildings need to be safe and accessible for all people	No evidence there would be any impact	Unlikely to be any differential impact
<b>Health</b>	Physical activity and social interactions are required to improve health and wellbeing for all, and specifically for young and older people.	LHEES will have a particular focus on understanding where poor energy efficiency is a driver of fuel poverty within a local authority area. By supporting planning for net zero in the context of alleviation of fuel poverty and facilitating planning for investment in more energy efficient homes, LHEES will contribute to warmer, healthier environments for people to live in.	The strategy will help to deliver energy efficiency improvements and heat decarbonisation across all building sectors
<b>Human Rights</b>	In line with the UN Convention on Rights of the Child children and young people should be able to participate in the Strategy Process.	The human rights act gives people the right to freedom of expression, freedom from discrimination, and freedom to enjoy property. Article 8 also protects participation. Children and young people tend to be an under represented group in consultation and engagement.	In line with the statutory duty to engage with the public at large and certain under represented groups, including children and young people, we will enable people to express their views on LHEES.
<b>Marriage &amp; Civil Partnership</b>	All homes and buildings need to be safe and accessible for all people	No evidence there would be any impact	Unlikely to be any differential impact
<b>Pregnancy &amp; Maternity</b>	Women tend to be impacted financially by pregnancy and maternity, and are often more involved in care for children	Women more likely to be income deprived/be in relative poverty.	A key driver for LHEES is our statutory target for fuel poverty, that in 2040, as far as reasonably possible,

			no household in Scotland is in fuel poverty. LHEES will have a particular focus on understanding where poor energy efficiency is a driver of fuel poverty, facilitating the targeting of support to help alleviate fuel poverty.
<b>Race</b>	BME Groups are a propriety in terms of tackling child poverty	People from most Black Minority Ethnic groups, and Gypsy/Travellers are more likely to be income deprived/be in relative poverty	A key driver for LHEES is our statutory target for fuel poverty, that in 2040, as far as reasonably possible, no household in Scotland is in fuel poverty. LHEES will have a particular focus on understanding where poor energy efficiency is a driver of fuel poverty, facilitating the targeting of support to help alleviate fuel poverty.
<b>Religion and Belief</b>	All homes and buildings in WDC need to be safe and accessible for all people	No evidence there would be any impact	Unlikely to be any differential impact
<b>Sexual Orientation</b>	All homes and buildings in WDC need to be safe and accessible for all people	No evidence there would be any impact	Unlikely to be any differential impact

**Actions**

**Policy has a negative impact on an equality group, but is still to be implemented, please provide justification for this.**

**Will the impact of the policy be monitored and reported on an ongoing bases?**

The outcomes and impacts of LHEES will be reported to and monitored by the Climate Change Action Group on a monthly basis. The Strategy will be reviewed and updated at least every five years.

**Q7 What is your recommendation for this policy?**

Introduce

**Please provide a meaningful summary of how you have reached the recommendation**

EIA 875 has identified a range of positive impacts for equality groups. There are likely to be significant positive Health and Socio-Economic Impacts. We will consult with a wide range of community organisations including the West Dunbartonshire Equality forum on the draft LHEES and update EIA 875 accordingly, based on the outputs of the consultation.



# Local Heat and Energy Efficiency Strategy

Strategy

## Contents

Overview of LHEES .....	4
The role of Local Heat and Energy Efficiency Strategies.....	5
Policy and Strategy.....	6
Engagement and consultation .....	10
Stakeholder identification.....	10
Primary stakeholders .....	10
Secondary stakeholders.....	10
LHEES Engagement .....	11
Stage 3 – 4: Strategic Zoning and Pathways, Generation of Initial Delivery Areas.....	11
Stage 6: Finalisation of Delivery Areas.....	12
Project governance .....	14
Consultation.....	14
Future engagement .....	15
Local authority progress .....	<b>Error! Bookmark not defined.</b>
Considerations, Targets and Indicators .....	16
Heat networks.....	17
Targets .....	17
Indicators .....	17
Detailed summary.....	17
Off gas grid and On gas grid.....	18
Targets .....	18
Indicators .....	18
Detailed summary.....	<b>Error! Bookmark not defined.</b>
Poor building energy efficiency and Poor building energy efficiency as a driver of fuel poverty .....	19
Targets .....	19
Indicators .....	19
Detailed summary.....	<b>Error! Bookmark not defined.</b>
Mixed tenure, mixed use and buildings in Conservation Areas .....	19
Targets .....	19
Indicators .....	20
Detailed summary.....	<b>Error! Bookmark not defined.</b>
Baselining of building performance .....	21



Domestic .....	21
Property characteristics .....	21
Energy efficiency and heating .....	23
Heritage.....	28
Non-domestic.....	28
Generation of Strategic Zones and Pathways.....	<b>Error! Bookmark not defined.</b>
Strategic Zone Ranking .....	<b>Error! Bookmark not defined.</b>
Heat networks.....	<b>Error! Bookmark not defined.</b>
Screening methodology .....	<b>Error! Bookmark not defined.</b>
Ranking.....	<b>Error! Bookmark not defined.</b>
Off gas grid .....	<b>Error! Bookmark not defined.</b>
Screening methodology .....	<b>Error! Bookmark not defined.</b>
Ranking.....	<b>Error! Bookmark not defined.</b>
Finalised Strategic Zones.....	<b>Error! Bookmark not defined.</b>
On gas grid .....	<b>Error! Bookmark not defined.</b>
Screening methodology .....	<b>Error! Bookmark not defined.</b>
Ranking.....	<b>Error! Bookmark not defined.</b>
Finalised Strategic Zones.....	<b>Error! Bookmark not defined.</b>
Poor building energy efficiency and poor building energy efficiency as a driver of fuel poverty ....	<b>Error! Bookmark not defined.</b>
Screening methodology .....	<b>Error! Bookmark not defined.</b>
Ranking.....	<b>Error! Bookmark not defined.</b>
Finalised Strategic Zones.....	<b>Error! Bookmark not defined.</b>
Mixed tenure and mixed use .....	<b>Error! Bookmark not defined.</b>
Screening methodology .....	<b>Error! Bookmark not defined.</b>
Ranking.....	<b>Error! Bookmark not defined.</b>
Summary of Strategy and next steps .....	<b>Error! Bookmark not defined.</b>
Heat networks.....	<b>Error! Bookmark not defined.</b>
Heat pumps and energy efficiency .....	<b>Error! Bookmark not defined.</b>
LHEES Delivery Plan.....	<b>Error! Bookmark not defined.</b>

## Glossary

ASHP	Air Source Heat Pump
EPC	Energy Performance Certificate
DZ	Data Zone
GSHP	Ground Source Heat Pump
HN	Heat Network
HNZ	Heat Network Zone
IZ	Intermediate Zone
LHEES	Local Heat and Energy Efficiency Strategy
LPG	Liquefied Petroleum Gas
NAEI	National Atmospheric Emissions Inventory
OBC	Outline Business Case
PEAT	Portfolio Energy Analysis Tool
QQDHN	Queens Quay District Heat Network
SIMD	Scottish Index of Multiple Deprivation
SSEN	Scottish and Southern Electricity Networks
SPEN	Scottish Power Energy Networks
SGN	Scottish Gas Networks
UPRN	Unique Property Reference Number
WSHP	Water Source Heat Pump

# Overview of LHEES

## The role of Local Heat and Energy Efficiency Strategies

Local Heat and Energy Efficiency Strategies (LHEES) are at the heart of a place based, locally led and tailored approach to the heat transition. The LHEES Strategy for West Dunbartonshire will underpin an area-based approach to heat and energy efficiency planning and delivery.

The LHEES Strategy sets out the strategic framework for decarbonising heat and improving energy efficiency within buildings in West Dunbartonshire. This Strategy is the first for West Dunbartonshire, and will be required to then be updated at intervals of no more than five years.

The strategic plan has been developed by following Scottish Government’s LHEES methodology and is therefore framed around the following Considerations:

- Heat Networks
- Off Gas Buildings
- On Gas Buildings
- Poor Building Energy Efficiency / Poor Building Energy Efficiency as a Driver for Fuel Poverty
- Mixed Tenure, Mixed Use and Historic Buildings

The full process of developing LHEES is outlined below. West Dunbartonshire has worked through the full process, from Policy and Strategy Review through to Finalisation of Delivery Areas. This document, the Strategy, is informed by the analysis and stakeholder engagement through the whole process, but specifically sets out the Strategic Zoning and Pathways. This sets the direction of travel for West Dunbartonshire, and sets out large-scale Strategic Zones in which focus will be given to developing and rolling out heat decarbonisation solutions. More detailed work, including the Building Level Pathway Assessment and Finalisation of Delivery Areas, will be published as part of the LHEES Delivery Plan.

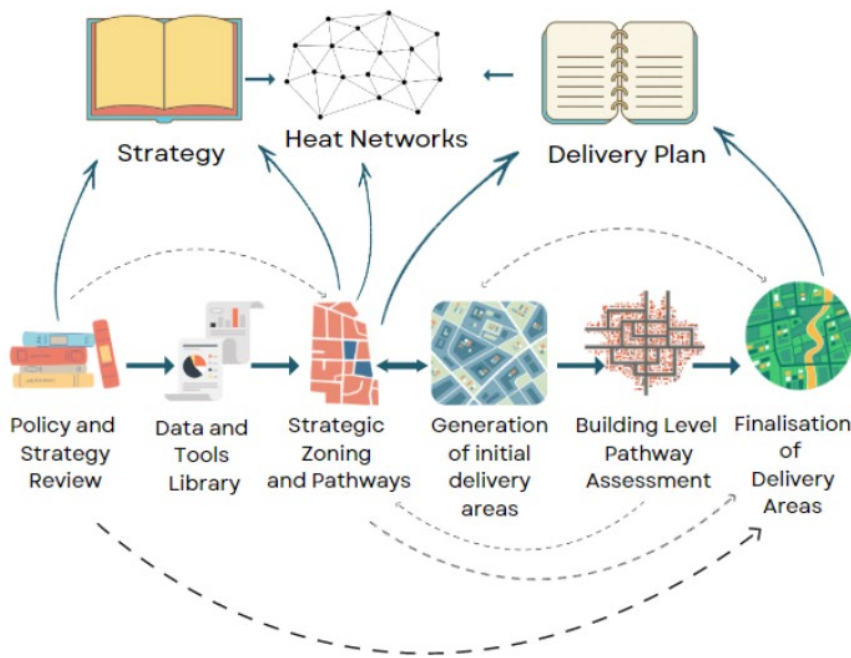


Figure 0—1 LHEES methodology (Scottish Government)

The aim of the LHEES Strategy document is to:

- set out how the building stock needs to change to meet national and local objectives, including achieving zero greenhouse gas emissions across all areas, and the removal of poor energy efficiency as a driver of fuel poverty;
- identify strategic heat decarbonisation zones, and set out the principal measures for reducing buildings emissions within each zone; and
- prioritise areas for delivery, against national and local priorities.

## Policy and Strategy

Completion of an LHEES Strategy will support the Scottish Government to understand further the national landscape for the delivery of heat decarbonisation and ensure local authorities are delivering changes to help achieve Scotland's statutory targets as set out in the Heat in Buildings Strategy.

The Heat in Buildings Strategy (2021) sets the Scottish Government's vision for the future of heat in buildings, with targets for 2030 including:

- Emissions from homes and non-domestic buildings to fall by 68% by 2030 (versus 2020).
- At least 22% of heat in buildings is to be directly supplied from renewable sources by 2030.
- Where technically and legally feasible, and cost-effective, a large majority of buildings should achieve a good level of energy efficiency.
- Over 50,000 non-domestic buildings are converted to zero emissions heat.

Although predominantly dominated by the Heat in Buildings Strategy, an LHEES Strategy is also driven by Scotland's statutory targets for greenhouse gas emissions reduction and fuel poverty whose targets are:

- Net zero emissions by 2045 and 75% reduction by 2030.
- In 2040, as far as reasonably possible, no household in Scotland is in fuel poverty.

West Dunbartonshire Council's LHEES is further driven by local emissions and fuel poverty ambitions set out in Climate Change Strategy and Climate Change Action Plan. The Council aims to:

- Achieve 'net-zero' by 2045, with interim carbon reduction targets of 61% by 2030-31 and 87% by 2040-41;
- Continue to take action to reduce energy consumption and improve energy and water efficiency in our buildings and across our operations;
- Continue to reduce energy demand and decarbonise heat supply in the Clydebank area and Queens Quay heat network; and
- Further reduce energy consumption and improve energy efficiency in our social housing and fuel poor households, ensuring fuel poverty and the decarbonisation of housing are key to achieving a net zero carbon future.

Table 0—1 Review of National and Local Strategies and Policies relating to LHEES

National		
Policy/Strategy/Plan	Description	Targets/Actions
Climate Change (Emissions Reduction Targets) (Scotland) Act 2019	<p>Targets to reduce Scotland's emissions of all greenhouse gas emissions to net-zero.</p> <p>LHEES will set out area based plan to deliver decarbonation of heating across all sectors.</p>	75% reduction in emissions by 2030 and Net-zero by 2045
Heat in Buildings Strategy	<p>Building on the policies and actions set out in the 2020 Climate Change Plan, this Strategy sets out a pathway to zero emissions buildings by 2045 and details a series of near-term actions, as well as a range of further, longer-term commitments to accelerate and further scale the transformation of the nation's building stock.</p>	<p>By 2030 over 1 million homes and 50,000 non-domestic buildings to convert to using zero or low emissions heating systems.</p> <p>LHEES will identify the pathways to converting these buildings to zero or low emissions heating.</p>
Energy Efficient Scotland	<p>Sets out two main objectives: - Remove poor energy efficiency as a driver for fuel poverty; and - Reduce greenhouse gas emissions through more energy efficient buildings and the decarbonisation of heat supply.</p> <p>LHEES will identify pathways to improving energy efficiency in homes across all tenures.</p>	<p>By 2040 all Scottish homes achieve an EPC C, where technically and financially feasible:</p> <ul style="list-style-type: none"> <li>- 15% domestic heat demand reduction by 2032;</li> <li>- 20% non-domestic heat demand reduction by 2032</li> <li>- 35% domestic heat from low carbon sources by 2032</li> <li>• 70% non-domestic heat from low carbon sources by 2032</li> </ul>
Heat Networks (Scotland) Act 2021	<p>Aims to accelerate the deployment of heat networks in Scotland through the introduction of a regulatory system aimed at boosting consumer confidence in the sector and providing greater certainty for investors.</p> <p>LHEES will identify potential Heat Network Zones to enable the setup and licensing.</p>	<p>Rules and regulations on heat networks, including:</p> <ul style="list-style-type: none"> <li>- making applications;</li> <li>- identifying exemptions;</li> <li>- granting licenses; and</li> <li>- setting up heat network zones.</li> </ul>

National Planning Framework 4	The National Planning Framework (NPF) sets the context for development planning in Scotland and provides a framework for the spatial development of Scotland as a whole.	NPF4 requires Local Development Plans (LDPs) to consider LHEES delivery areas. The spatial strategy of the LDP should also consider areas of heat network potential and any designated Heat Network Zones. NPF4 Policy 19 - Heat and Cooling, encourages LDPs to promote and facilitate development that supports decarbonised solutions to heat and cooling demand and ensure adaptation to more extreme temperatures.
Tackling Child Poverty Delivery Plan 2022 - 2026	Sets out how Scotland will meet the interim targets set out in Keep the Promise, and makes commitments which will affect delivery plans for retrofitting energy efficiency measures and heat decarbonisation.	Heat decarbonisation presents additional challenges for low income households. Actions should only be taken where they will have no detrimental impact on fuel poverty rates. Progress to net zero emissions should not disproportionately impact on those least able to pay.

Local		
Climate Change Strategy	Outlines plans to reduce environmental impact over the next five years and beyond. It sets a route map integrating climate change mitigation, adaptation and sustainability measures into our operations as well as empowering our communities to take their own action to make change.	Achieve 'net-zero' by 2045, with interim carbon reduction targets of 61% by 2030-31 and 87% by 2040-41
Local Development Plan	Sets out the strategy and policies for the use of land and buildings within a planning authority area.  It seeks to identify the most appropriate locations for new development while at the same time protecting the places people	It is a requirement that LDPs are prepared to be consistent with National Planning Framework 4 (NPF4) which was adopted in February 2023. See NPF4 for alignment with LHEES.

	<p>value or which are environmentally sensitive.</p> <p>It is the basis for assessing and determining applications for planning permission.</p>	<p>The development plan consists of the NPF4 and the adopted West Dunbartonshire Local Plan (2010).</p>
<p>Strategic Plan 2022-2027</p>	<p>A road map for the Council over the next five years, setting out our vision for the area. The strategic priorities explain how the Council will work to improve the lives of residents. As well as clearly defining a set of Council priorities which directly support and empower residents, the Council has set out organisational priorities to inform how services are run, with an aim to reduce inequality.</p>	<p>Four strategic outcomes:</p> <p>Our communities – resilient and thriving;</p> <p>Our environment – a greener future;</p> <p>Our economy – strong and flourishing; and</p> <p>Our Council – inclusive and adaptive.</p>
<p>Local Housing Strategy 2022-2027</p>	<p>Sets out how West Dunbartonshire Council and its partners plan to address the housing and housing related opportunities and challenges over the next five year period.</p> <p>This new plan aims to build on the significant progress made on the issues identified in the previous LHS 2017-2022 and to address newly arising housing matters particularly in response to the Covid crisis.</p>	<p>It sets out the local authority’s strategic approach to dealing with key housing related issues such as:</p> <ul style="list-style-type: none"> <li>- Delivering high quality housing and related services across all tenures;</li> <li>- Outlining its contribution to the effective integration of health and social care; and</li> <li>- Showing how the LHS is supporting the Scottish Government Targets, whilst reflecting the needs and priorities of the area.</li> </ul>

# Engagement and consultation

Developing West Dunbartonshire’s LHEES has necessitated stakeholder engagement. This chapter details the engagement undertaken to date in the LHEES process, and highlights the future consultation, engagement and governance structures required through the five-year timescale of West Dunbartonshire’s LHEES.

## Stakeholder identification

Stakeholder mapping was carried out at the commencement of LHEES Stage 3 Strategic Zoning and Pathways. This resulted in lists of primary and secondary stakeholders to be developed, with whom to engage through the LHEES.

### Primary stakeholders

Primary stakeholders are those that work within West Dunbartonshire Council, with an interest in LHEES. Key Council Service Areas are:

- Planning
- Assets
- Finance
- Roads and Transport
- Community
- Housing strategy
- Housing development
- Housing building services
- Economic development
- Energy
- West Dunbartonshire Leisure

The Engagement plan for the LHEES included a workshop at the end of LHEES Stage 3-4, at which the primary stakeholders in the Council had an opportunity to input into the strategic direction of the project and the approach to shortlisting Strategic Zones.

### Secondary stakeholders

The secondary stakeholders identified at the commencement of LHEES Stage 3 are outlined in the table below.

*Table 0—1 LHEES secondary stakeholders*

West Dunbartonshire Energy	
Energy networks	Scottish Water
	SSEN, SPEN
	SGN
	National Grid
	Heat network operators
Housing	Housing Associations
	Registered social landlords
	Housebuilders
Local and regional government	Neighbouring Local Authorities



	Glasgow City Region (including Clyde Mission)
Key heat network connections	NHS Greater Glasgow and Clyde
	West College Scotland
	Police Scotland
	Marine Technology Park
Key local employers	Agrekko
	Vale of Leven Industrial Park
	Chivas Brothers

Secondary stakeholders were invited to an engagement event at LHEES Stage 6 Finalisation of Delivery Areas. This enabled the Council to introduce the LHEES process, and for the stakeholders to provide more detailed local feedback about the Delivery Areas. Building and maintaining these relationships with external stakeholders is key to LHEES, as the Council will need to work together with external partners to deliver heat decarbonisation in West Dunbartonshire.

**LHEES Engagement**

The LHEES process included two stakeholder engagement sessions, at which local stakeholders were able to provide input into the emerging Strategy.

**Stage 3 – 4: Strategic Zoning and Pathways, Generation of Initial Delivery Areas**

An internal stakeholder engagement session was run between Stage 3 – 4 of the development of the LHEES, on 11<sup>th</sup> October 2023. The aim of this workshop was to introduce the LHEES process to primary stakeholders – those within the Council – and to ensure that feedback from various Council Service Areas informed the shortlisting of Strategic Zones and Delivery Areas.

For each LHEES Consideration, the attendees were introduced to the underlying data and options for selecting Strategic Zones and Delivery Areas.

Examples of the feedback are captured in Table 0—2 below.

*Table 0—2 Stage 3-4 Stakeholder Engagement: Key themes*

Consideration Area	Stakeholder Feedback	
Heat networks	Flood risk needs to be considered – especially around Dumbarton town centre.	
	Potential for housing development around Sandpoint Marina.	
	General support for heat networks development in Dumbarton due to mix of typologies and alignment to fuel poverty alleviation targets.	
Off- and on-gas grid decarbonisation	Retrofit measures	Kilbowie Court is owned by the Council and is an electrically heated building, which has already had retrofit of building fabric and smart controls installed.
		Some types of retrofit measures have not been undertaken by the Council – including double glazing and cavity wall insulation. Historically, have had problems with water ingress causing construction damage in buildings with retrofit cavity insulation due to driving rain in the local climate.

		Preferred retrofit approach to date has been external wall insulation with loft insulation.
	Low carbon heating systems	Clydebank Housing Association have had discussions around a communal network and have applied for Scottish Government grant funding to extend the network to the community centre.
	Targets and priorities	Targeting areas of high fuel poverty has always been, and will continue to be, the highest priority.
		To date, the large rural intermediate zones have not been the first choice for funding due to low visibility, but decarbonisation does need to happen across the whole local authority area.
		Current targets have been to meet Scottish Government targets for EESH and other funding streams – typically 450 houses per year, but have done up to 700 homes in a single year.
	Risks	Availability of investment budget needs to keep up with inflation of construction costs.
Energy efficiency and fuel poverty	Strategic Zones	Can have very deprived areas directly adjacent to more affluent areas – better able to pick these out at the Delivery Area level
		Selection of Strategic Zones needs to consider fuel poverty.
	Data issues	Homes with poor EPCs already demolished in Dockfair, Wheatley, Mountblow – but still showing in Scotland Heat Map data. Every council house in Castlehill and Dalreoch has already been overclad.

**Stage 6: Finalisation of Delivery Areas**

On the 21<sup>st</sup> November 2023, a stakeholder engagement session was run for the secondary stakeholders. The aim of this workshop was to socialise the shortlisted Delivery Areas, gain a better understanding of external stakeholders’ attitudes towards heat decarbonisation in West Dunbartonshire.

*Heat networks*

Heat networks was a strong focus of the session, driven by the Council’s eagerness to develop heat network zones. Attendees included Council representatives as well as heat network operators and potential connections.

*Barriers and strengths*

The workshop encouraged participants to identify the barriers to achieving proliferation of heat networks in West Dunbartonshire. Table 0—3 details the key themes that were raised in this session.

Table 0—3 Heat networks: barriers and strengths

	Barriers	Strengths
Technical	Fear of lock-in to one solution in a heat network River and railway crossings Longevity of the solution Regulatory requirements for resilience at NHS sites Grid capacity	Mature technologies and examples of operational projects  Low-grade heat from the river  Local solar generation
Commercial	Numbers of counterparties with whom to sign connection deals. Cost of electricity and heat pumps.	Existing partnership models and lessons learnt Champions of heat networks are now present in West Dunbartonshire – both Council and external
Other	Attractiveness of heat network zones outside of Queens Quay	Planning heat networks to reduce both carbon emissions and fuel poverty

### Heat Network Zones

The five shortlisted Heat Network Zones were sense-checked with local knowledge, to highlight any data issues or irregularities. For example significant heat sources, missing demands, or over-representations.

Table 0—4 Heat Network Zones: key outputs

Heat Network Zone	Potential Issues
Clydebank	Wastewater treatment plant at Dalmuir
	Potential for PV farms to generate electricity for heat pumps
	Appetite to extend the network
Dumbarton	Wastewater treatment plant at Ardoch
	Castlehill wastewater pumping station
Alexandria	Scottish Water sewer between Alexandria and River Leven
	Scale of development could catalyse a new heat network

### Action planning

Participants were encouraged to develop an action plan to deliver heat networks in West Dunbartonshire.

- Stakeholder engagement
  - Appetite was strong for a Council-led Heat Network Zone Coordinator role as a contact to facilitate stakeholder engagement and to manage relationships in the zone.
  - Education is a key part of engagement with potential heat network connections, requiring a mixture of one-to-one conversations and webinars.

- There is a need to better understand the existing assets, including energy and other costs (for example carbon offsetting)
- Zoning strategy
  - Larger heat network zones were preferred, to benefit from the economies of scale – for example resulting in potentially lower heat costs, and being able to deliver greater social value through scale.
- Technology
  - Recovery and reuse of heat, for example recovering heat from cooling of buildings will be a key theme
  - Connecting to meters and the Building Management Systems and being able to operate the system with smart controls will enable more efficient heat networks

### *Building fabric retrofit*

The LHEES Considerations for Energy Efficiency (in isolation, and as a driver of fuel poverty) were also discussed with external stakeholders – including the Housing Associations. The attendees were encouraged to consider actions that need to be carried out as part of the LHEES.

Stakeholders identified:

- Archetype-based interventions are useful to run a pilot project and then roll out as a wider scheme – for example starting with sandstone tenements or pre-1919 housing stock.
- Appetite to set a “fabric-first” minimum energy efficiency target
- Potential to require building warrants to ensure that retrofit of heating systems is always “heat-pump ready”, similar to what is already the case for new homes.
- Zone Partner, concession-based approach to enable an obligation to be placed to invest in energy efficiency within the Delivery Areas. This could also enable better identification of future heat network connection opportunities.

### *On-gas and off-gas grid*

The on- and off-gas grid group discussed the Delivery Areas proposed for on- and off-gas grid decarbonisation. They identified a series of potential heat sources and constraints in the proposed Delivery Areas.

### *Project governance*

A LHEES Working Group will be established, as part of the Climate Change Action Group, to support the LHEES delivery team. The Council will also establish a “Project Board” with involvement from Housing Management, Asset Management and Regulatory and Regeneration. The board will be responsible for the project outcomes, approving project direction and authorising use of resources including the Scottish Government grant funds.

### *Consultation*

Public consultation is to be undertaken on the draft Strategy (this document) before it is adopted and published, following West Dunbartonshire’s processes and practices. This will be a full public consultation and will take place over a six week period. The Consultation plan will be developed to ensure meaningful and targeted engagement with groups and organisations of interest through surveys and social media. Comments from the consultation will be included in revisions to the final Strategy.

### Future engagement

The development of the LHEES Delivery Plan, which follows from the adoption of this Strategy, will involve greater stakeholder engagement, particularly focusing on those stakeholders within the shortlisted Delivery Areas. As part of the Delivery Plan, a Monitoring and Engagement Plan will also be developed to set out how West Dunbartonshire Council will engage with local businesses and residents to deliver heat decarbonisation projects in the area.

## West Dunbartonshire Progress

The Council has made significant initial strides to increase energy efficiency, reduce fuel poverty and decarbonise heat sources across the local authority area. The Queens Quay District Heat Network is the largest Water Source Heat Pump of its kind in Scotland and has commenced the decarbonisation the former John Brown Shipyard in Clydebank. Heat pumps extract water from the River Clyde at the state of the art energy centre and transport the heat through district heating network to homes and businesses. At present, the Queen Quay network supplies: Aurora House, Titan Enterprise Centre, Clydebank Leisure Centre, Queens Quay House, Town Hall, Library, and 192 domestic properties. There is significant potential for further extension of the network to service a wider area of Clydebank, including the Golden Jubilee Hospital. Queens Quay District Heat Network reduces carbon emissions for domestic and non-domestic buildings and provides a viable renewable heat alternative to fossil.

The Council is also progressing some Air Source Heat Pump pilot projects to individual domestic properties and monitoring the financial costs and viability for future developments. Buildings should have high levels of energy efficiency to ensure an Air Source Heat Pump runs as efficiently as possible and does not have a negative impact on fuel costs in comparison to fossil fuel alternatives. The Council also has a number of energy efficiency programmes operating across the local authority area to increase energy efficiency through insulation interventions namely: loft, cavity wall, internal wall, and external wall insulation. These types of improvements to properties will aid to reduce fuel bills for those at risk of or living in fuel poverty, reduce carbon emissions and prepare for viable future low carbon heating connections. The analysis carried out in this Strategy will aid in the identification of areas of focus where energy efficiency improvements are most needed.

## Considerations, Targets and Indicators

Data on the building stock of West Dunbartonshire has been analysed to inform the selection of Strategic Zones, which are large areas of focus for wide-scale delivery of heat decarbonisation solutions.

**Considerations** refers to the six LHEES considerations

**Targets** refers to the specific thresholds to which buildings within Strategic Zones should be brought.

**Indicators** refers to the measurable characteristics that have been used to identify and rank Strategic Zones

### Heat networks

The Heat Networks LHEES consideration aims to decarbonise buildings through the development of heat networks. The LHEES has developed a series of Heat Network Zones, within which a focus will be given to developing heat networks.

### Targets

The Heat Networks (Scotland) Act 2021 sets a national target of heat supplied by heat networks to reach 2.6 TWh/year by 2027 and 6 TWh/year by 2030. This equates to 3% and 8% of current heat supply. For West Dunbartonshire, this means that a target of 67.5 GWh/year heat demand should be met by heat networks by 2030.

### Indicators

#### *Linear heat density*

In order to identify Heat Network Zones, “heat-dense” areas have been identified – that is, areas in which a heat network would be able to deliver a lot of heat with a small length of pipework.

As an initial indication of heat network viability, a linear heat density threshold of 4 MWh/year/m is used, as recommended by Scottish Government’s LHEES Methodology for rural areas.

#### *Anchor loads*

Anchor loads are buildings in heat networks with high heat demand and that would be simple to connect to – for example public sector buildings like leisure centres and schools. Therefore, Heat Network Zones with a higher number of anchor loads have been prioritised.

#### *Fuel poverty*

Through stakeholder engagement, fuel poverty has been identified as an ongoing focus for West Dunbartonshire. Therefore, indicators of fuel poverty and extreme fuel poverty have been used to identify Heat Network Zones within which there is a greater number of properties in fuel poverty.

### Detailed summary

A detailed summary of the indicators used to assess the Heat Networks LHEES Consideration can be found in the Appendix.

## Off gas grid and On gas grid

The LHEES Off Gas Grid and On Gas Grid Considerations focus on how to decarbonise homes by installing heat pumps. The approach to categorisation of buildings for heat pump readiness and ranking of Strategic Zones by

### Targets

Heat pumps operate most efficiently in buildings that are well insulated and therefore can operate heating systems at lower temperatures. For this reason, analysis of the impact of the Off Gas Grid and On Gas Grid Considerations include energy efficiency interventions that may need to be carried out to properties to be able to install heat pumps.

The target energy efficiency level for these preparatory retrofits has been aligned to Scottish Government's Heat in Buildings Strategy as follows:

- Public sector housing: EPC B
- Private sector housing: EPC C – based on the Heat in Buildings Strategy target for private rented properties, but also applied to owner-occupied properties as a target level of energy efficiency

### Indicators

The analysis categorises buildings into four different categories depending on their “heat pump readiness” based on several different characteristics of the building fabric.

#### *Heritage*

Properties with Listed status or those in Conservation Areas can be more difficult places to install heat pumps due to limitations around affordable retrofit to bring systems to lower temperatures and the visual amenity of the heat pump unit itself.

#### *Building fabric*

Properties with insulated walls, loft insulation and double glazing already installed are more readily suitable for heat pump retrofit.

#### *Current heating fuel*

Properties that are already heated with low carbon systems are excluded from the analysis as they do not require heat pumps to be installed to decarbonise. The current heating fuel is then also used to identify properties in which heat pump retrofit should be prioritised. For example, those that currently use biomass, solid fuels, LPG or oil are brought into categories that indicate more immediate potential for heat pump retrofit.

### Detailed summary

A detailed summary of the indicators used to assess the Heat Networks LHEES Consideration can be found in the Appendix.



## Poor building energy efficiency and Poor building energy efficiency as a driver of fuel poverty

These LHEES Considerations aim to tackle poor building energy efficiency in West Dunbartonshire by rolling out retrofit programmes that bring homes up to a higher standard. For properties in fuel poverty, additional consideration is given to how poor energy efficiency may be impacting the ability of occupants to afford heating their homes.

### Targets

As for the targets for On and Off Gas Grid, these LHEES Considerations target the Heat in Buildings Strategy thresholds as follows:

- Public sector housing: EPC B
- Private sector housing: EPC C – based on the Heat in Buildings Strategy target for private rented properties, but also applied to owner-occupied properties as a target level of energy efficiency

### Indicators

#### *Energy efficiency*

Some simple indicators of poor building energy efficiency have been used to identify properties with poor energy efficiency in West Dunbartonshire.

- Uninsulated walls
- Loft insulation <100mm

#### *Fuel poverty*

An indication of the likelihood of a property to be in fuel poverty is available for every home in West Dunbartonshire. This includes:

- Fuel poverty: estimated fuel bill is >10% of income after housing costs.
- Extreme fuel poverty estimated fuel bill is >20% of income after housing costs.

The Scottish Index of Multiple Deprivation is also used to identify areas with other causes of deprivation.

## Mixed tenure, mixed use and buildings in Conservation Areas

This LHEES Consideration targets properties in four main categories:

- Mixed tenure buildings
- Mixed use buildings
- Listed buildings
- Conservation areas

It aims to highlight areas in which heat decarbonisation may be difficult to deliver, due to ownership and tenure of the properties, or the potential heritage impacts of installing heat pumps and retrofitting buildings to higher levels of energy efficiency.

### Targets

Buildings in this category will still be held to the same targets in the Heat in Buildings Strategy of:

- Public sector housing: EPC B

- Private sector housing: EPC C – based on the Heat in Buildings Strategy target for private rented properties, but also applied to owner-occupied properties as a target level of energy efficiency

#### Indicators

The indicators for this Consideration are limited to tenure, listed status and Conservation Area.

#### Detailed summary

A detailed summary of the indicators used to assess the Heat Networks LHEES Consideration can be found in the Appendix.

## Baselining of building performance

The purpose of this section is to set out the baseline of West Dunbartonshire's current building stock in terms of its characteristics, energy efficiency and level of heat decarbonisation, split by domestic and non-domestic properties. This section uses outputs generated from following Scottish Government's LHEES Guidance to utilise the LHEES Stage 3 Baseline Tools for both the domestic and non-domestic stock.

### Domestic

The Energy Savings Trust's Home Analytics (v 3.8.1) dataset was used as the basis of the domestic baseline modelling.

Within West Dunbartonshire, the domestic building stock equates to a total of 93.6% of all the buildings within the local authority, with a total count of 46,252, and a heat demand of 517.4 GWh per year (80% of the local authority's total). The 46k domestic building stock within West Dunbartonshire has been summarised by various characteristics, providing percentage counts for each characteristic category:

- Property Characteristics
- Energy Efficiency and Heat Supply
- Property Tenure and Heritage/Historic Buildings

National averages are provided from either the:

- Scottish House Condition Survey 2021<sup>1</sup>
- Technical Feasibility of Low Carbon Heating in Domestic Buildings - Report for Scottish Government's Directorate for Energy & Climate Change 2020<sup>2</sup>

### Property characteristics

#### Property Age

The majority of domestic properties in West Dunbartonshire fall within a construction age band of between 1950-1983 with 48% of domestic properties within this band (22k homes). Outside of this band, the building stock is very mixed.

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<sup>1</sup> <https://www.gov.scot/publications/scottish-house-condition-survey-2021-key-findings/pages/1-key-attributes-of-the-scottish-housing-stock/>

<sup>2</sup> <https://www.gov.scot/publications/technical-feasibility-low-carbon-heating-domestic-buildings-report-scottish-governments-directorate-energy-climate-change/>

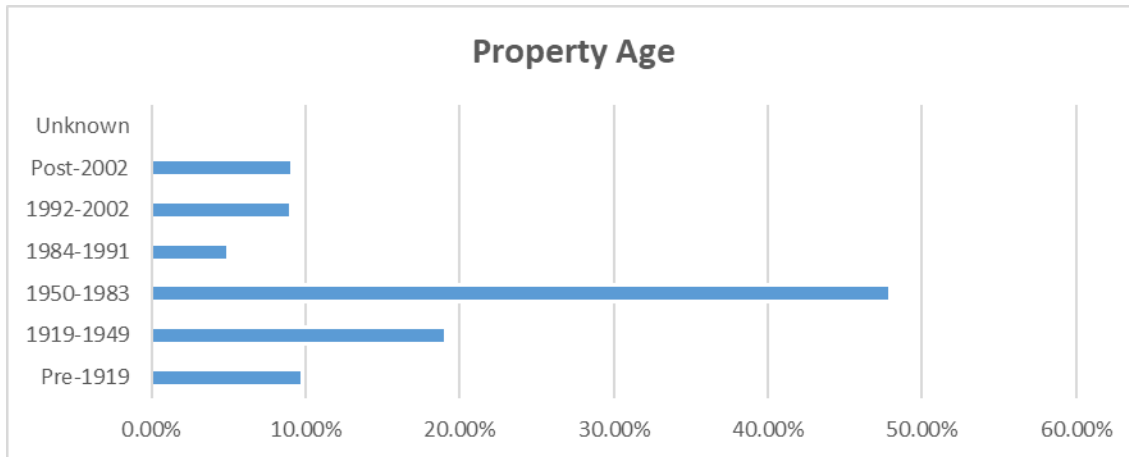


Figure 0—1 Property Age Domestic Baseline

The number of domestic properties within the pre-1919 age band is below the national average, with 19% of buildings in Scotland are reported to have been built before 1919<sup>3</sup>.

#### Property Type

Variance is also identified in the domestic property type within West Dunbartonshire. The property type with the largest proportion of the stock are 'Small blocks of flats/dwellings converted into flats' with 23% of domestic properties within this band. 'Blocks of flats' were the second highest with 21% and 'Semi-detached' third with 18%.

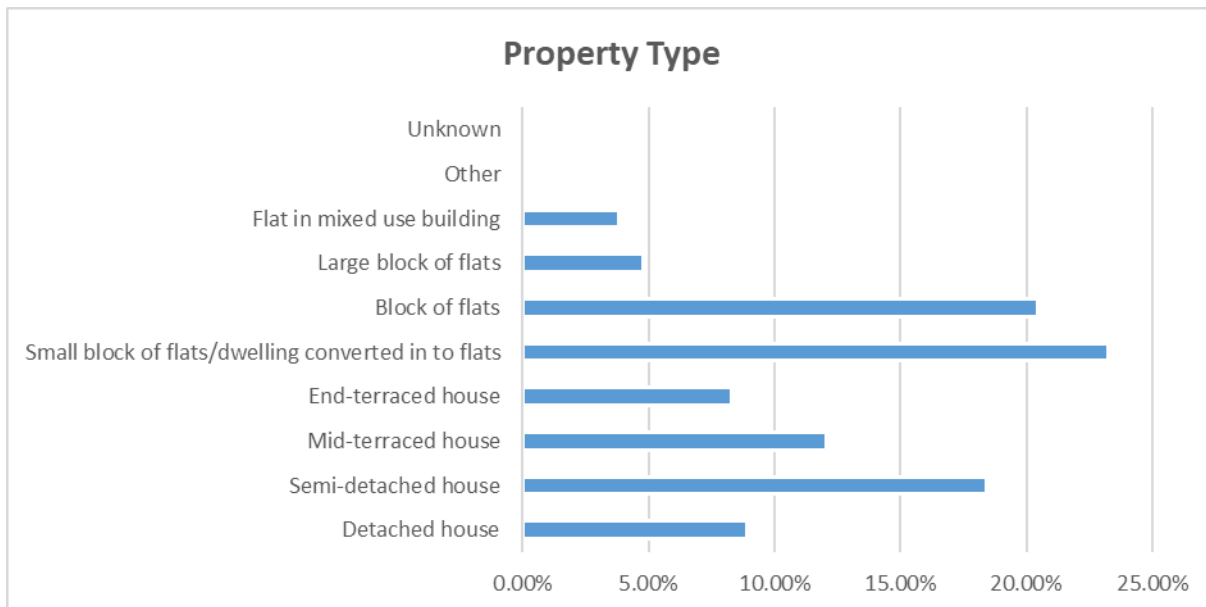


Figure 0—2 Property Type Domestic Baseline

<sup>3</sup> Technical Feasibility of Low Carbon Heating in Domestic Buildings - Report for Scottish Government's Directorate for Energy & Climate Change (2020)

In comparison to the national average, there is a far higher proportion of ‘Small blocks of flats/dwellings converted into flats’ in West Dunbartonshire - 23%, compared to 14% of the national domestic building stock.

The national averages for each property type are below with their equivalent West Dunbartonshire percentage for comparison.

Table 0—1 Domestic Property Type National Comparison

Property Type	National Rank (%)	West Dunbartonshire %
Detached/Semi Detached	1 (39%)	(27%)
Mid/End Terraced House	2 (20%)	(20%)
Block of Flats	3 (15%)	(21%)
Small Block of Flats/Converted Flats	4 (14%)	(23%)
Large Block of Flats	5 (6%)	(5%)
Flat in Mixed Use Building	6 (5%)	(4%)

### Energy efficiency and heating

Domestic energy efficiency and heating characteristics summarised for baselining include EPC bandings, wall construction and insulation, off gas grid status, main fuel type, loft insulation level and window glazing.

### EPC Bandings

The vast majority of domestic properties (83%) fall within an EPC band of either C or D. West Dunbartonshire has a lower-than-average proportion of properties at high EPC bands, with more properties falling into EPC bands C-D than the national average.

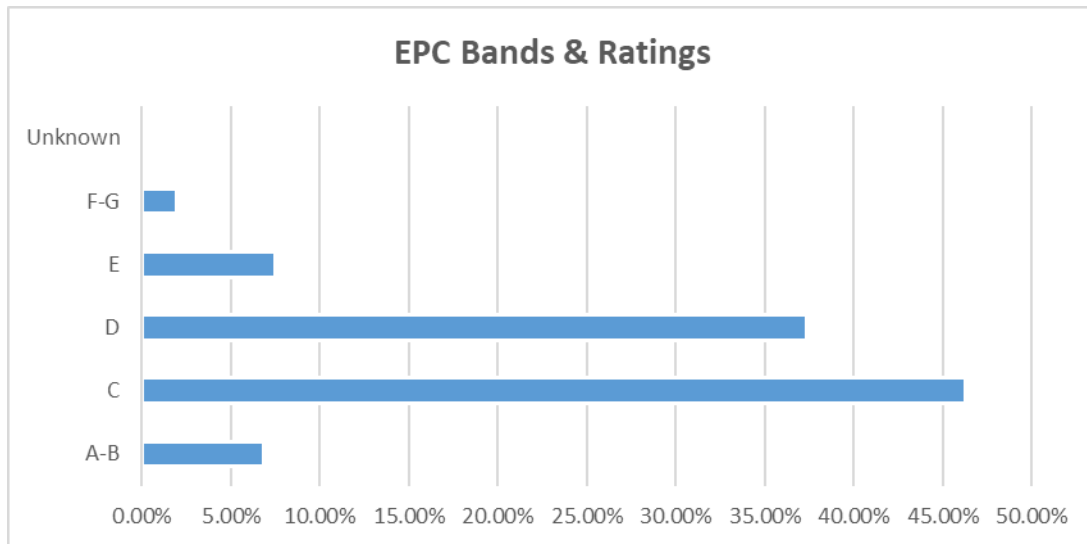


Figure 0—3 EPC Banding Domestic Baselining

Table 0—2 Domestic EPC Banding National Comparison

EPC Rating	National	West Dunbartonshire
A-B	9%	7%
C	39%	46%
D	35%	37%
E	12%	8%
F-G	5%	2%

*Wall Construction and Insulation*

The most prevalent wall construction type within West Dunbartonshire is Cavity Walls, at 50% of the domestic building stock. Overall, 60% of all walls are insulated, with 40% uninsulated.

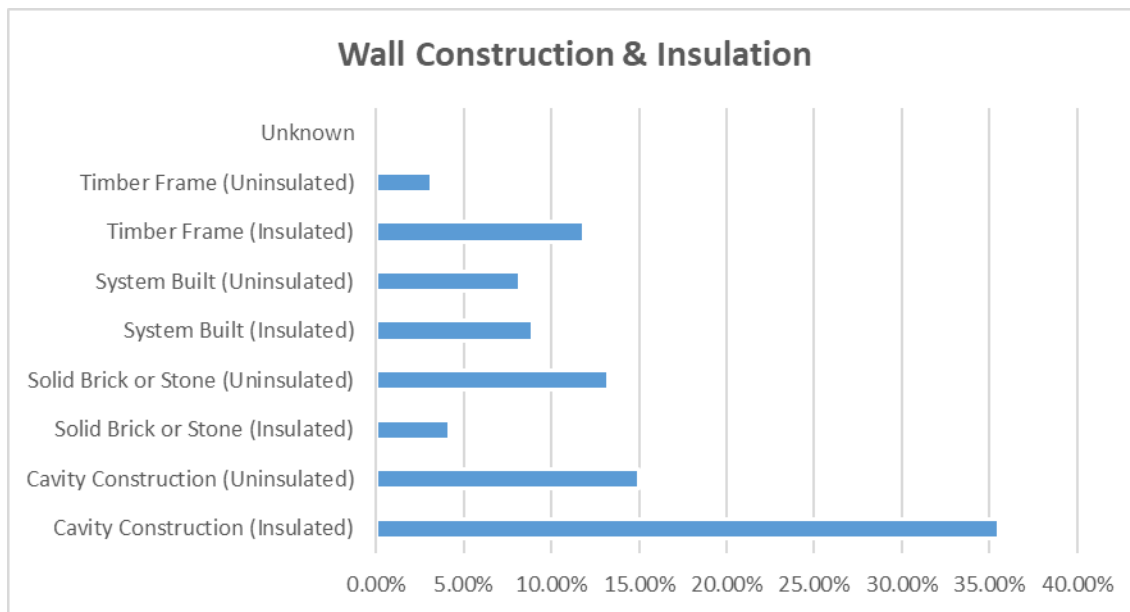


Figure 0—4 Wall Construction and Insulation Domestic Baseline

*Loft Insulation*

If loft insulation has already been applied to homes, the majority will have done this to a good level - greater than 250mm. Only 8% of domestic properties have either no insulation, or less than 99mm.

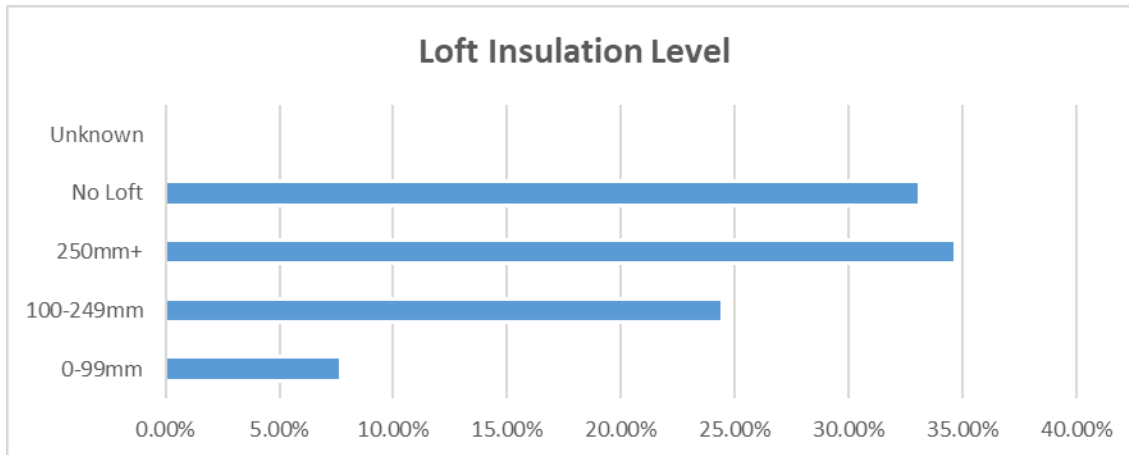


Figure 0—5 Loft Insulation Domestic Baseline

### Glazing

The prevalence of single glazed windows in West Dunbartonshire is low, with only 3% of domestic properties falling within this category and 97% having either double or triple glazing.

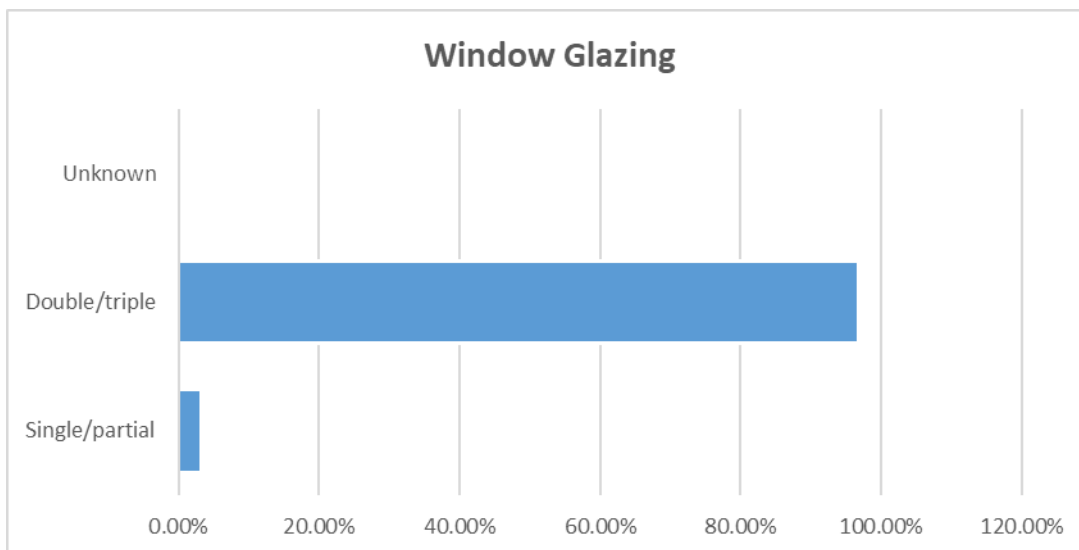


Figure 0—6 Window Glazing Domestic Baseline

### Off Gas Grid

In comparison to the Scottish House Condition Survey 2021, the number of off-gas grid domestic properties within West Dunbartonshire is below the Scottish average of 12%. Only 9% of the housing stock in West Dunbartonshire is off gas grid.

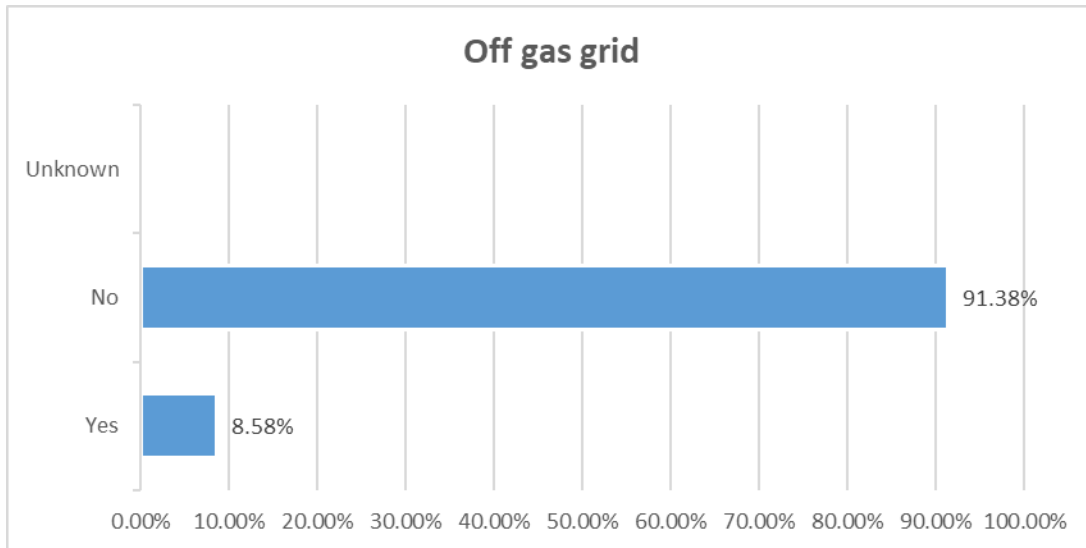


Figure 0—7 Off Gas Grid Domestic Baseline

*Main Fuel Type:*

As 91% of all domestic properties are on gas grid, the main fuel type within West Dunbartonshire is Natural Gas at also 91%. This is higher than the national average of 80%. Electricity is the second most common main heating fuel in West Dunbartonshire, supplying 8% of domestic heat, compared to 11% nationally. The remainder in order of proportion is met by Oil (0.70%), LPG (0.27%) and Biomass (0.10%). West Dunbartonshire has a much lower proportion of properties still using heating oil – 0.7%, compared to 6% nationally.

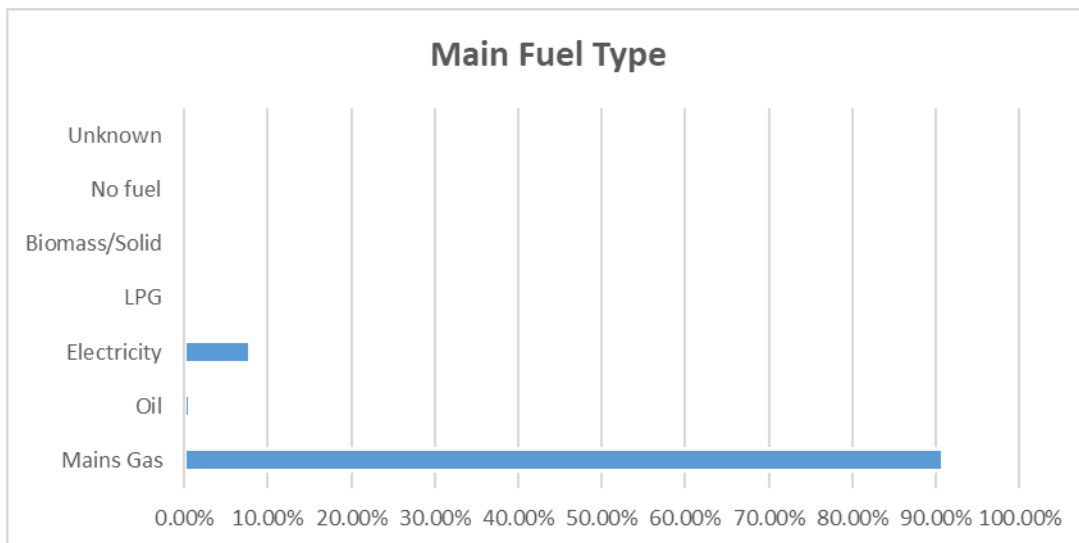


Figure 0—8 Main Heating Fuel Domestic Baseline



## Tenure and heritage

### Tenure

The tenure most prevalent in West Dunbartonshire’s housing stock is ‘Owner Occupied’ properties at 55% of homes. ‘Privately Rented’ homes account for 7% of the stock, meaning that 62% of domestic properties in West Dunbartonshire are of private tenure.

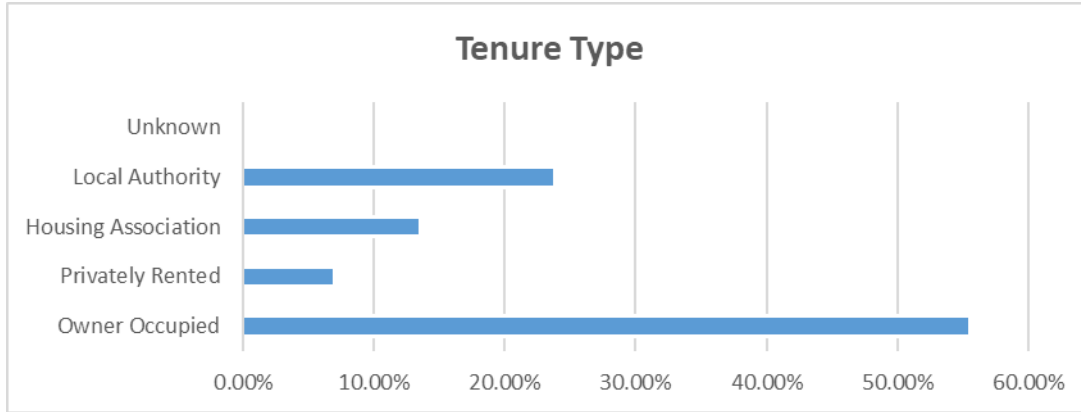


Figure 0—9 Tenure Type Domestic Baseline

In comparison to the national average, West Dunbartonshire has a higher proportion of public tenure types, with both ‘Local Authority’ and ‘Housing Association’ above the national average. The national averages for each tenure type are below with their equivalent West Dunbartonshire rank and percentage for comparison.

Table 0—3 Domestic Tenure Type National Comparison

Tenure Type	National	West Dunbartonshire
Owner Occupied	62%	55%
Privately Rented	14%	7%
Local Authority	12%	24%
Housing Association	11%	14%

25% of properties in West Dunbartonshire are classified as being ‘Mixed Tenure’ - defined as domestic units within a building of at least two different tenures, e.g. owner occupied and private rented.

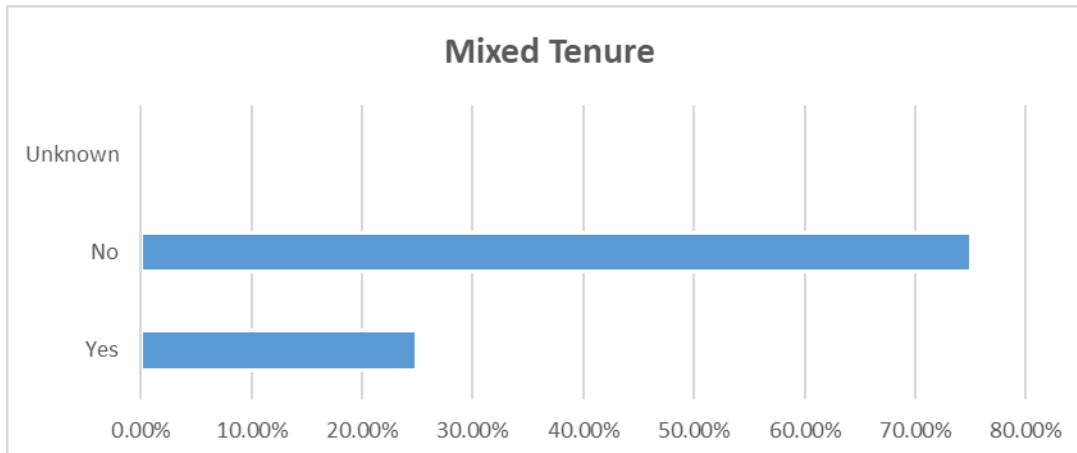


Figure 0—10 Mixed Tenure Domestic Baseline

## Heritage

98% of domestic properties in West Dunbartonshire are not in Conservation Areas.

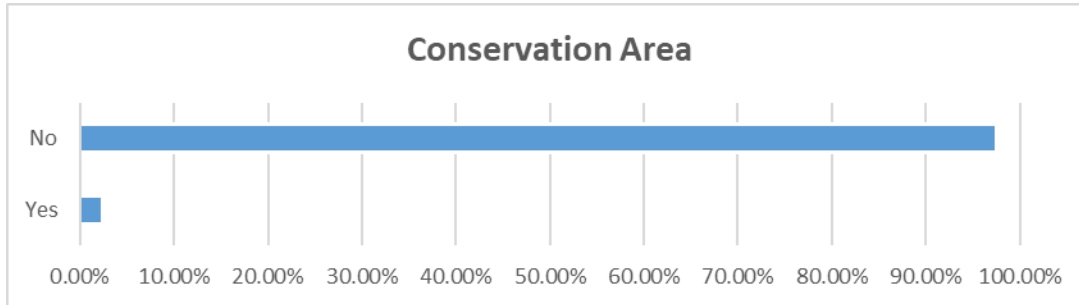


Figure 0—11 Conservation Area Domestic Baseline

Only 1% of the domestic stock are in Listed buildings- those defined as buildings of special architectural or historic interest and are protected under the Planning (Listed Buildings and Conservation Areas) (Scotland) Act 1997.

The number of Listed domestic properties is below the national average, with 3% of domestic buildings in Scotland are reported to have either a listed building category of A, B or C as reported within the Technical Feasibility of Low Carbon Heating in Domestic Buildings - Report for Scottish Government's Directorate for Energy & Climate Change (2020).

## Non-domestic

The Energy Savings Trust's Non-Domestic Analytics (v 1.1) dataset was used as the basis of the non-domestic baseline modelling.

Within West Dunbartonshire the non-domestic building stock equates to a total of 6.4% of all the buildings within the local authority, with a total count of 3,147, and a heat demand of 144.5 GWh per year (20% of the local authority's total).

The 3k non-domestic building stock within West Dunbartonshire have been summarized by various characteristics, providing counts and heating demand for each characteristic category:

- Typology
- Floor Area
- Property Age
- Main Fuel Type

National Averages are provided from the:

- Scotland's non-domestic energy efficiency baseline: report (2018)<sup>4</sup>

## Typology

The non-domestic building stock of West Dunbartonshire is varied. The majority of properties (by count) fall within the typology of 'Retail' with 30% of properties, followed by 'Offices' (19%) and 'Light

<sup>4</sup> <https://www.gov.scot/publications/scotlands-non-domestic-energy-efficiency-baseline/>

Manufacturing' (19%). 68% of non-domestic properties within West Dunbartonshire fall within one of these three typology categories. This is a similar composition to the national non-domestic stock.

Table 0—4 Non-Domestic Typology Baseline

Main Typology	Property Count	Property Count (%)	Heat Demand (MWh/yr)	Heat Demand (%)
General sports & leisure	93	3%	7,620	5%
Clubs and community centres	96	3%	6,464	4%
Museums, art galleries, libraries, law courts	16	1%	1,280	1%
Large entertainment sites (e.g. theatres, cinemas, conference centres)	5	<1%	356	<1%
Places of worship	59	2%	4,469	3%
Education	46	1%	6,735	5%
Emergency services	10	<1%	847	1%
Health	37	1%	4,436	3%
Hotels	59	2%	9,105	6%
Cafes, pubs, restaurants and takeaways	125	4%	5,731	4%
Light manufacturing / industry / workshop	612	19%	28,497	20%
Heavy manufacturing / industry	58	2%	3,794	3%
Offices	594	19%	20,112	14%
Retail	933	30%	24,444	17%
Storage / distribution	87	3%	4,115	3%
Residential	182	6%	9,731	7%
Military and prison	0	0%	0	0%
Other	56	2%	2,733	2%
Screened out	37	1%	1,777	1%
<b>Total</b>	<b>3,147</b>	<b>100%</b>	<b>144,481</b>	<b>100%</b>

Floor area

The majority of non-domestic buildings within West Dunbartonshire are classified as having floor areas below 500 m<sup>2</sup>, with 34% having 0 - 100 m<sup>2</sup> and 46% 100 - 500 m<sup>2</sup>.

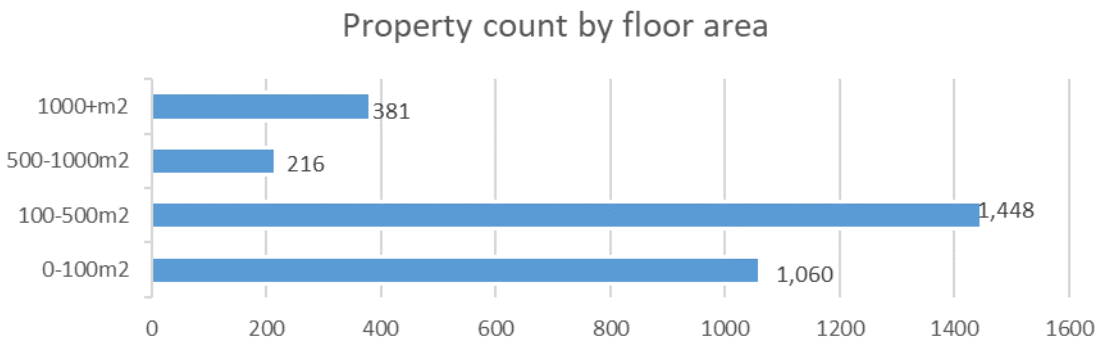


Figure 0—12 Non-Domestic Floor Area Count Baseline

However, although 0 - 100 m<sup>2</sup> has the highest floor area count, this category has the lowest cumulative heat demand of 11,374 MWh (8%), and building with a floor area category above 1,000 m<sup>2</sup> a cumulative heat demand of 59,356 MWh/yr (44%).

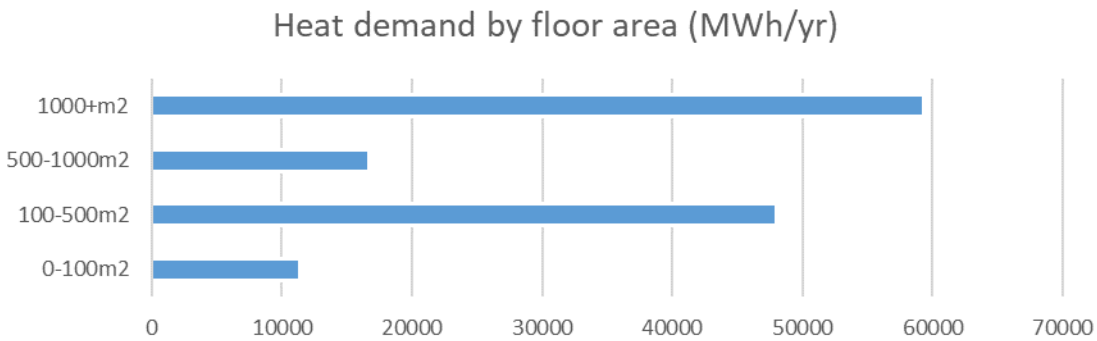


Figure 0—13 Non-Domestic Floor Area Heat Demand Baseline

### Property age

The construction age band with the highest count of non-domestic properties is '1950-1983', which is the same as for domestic stock. The 'Pre-1919' band also has a similar number of non-domestic properties.

A quarter of non-domestic buildings in West Dunbartonshire were constructed since 1983.

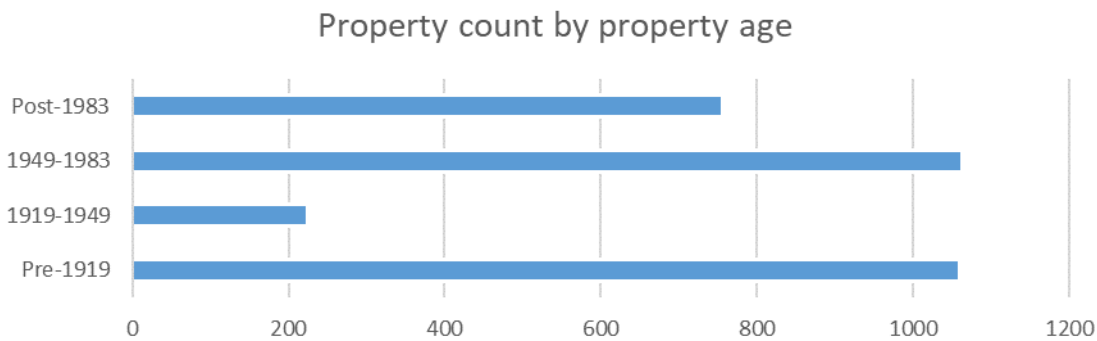


Figure 0—14 Non-Domestic Property Age Count Baseline

The non-domestic heating demand for the different property age bands align to similar proportions to that of the count of properties within each age band.

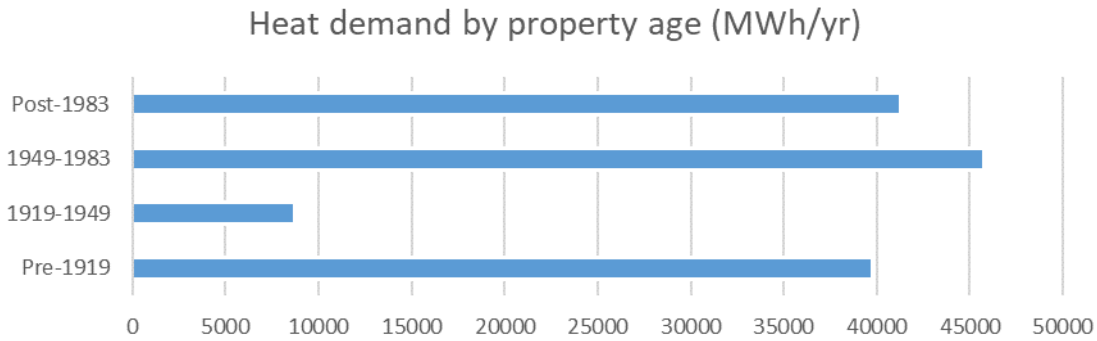


Figure 0—15 Non-Domestic Property Age Heat Demand Baseline

The 'Post-1983' non-domestic property age band cumulative heat demand is significantly contributed by five major typologies: 'Residential', 'Light Manufacturing', 'Offices', 'Retail' and 'Hotels'.

#### Fuel type

The highest proportion of fuel for non-domestic properties is 'Electricity' for 1,824 properties (59%), followed by 'Mains Gas' (32%), 'Oil' (8%) and 'Other' (1%).

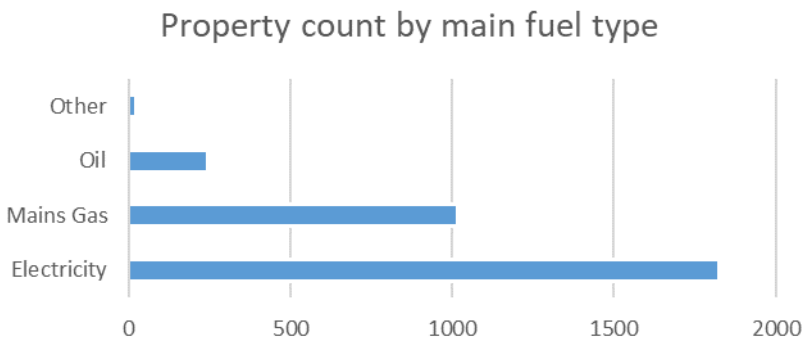


Figure 0—16 Non-Domestic Main Fuel Count Baseline

Relating counts of properties to heat demands, 'Mains Gas' has the highest supplied heat to non-domestic properties within West Dunbartonshire, with 'Electricity' coming second.

Comparing Fuel Type statistics to the national average for Scotland, West Dunbartonshire has a higher-than-average proportion of 'Electrically' heated non domestic properties with 58% versus the national average of 42%. With this higher proportion of 'Electric' fuel, the proportion of 'Mains Gas' is below the national average at 32% in West Dunbartonshire compared to 50% nationally. 'Oil' is also higher than the national average at 8% compared to 5% nationally<sup>5</sup>.

<sup>5</sup> Scotland's non-domestic energy efficiency baseline: report (2018).

### Main Heating Fuel (Count)

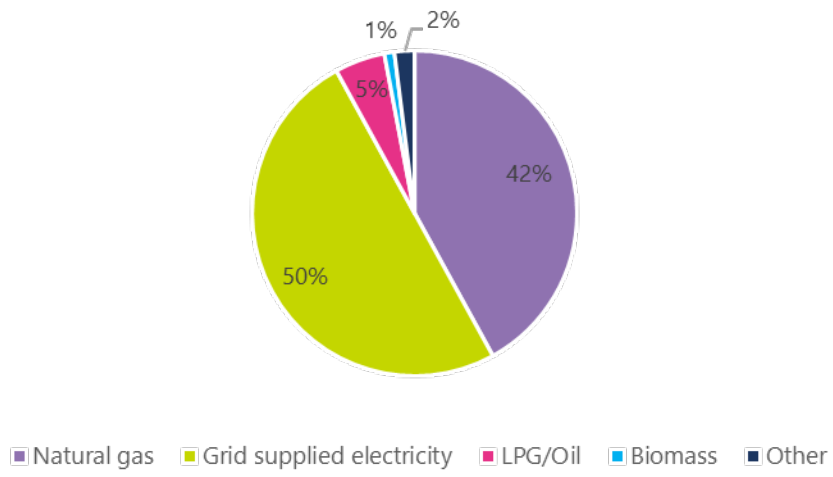


Figure 0—17 Non-Domestic Main Heating Fuel National Comparison

# Generation of Strategic Zones and Pathways

Strategic Zones are useful to understand the baseline performance, the scale of potential and initial areas of focus, which could be used to inform the identification of Delivery Areas and follow-on engagement.

## Strategic Zone Ranking

For West Dunbartonshire, Strategic Zones are at a Data Zone level. The top five Strategic Zones have been selected for each LHEES Consideration, following the weighted scoring methodology outlined in the Considerations, Targets and Indicators section. Heat Networks will however be summarised at the level of individual Heat Network Zones instead of Data Zones.

## Heat networks

### Screening methodology

The analysis uses the Scotland Heat Map (2019) and West Dunbartonshire Local Development Plan (LDP) information to model potential 4<sup>th</sup> generation heat network zones. 4<sup>th</sup> generation heat networks are typically heat only 65-45°C (flow-return) network usually low-carbon via a central plant.

Each property has a Unique Property Reference Number (UPRN), however properties are grouped under a Parent UPRN if they share the same building structure e.g. units in a block of flats. Heat demands were aggregated from UPRN to building level based on Parent UPRN to aid in heat zoning analysis.

The analysis to identify heat network opportunities uses a linear heat density (LHD) approach. LHD an industry standard metric that relates heat to distance, for a heat network it is heat demand per meter of pipe. LHD is used to identify a notional network length for each property based on the property's heat demand. A matrix of this is used within this methodology, three standard linear heat densities exist:

- 4,000 kWh/m/year – More rural local authority areas
- 8,000 kWh/m/year – More urban local authority areas
- 16,000 kWh/m/year – Dense urban areas such as major cities

A LHD level of 8,000 kWh/m/year was selected for West Dunbartonshire. The distances are mapped in GIS for each location and if these distances overlap a potential heat network opportunity is identified. Potential Zones are identified where heat networks present a decarbonisation pathway that could be of strategic significance or might warrant further investigation.

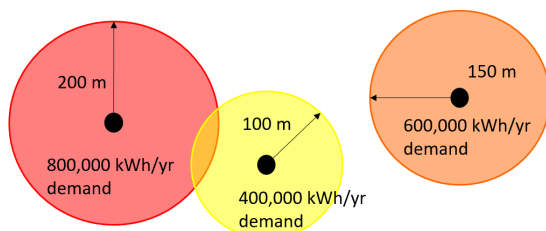


Figure 0—1 Linear Heat Densities

Potential heat network zones generated using the LHD methodology above are then screened further using an anchor load criteria. Anchor loads are high heat demand buildings which usually drive the

economics of a network. Several factors are normally considered when defining anchor loads but for this high level study a demand of at least 500 MWh/year is the determining factor (the standard threshold within LHEES Guidance).

A standard threshold of a minimum two anchor loads per zone was selected as per the default criterion. In addition manual screening of zones was undertaken to ensure the anchor loads within each identified zone still existed and if not, delete them, and re-calculating the counts of anchor load per zone, then removing any zones with less than two anchor loads. Following this 12 potential heat network zones were identified with a total of 253 GWh/year heat demand.

These zones were interrogated analysing factors such as constraints and heat resources and ranked based on these factors to identify the top five ranking Potential Heat Network Zones from these 12.

### Ranking

To enable the identification of the top five Potential Heat Network Zones for integration and further interrogation within an LHEES Delivery Plan, all 12 identified Potential Heat Network Zones have been ranked based upon different indicators, with a weighting per indicator rank also applied to generate an overall ranking. The four indicators based upon which these ranking have been generated are:

- **Opportunity Category** – An opportunity category is user-defined to each potential heat network zone as either a High / Medium / Low, incorporating results following considerations into each zone’s heat resources, constraints and zone potential.
- **Count of Anchor Loads** – Anchor loads (500 MWh+) aid in driving the economics of heat networks by being potential key clients/customers, thus a higher count provides a higher driver and aids feasibility of installation.
- **Total Heat Demand** – Similar to anchor loads, the higher the demand and thus supply of heat via a heat network also aids in driving economic feasibility.
- **Count of Households in Fuel Poverty** – Connecting to a low carbon heat network source may result in lower customer heat rates, aiding households currently within fuel poverty.

The indicator weightings used within the zone ranking are as follows:

Table 0—1 Heat Networks Zone Indicator Weightings

	Opportunity Category	Count of Anchor Loads	Total Heat Demand	Count of Fuel Poverty Households
<b>Weighting (%)</b>	60%	10%	10%	20%

Following these weighted rankings, the top five ranking Heat Network Zones are as follows:

1. Clydebank
2. Dumbarton
3. Alexandria
4. Littleholm
5. Kilbowie

The locations of these zones are presented in Figure 0—2.



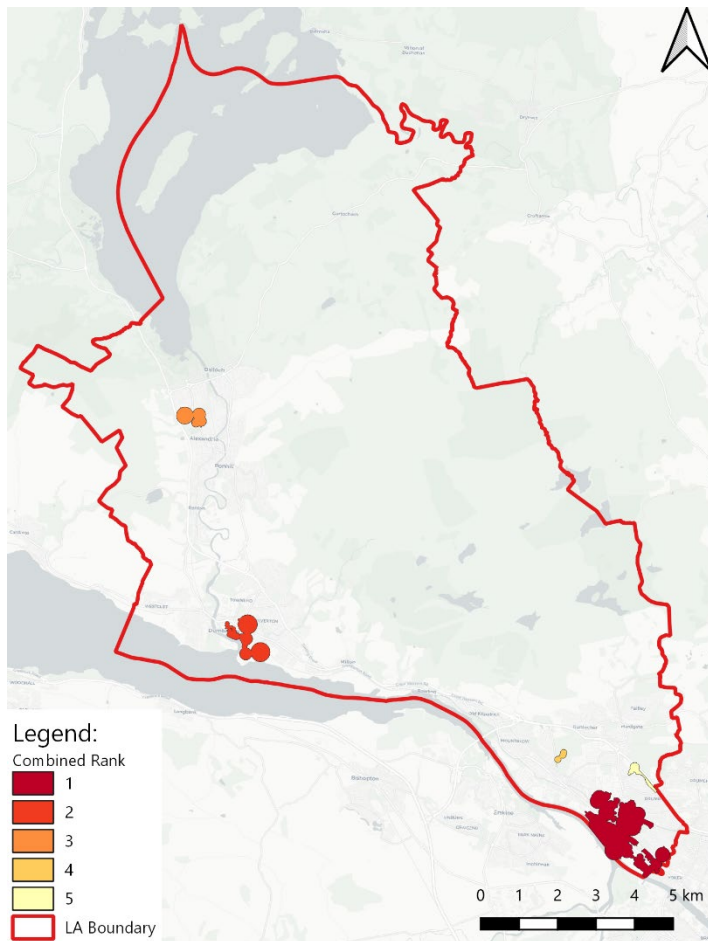


Figure 0—2 Heat Networks Top 5 Ranking Zones

### Finalised Strategic Zones

Through feedback from stakeholder consultation, the three most southerly networks of the five top ranking zones (Clydebank, Littleholm and Kilbowie) were combined into a larger Combined Heat Network Zone. This provides a larger area in the vicinity of the existing Queens Quay heat network in which new heat networks, or extensions of existing, may be delivered.

In addition to the three Zones identified through the LHEES analysis and ranking exercise, the stakeholder consultation recommended the addition of two other Heat Network Zones within the Combined Heat Network Zone. These are the Golden Jubilee (highlighted in analysis but ranked below top five) and Dalmuir Flats (highlighted as part of the Queens Quay OBC). Radnor Park Kilbowie (also highlighted as part of the Queens Quay OBC) is also highlighted within the Combined Heat Network Zone as a potential area of expansion.

*Clydebank (Combined Heat Network Zone)*

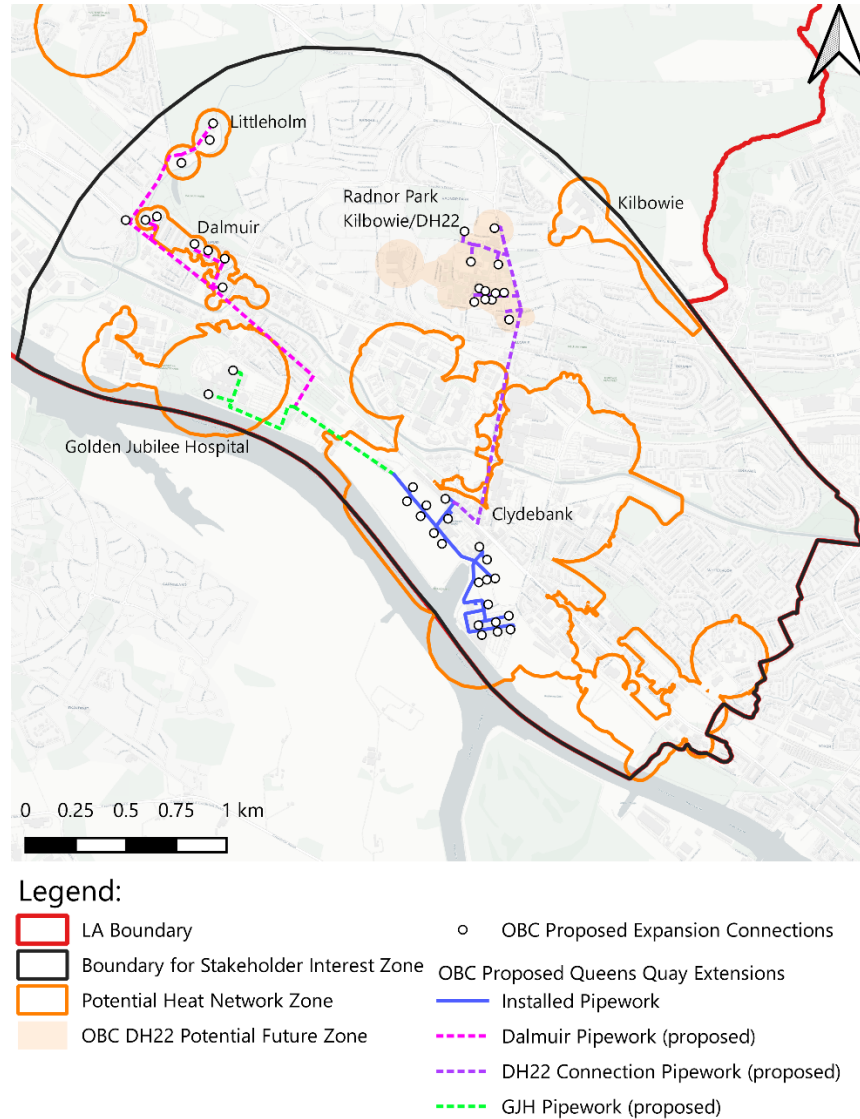


Figure 0—3 Combined Clydebank Heat Network Zone

Due to the proximity of three of the five heat network Strategic Zones to each other, a larger zone encompassing these networks should be considered as a zone of stakeholder interest. This will encompass Clydebank, Golden Jubilee Hospital, Dalmuir, Littleholm and Kilbowie.

Expansion options for the existing Queens Quay heat network were assessed in an Outline Business Case (OBC) in 2022, which indicated initial economic viability of a potential for expansion of the network from Clydebank to the Golden Jubilee Hospital and Dalmuir Flats. Radnor Park Kilbowie (DH22) was also identified in this study as a potential future expansion area for the network, although not a priority.

A heat network in this Combined Heat Network Zone could be supplied by the existing Queens Quay Energy Centre, which currently houses two Water Source Heat Pumps with a heating capacity of 2.65 MW each, and two backup boilers (7 MW each), supplying flow temperatures of approximately 75°C, and return temperatures of 45°C.

A possible cross-boundary extension of heat networks eastwards into Glasgow is a further possibility following engagement with Glasgow City Council. The case is strengthened by the presence of West Dunbartonshire’s large area of interest for heat networks north of Clydebank, on the local authority boundary.

*Clydebank (part of the Clydebank Combined Heat Network Zone)*

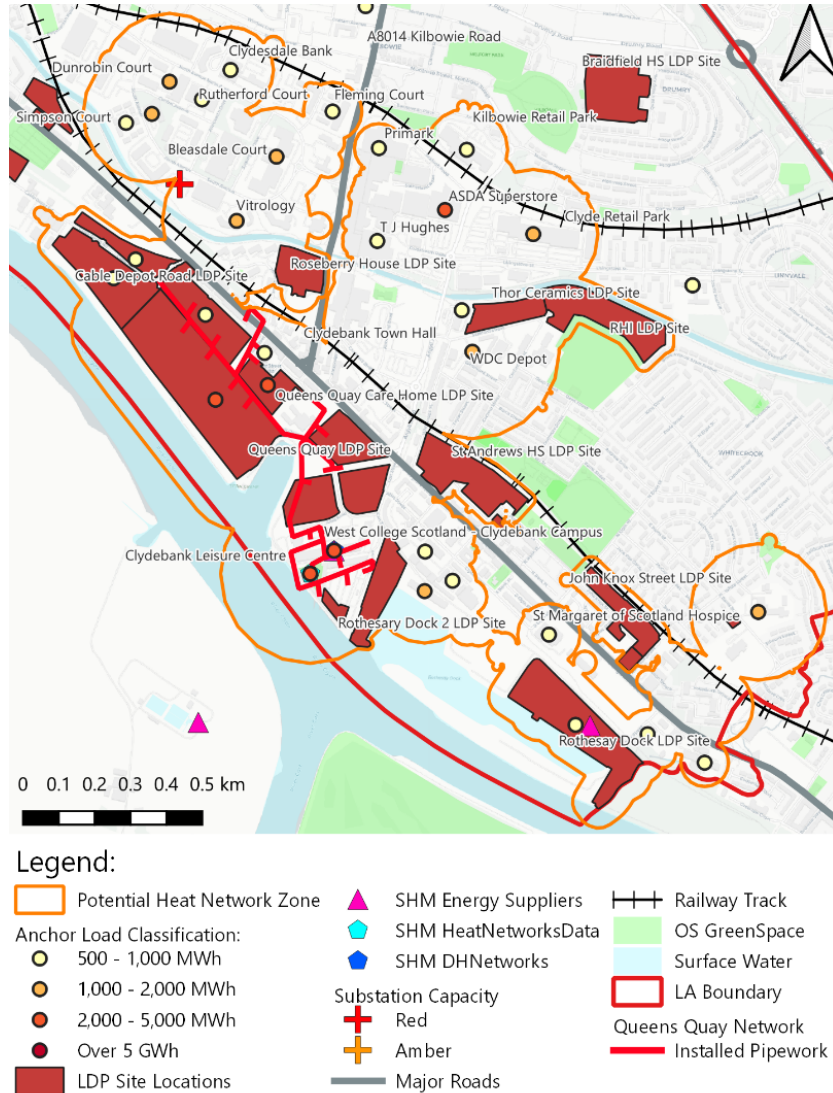


Figure 0—4 Clydebank Heat Network Zone

**Heat demand:** 85.3 GWh/year within identified potential zone, of which 36.3 GWh/year is from the 31 anchor loads (500 MWh/year+).

**Zone area:** 214 hectares (39.8 kWh/m<sup>2</sup>)

**Count of anchor loads (>500 MWh/year heat demand):** 31

**Key anchor loads:** Queens Quay Care Home LDP Site; Queens Quay LDP Sites; West College Scotland Clydebank Campus; ASDA Superstore; Clydebank Leisure Centre; WDC Depot; Vitrology; Simpson Retail Court; Dunrobin Retail Court; St Margaret of Scotland Hospice

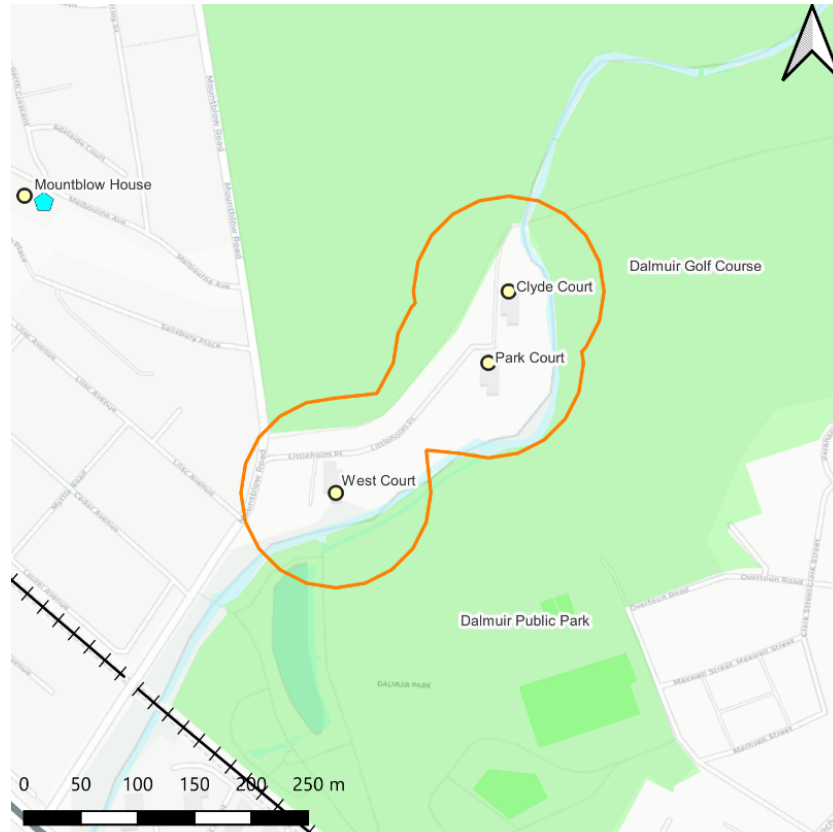
**LDP sites:** 20 LDP Sites total, inside or within 250m. Key sites include, Queens Quay = 1,045 resi units, Queens Quay Care Home = 1000 resi units, Rothesay Dock = 13,637 m<sup>2</sup> Storage, Cable Depot Road = 200 resi units, John Knox Street = 4,976 m<sup>2</sup> Workshop and RHI Site = 120 resi units.

**Heat sources:** The River Clyde provides river source Water Source Heat Pump opportunities, with a Water Source Heat Pump already installed at the Clydebank Leisure Centre. An Anaerobic Digestion Plant awaiting construction on the Rothesay Dock LDP Site. A Combined Heat and Power Network is present within the West College site.

**Fuel poverty:** 564 dwellings are estimated to be experiencing fuel poverty, which equates to 33% of domestic properties within the Zone, with 326 estimated to be experiencing extreme fuel poverty (19%).

**Constraints:** The A8014 and A814 A-Roads and the Railway all intersect the zone, isolating various anchor loads.

*Littleholm (part of the Clydebank Combined Heat Network Zone)*



**Legend:**

- Potential Heat Network Zone
- ◆ SHM HeatNetworksData
- Anchor Load Classification:**
- 500 - 1,000 MWh
- 1,000 - 2,000 MWh
- 2,000 - 5,000 MWh
- Over 5 GWh
- Railway Track
- OS GreenSpace
- Surface Water

Figure 0—5 Littleholm Heat Network Zone

**Opportunity description:** The potential heat network zone opportunity in Dalmuir focuses on Clyde, Park and West Courts, all of which are large residential tower blocks of public tenure. Zone is surrounded by vast green space for potential Ground Source Heat Pumps.

**Opportunity category:** **High** – High density of anchor loads under WDC control.

**Heat demand\*:** 2.2 GWh/year within identified potential zone, with 2.1 GWh/year of the heat demand from the three anchor loads.

**Zone area:** 5 hectares (40.5 kWh/m<sup>2</sup>)

**Count of anchor loads\* (>500 MWh/year heat demand):** 3

**Anchor loads:** Clyde Court; Park Court , West Court

**LDP sites:** No LDP sites are located within, or 250m of the Zone.

**Heat sources:** The zone is surrounded by Dalmuir Municipal Golf Course and Dalmuir Public Park which may provide opportunities for Ground Source Heat Pump boreholes. The Duntocher Burn intersects the zone, further assessment on the burn is required, but this may provide Water Source Heat Pump potential. Mountblow House to the Northwest already utilises a gas boiler fed heat network which could be expanded.

**Fuel poverty\*:** 105 dwellings are estimated to be experiencing fuel poverty, which is 39% of domestic properties within the Zone, with 66 estimated to be experiencing extreme fuel poverty (24%).

*\*The heat demand and fuel poverty statistics do not take into account changes since these properties have been externally overclad thus the actual number of fuel poverty dwellings and heat demand is likely smaller than that presented here.*

*Dalmuir (part of the Clydebank Combined Heat Network Zone)*

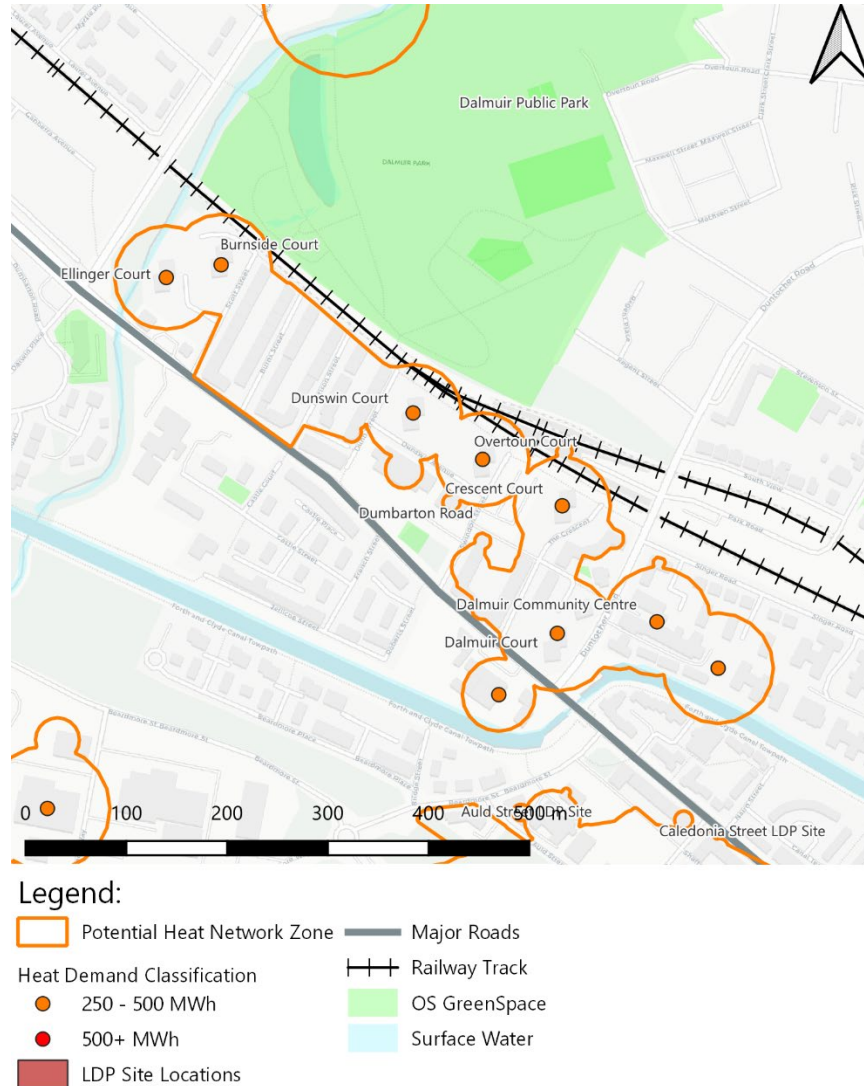


Figure 0—6 Dalmuir Flats Heat Network Zone

**Opportunity description:** Although initially not identified due to no anchor loads within, and highlighted during stakeholder engagement, this potential heat network zone opportunity in Dalmuir focuses on the six large residential tower blocks of public tenure.

**Opportunity category: Medium** – Although no anchor loads are identified within the zone, there is high density of loads under WDC control.

**Heat demand:** 9.3 GWh/year within identified potential zone.

**Zone area:** 9 hectares (103 kWh/m<sup>2</sup>)

**Count of anchor loads: (>500 MWh/year heat demand):** 0

**Anchor loads:** N/A

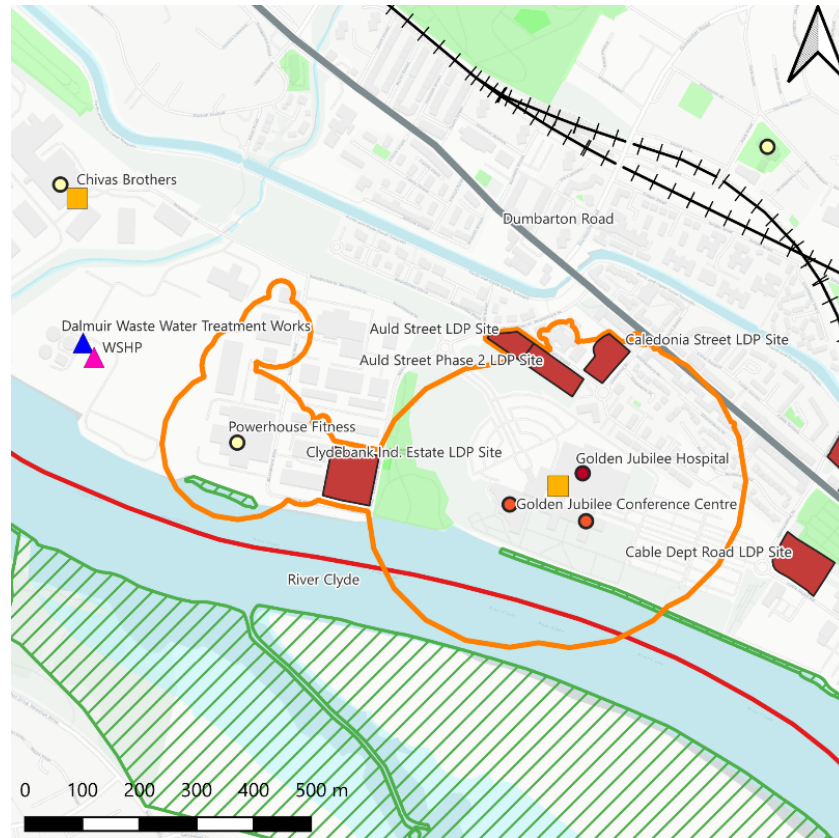
**LDP sites:** Within 250m of the Zone, Auld Street = 20 resi units, Auld Street Phase 2 = 16 resi units and Caledonia Street = 18 resi units.

**Heat sources:** The canal to the south presents a potential opportunity for a Water Source Heat Pump or the Dalmuir Public Park which may provide opportunities for Ground Source Heat Pump boreholes.

**Fuel poverty:** 442 dwellings are estimated to be experiencing fuel poverty, equating to 44% of domestic properties within the Zone, with 367 estimated to be experiencing extreme fuel poverty (36%).

**Constraints:** No major constraints are located within the Zone.

*Golden Jubilee Hospital (part of the Clydebank Combined Heat Network Zone)*



**Legend:**

- |                                    |                      |                 |
|------------------------------------|----------------------|-----------------|
| Potential Heat Network Zone        | LDP Site Locations   | Protected Areas |
| <b>Anchor Load Classification:</b> | NAEI Points          | OS GreenSpace   |
| 500 - 1,000 MWh                    | SHM Energy Suppliers | Surface Water   |
| 1,000 - 2,000 MWh                  | WWTP Plants          | LA Boundary     |
| 2,000 - 5,000 MWh                  | Major Roads          |                 |
| Over 5 GWh                         | Railway Track        |                 |

Figure 0—7 Golden Jubilee Hospital Heat Network Zone

**Opportunity description:** The main opportunity from existing demand focuses on the Golden Jubilee Hospital and Conference Centre Hotel. The Local Development Plan sites to the North (54 resi units) and West (1,781 m<sup>2</sup> Workshop) within the zone could be a viable connections.

**Opportunity category: Medium** – High density of heat from the hospital, although localised. A connection from Queens Quay network and hospital is a potential solution, and is being actively pursued.

**Heat demand:** 30.5 GWh/year within identified potential zone. 24 GWh/year of the heat demand was from the four anchor loads.

**Zone area:** 37 hectares (81.8 kWh/m<sup>2</sup>)

**Count of anchor loads: (>500 MWh/year heat demand):** 4

**Anchor loads:** Golden Jubilee Hospital (Block 1 and Block 2); Golden Jubilee Hospital Conference Hotel; Powerhouse Fitness

**LDP sites:** Clydebank Ind. Estate = 1,781 m<sup>2</sup> workshop, Auld Street = 20 resi units, Auld Street Phase 2 = 16 resi units and Caledonia Street = 18 resi units.

**Heat sources:** There is potential for extension of Water Source Heat Pump at Queens Quay District Heat Network. The adjacent Wastewater Treatment Works also utilise a Water Source Heat Pump from the River Clyde. The Waste Water Treatment Works as well as the primary hospital site (being an NAEI point emitter) are both potentially useful heat sources.

**Fuel poverty:** 69 dwellings are estimated to be experiencing fuel poverty, equating to 27% of domestic properties within the Zone, with 19 estimated to be experiencing extreme fuel poverty (7%).

*Kilbowie (part of the Combined Clydebank Heat Network Zone)*

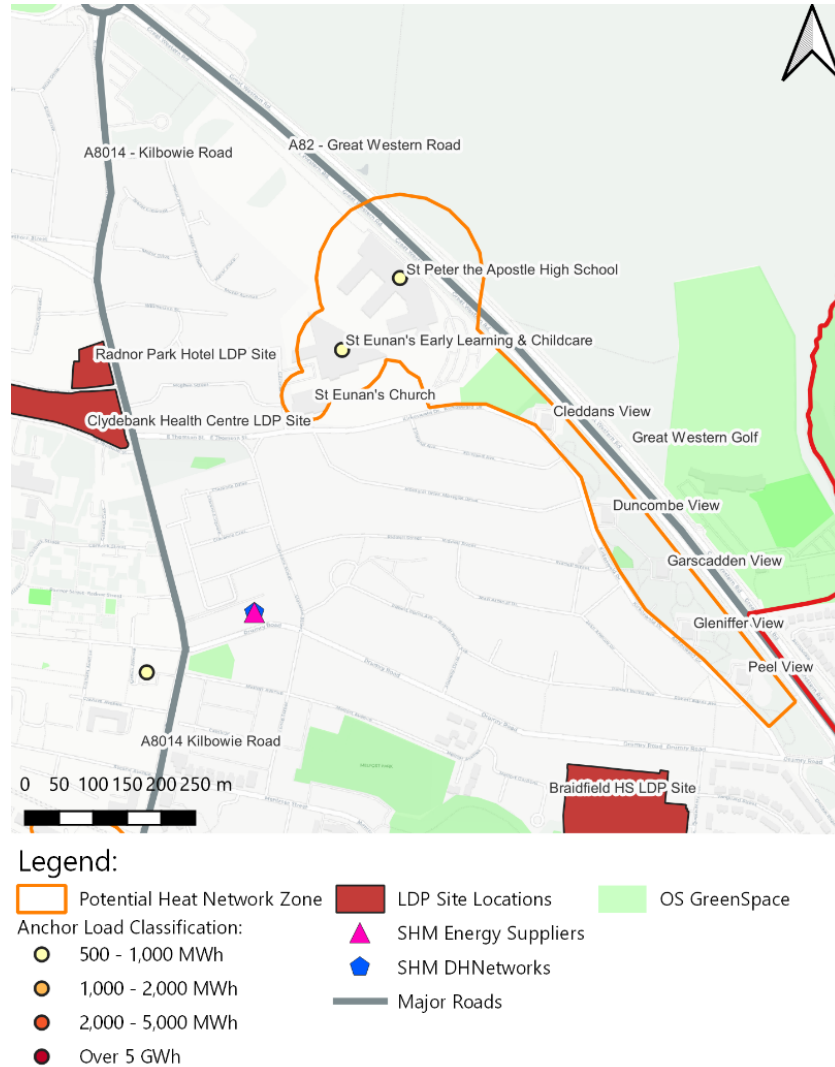


Figure 0—8 Kilbowie Heat Network Zone

**Opportunity description:** The potential heat network zone opportunity in Kilbowie has an opportunity category as high due to a high demand of likely public heat demands, no major constraints within and various heat resources nearby. This Zone’s demands are all densely located aiding feasibility.

**Opportunity category:** High – High density of publicly owned loads.

**Heat demand:** 3.4 GWh/year within identified potential zone, with 1.5 GWh/year of the heat demand from the two anchor loads.

**Zone area:** 11.5 hectares (29.5 kWh/m<sup>2</sup>)

**Count of anchor loads (>500 MWh/year heat demand):** 2

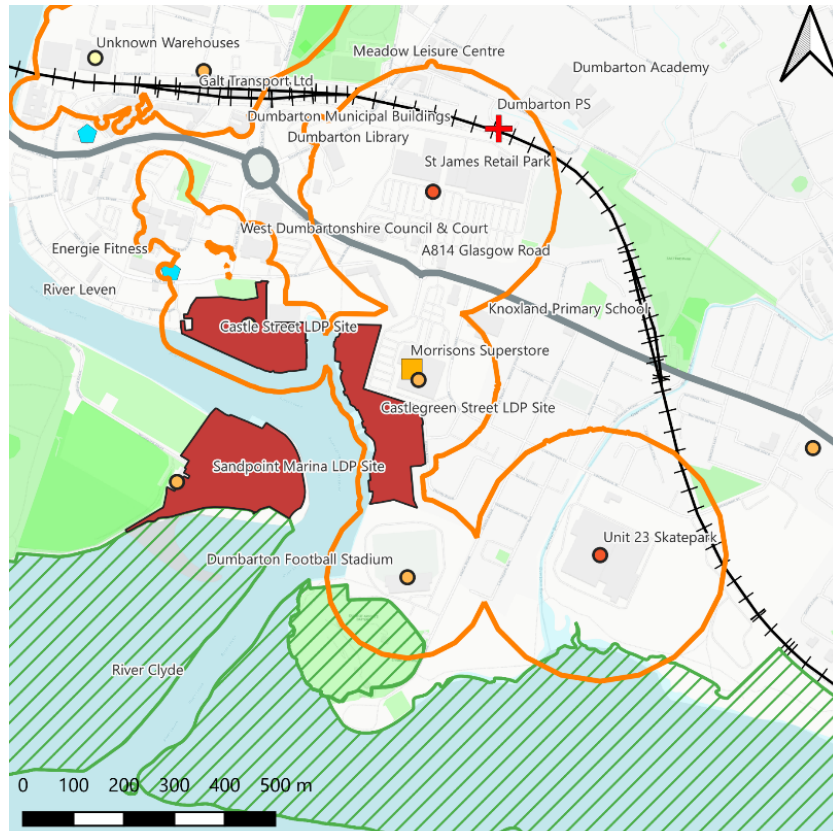
**Anchor loads:** St Peter the Apostle High School (expansion may not be viable); St Eunan’s Early Learning & Childcare Centre

**LDP sites:** Three LDP sites are located within 250m of the Zone, being Radnor Park Hotel Site = 28 residential units, Clydebank Health Centre LDP = 40 residential units and Braidfield HS LDP Site = 100 residential units.

**Heat sources:** Two heat networks already exist within a close proximity to the zone, with a Natural Gas Boiler District Heat Network located 300m South and Gas Combined Heat and Power Heat Network 450m West. The Radnor Park Primary Substation to the West is also a potential heat resource and the substation is categorised as 'Red' in regard to capacity.

**Fuel poverty:** 98 dwellings are estimated to be experiencing fuel poverty, which equates to 43% of domestic properties within the Zone, with 100 estimated to be experiencing extreme fuel poverty (43%).

### Dumbarton Heat Network Zone



#### Legend:

Potential Heat Network Zone	LDP Site Locations	SHM HeatNetworksData
<b>Anchor Load Classification:</b>	NAEI Points	Major Roads
500 - 1,000 MWh	<b>Substation Capacity</b>	Railway Track
1,000 - 2,000 MWh	Red	Protected Areas
2,000 - 5,000 MWh	Amber	OS GreenSpace
Over 5 GWh	Green	Surface Water

Figure 0—9 Dumbarton Heat Network Zone

**Opportunity category: High** – High count of demands with various typologies and public loads included within.

**Heat demand:** 23.1 GWh/year within identified potential zone, with 10.2 GWh/year of the heat demand from the five identified anchor loads.

**Zone area:** 66 hectares (35.1 kWh/m<sup>2</sup>)

**Count of anchor loads (>500 MWh/year heat demand):** 5

**Anchor loads:** St James Retail Park; Morrisons Superstore; Dumbarton Football Stadium; Unit 23 Skatepark; Castle Street LDP Site

**LDP sites:** Two LDP sites are located within the Zone, being Castlegreen Street = 110 resi units and Castle Street = 195 resi units. Another LDP site is within 250m of the zone, being Sandpoint Marina = 87 resi units.

**Heat sources:** The River Clyde and Leven both flow adjacent to the Zone providing potential for river source Water Source Heat Pumps. The Morrisons Superstore is an NAEI emitter and central to the zone which aids delivery. A gas boiler network exists at the Energie Fitness Dumbarton Centre, with Dumbarton Primary Substation also a potential heat resource.

**Fuel poverty:** 237 dwellings are estimated to be experiencing fuel poverty, which equates to 29% of domestic properties within the Zone, with 93 estimated to be experiencing extreme fuel poverty (11%).

**Constraints:** The A814 Glasgow Road is a potential major constraint isolating the St James Retail Park from the other four Anchor Loads and limiting any expansion North.



Alexandria Heat Network Zone



Legend:

Potential Heat Network Zone	LDP Site Locations	Railway Track
Anchor Load Classification:	SHM Energy Suppliers	Substation Capacity
500 - 1,000 MWh	SHM HeatNetworksData	Red
1,000 - 2,000 MWh	Major Roads	Amber
2,000 - 5,000 MWh	SHM Hot_Sed_Aquifers	Green
Over 5 GWh	OS GreenSpace	

Figure 0—10 Alexandria Heat Network Zone

**Opportunity category: High** – High proportion of publicly owned anchor loads, with the District Hospital a potential waste heat opportunity utilising the current system and/or core for a new low carbon network.

**Heat demand:** 8.8 GWh/year within identified potential zone, with 5.1 GWh/year of the heat demand from the four identified anchor loads.

**Zone area:** 30 hectares (29.3 kWh/m<sup>2</sup>)

**Count of anchor loads (>500 MWh/year heat demand):** 4

**Anchor loads:** Vale of Leven District Hospital; The Vale Centre GP Practice; Vale of Leven Swimming Pool; Lomond Galleries Shopping Centre.

**LDP sites:** The Heather Avenue LDP Site is located within 250m of the zone and consists of 84 resi units.

**Heat sources:** A Biomass Boiler is present within the Vale of Leven District Hospital with greenspace South in Christie Park potential for Ground Source Heat Pump boreholes. The zone is within an area of “Hot Sedimentary Aquifers”, which are potential good sources of geothermal energy. The Balloch Primary Substation is also a potential heat resource.

**Fuel poverty:** 106 dwellings are estimated to be experiencing fuel poverty, which equates to 29% of domestic properties within the Zone, with 40 estimated to be experiencing extreme fuel poverty (11%).

**Constraints:** No major constraints which impact heat network deployment are located within the Zone.

## Off gas grid

### Screening methodology

The analysis uses the domestic Home Analytics (v 3.8.1) dataset and the Scotland Heat Map 2019 “Geographic Boundaries” dataset to model off-gas grid properties within West Dunbartonshire to aid in generating initial Delivery Areas for low-regrets heat decarbonisation in off-gas grid areas. This approach focuses wholly on domestic properties.

Off-gas grid properties are properties which are not connected to the main gas network and therefore utilise a different fuel to supply their heating.

Off-gas grid domestic buildings are categorised into four principal categories for heat decarbonisation:

- **Category 0** - Already have a low carbon heating system (heat pumps or communal heating).
- **Category 1** - Immediate potential for heat pump retrofit (i.e. well insulated properties with a wet heating system).
- **Category 2** - Secondary potential for heat pump retrofit (i.e. in need of moderate fabric / heat distribution system upgrade to be heat pump ready).
- **Category 3** - Tertiary potential for heat pump retrofit (i.e. properties in need of significant fabric / heat distribution system upgrade to be heat pump ready) or those not suited to heat pump technology, with electric (storage or direct) or biomass likely to be the most viable decarbonisation technology.

Categorisation of domestic off gas grid properties based on existing building fabric, heritage status and heating systems can be found in the Appendix.

### Ranking

To enable the identification of the top five ranking low-regrets off-gas grid Data Zones for retrofit of low carbon heating within West Dunbartonshire, all Data Zones were ranked based upon aggregated counts of properties within each category and then weighted to generate an overall ranking.

The indicator weightings used within the zone ranking are as follows:

Table 0—2 Off Gas Grid DZ Indicator Weightings

	Category 1	Category 2	Category 3
Weighting (%)	60%	35%	5%

Category 1 has a higher weighting because these properties have an immediate potential for heat pump installation and decarbonisation, followed by Category 2 and Category 3 which have secondary and tertiary potential respectively. Category 0 properties however have not been given a weighting of as these are already classified as having a low carbon heating system (heat pumps or communal heating).

Following these weighted rankings, the top five ranking Data Zones were the following:

1. Lomond – 06
2. Singer and Clydebank South – 06
3. Drumry – 07
4. Bowling – 02

## 5. Whitecrook - 03

The locations of these zones are presented below:

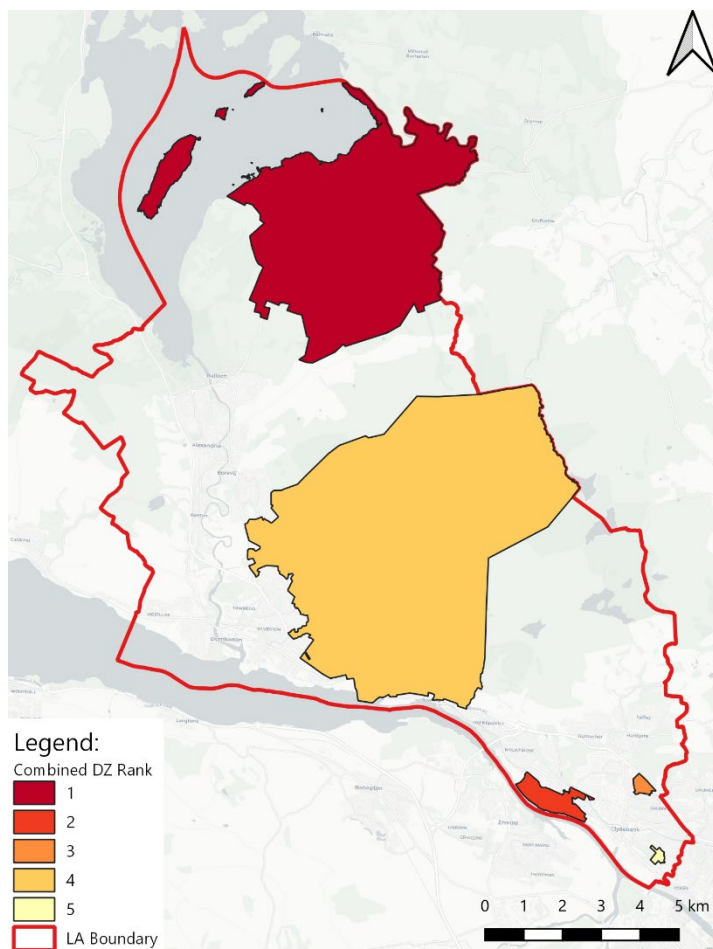


Figure 0—11 Off Gas Grid Top 5 Ranking Zones

### Finalised Strategic Zones

Unlike the Heat Networks Consideration, each Data Zone undergoes a second weighted ranking process encompassing additional indicators not specifically related to 'Off Gas' properties but relating to Fuel Poverty and the Scottish Index of Multiple Deprivation (SIMD) which impact West Dunbartonshire's roll-out of retrofitting within the local authority.

The additional indicator weightings used to define the final zone rankings are as follows:

Table 0—3 Off Gas Grid Final Strategic Zone Indicator Weightings

	Off Gas Rank (above)	Fuel Poverty Rank	SIMD Rank
<b>Weighting (%)</b>	66%	17%	17%

Following these additional weighted rankings, the top five ranking Data Zones were the following:

1. Singer and Clydebank South – 06
2. Drumry – 02
3. Leven – 01
4. Drumry – 07
5. Clydebank East – 03

The locations of these zones are presented below:

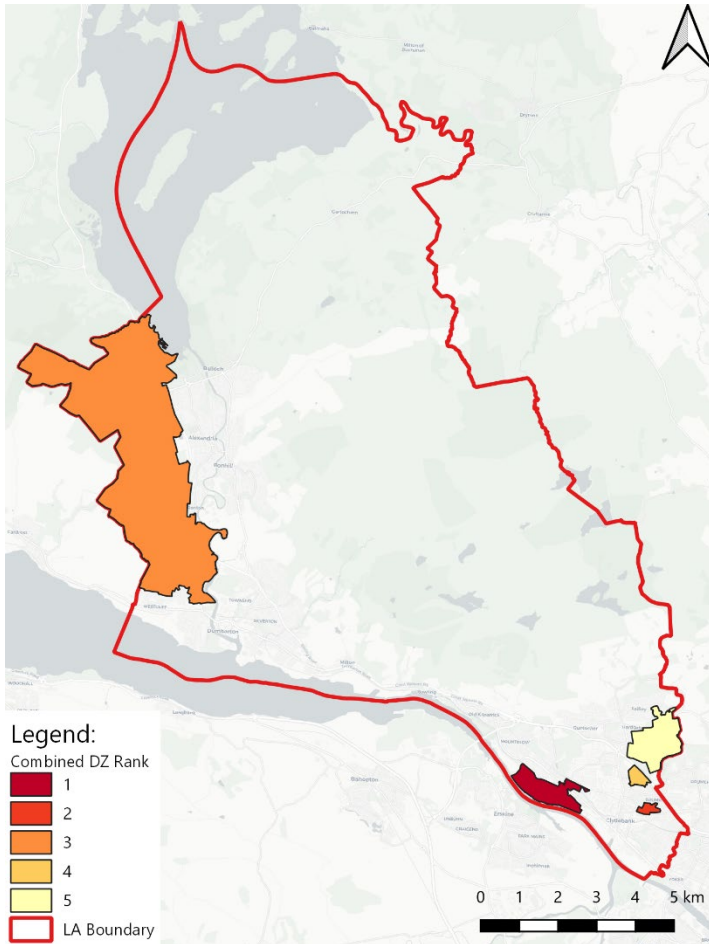


Figure 0—12 Off Gas Grid Final Strategic Zone

Table 0—4 Off Gas Strategic Zones summary table

	No. Off-gas grid Category 1	No. Off-gas grid Category 2	No. Off-gas grid Category 3	No. Fuel Poverty	SIMD Decile	Combined Ranking
<b>Singer and Clydebank South - 06</b>	1	210	11	190	2	1
<b>Drumry - 02</b>	1	47	4	186	1	2
<b>Leven – 01</b>	3	11	42	186	2	3
<b>Drumry – 07</b>	1	90	15	119	1	4
<b>Clydebank East - 03</b>	1	16	7	156	3	5

## On gas grid

### Screening methodology

The analysis uses the domestic Home Analytics (v 3.8.1) dataset and the Scotland Heat Map 2019 “Geographic Boundaries” dataset to model on-gas grid properties within West Dunbartonshire to aid in generating initial Delivery Areas for low regrets heat decarbonisation in off-gas grid areas. This approach focuses wholly on the domestic sector.

On-gas grid properties are properties which are connected to the main gas network and therefore utilise natural gas as the fuel to supply their heating.

On-gas grid domestic buildings are categorised into four principal categories for heat decarbonisation:

- **Category 0** - Already have a low carbon heating system (communal heating).
- **Category 1** - Immediate potential for heat pump retrofit (i.e. well insulated properties)
- **Category 2** - Secondary potential for heat pump retrofit (i.e. in need of moderate fabric / heat distribution system upgrade to be heat pump ready).
- **Category 3** - Tertiary potential for heat pump retrofit (i.e. properties in need of significant fabric / heat distribution system upgrade to be heat pump ready).

Categorisation of domestic on-gas grid properties is based on existing building fabric and heritage statuses can be found in the Appendix.

### Ranking

To enable the identification of the top five ranking low regrets on-gas grid Data Zones for retrofit of low carbon heating within West Dunbartonshire, all Data Zones were ranked based upon aggregated counts of properties within each category and then weighted to generate an overall ranking.

The indicator weightings used within the zone ranking are as follows:

*Table 0—5 On Gas Grid DZ Indicator Weightings*

	Category 1	Category 2	Category 3
Weighting (%)	60%	35%	5%

Category 1 has a higher weighting because these properties have an immediate potential for heat pump installation and decarbonisation, followed by Category 2 and Category 3 which have secondary and tertiary potential respectively. Category 0 properties however have not been given a weighting of as these are already classified as having a low carbon heating system (communal heating).

Following these weighted rankings, the top five ranking Data Zones were the following:

1. Bonhill – 02
2. Lomond – 02
3. Alexandria – 01
4. Dumbarton – 03
5. Dumbarton - 08

The locations of these zones are presented below:

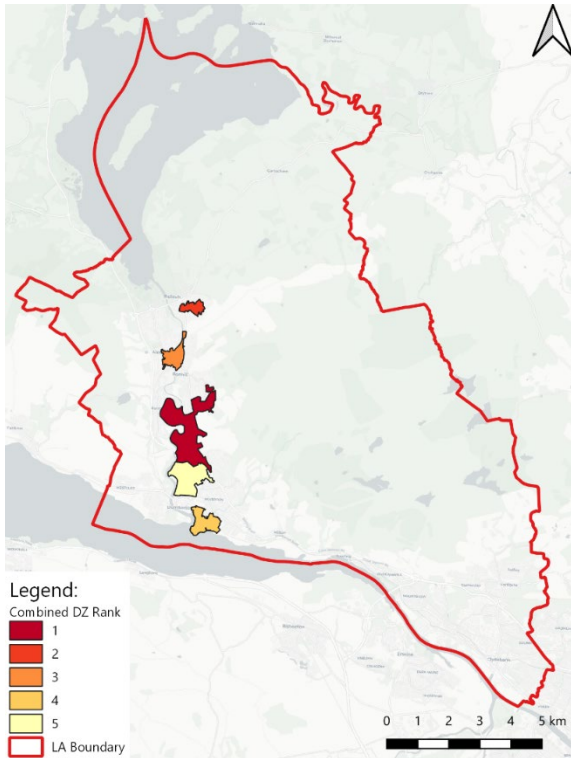


Figure 0—13 On Gas Grid Top 5 Ranking Zones

### Finalised Strategic Zones

Similar to the Off-Gas Grid Consideration, each Data Zone has undergone a second weighted ranking process encompassing additional indicators not specifically related to ‘On Gas’ properties but relating to Fuel Poverty and the Scottish Index of Multiple Deprivation (SIMD) which impact West Dunbartonshire’s roll-out of retrofitting within the local authority.

The additional indicator weightings used to define the final zone rankings are as follows:

Table 0—6 On Gas Grid Final Strategic Zone Indicator Weightings

	On Gas Rank (above)	Fuel Poverty Rank	SIMD Rank
<b>Weighting (%)</b>	66%	17%	17%

Following these additional weighted rankings, the top five ranking Data Zones were the following:

1. Lomond – 02
2. Alexandria – 01
3. Dumbarton – 05
4. Bonhill – 02
5. Dalreoch – 05

The locations of these zones are presented below:

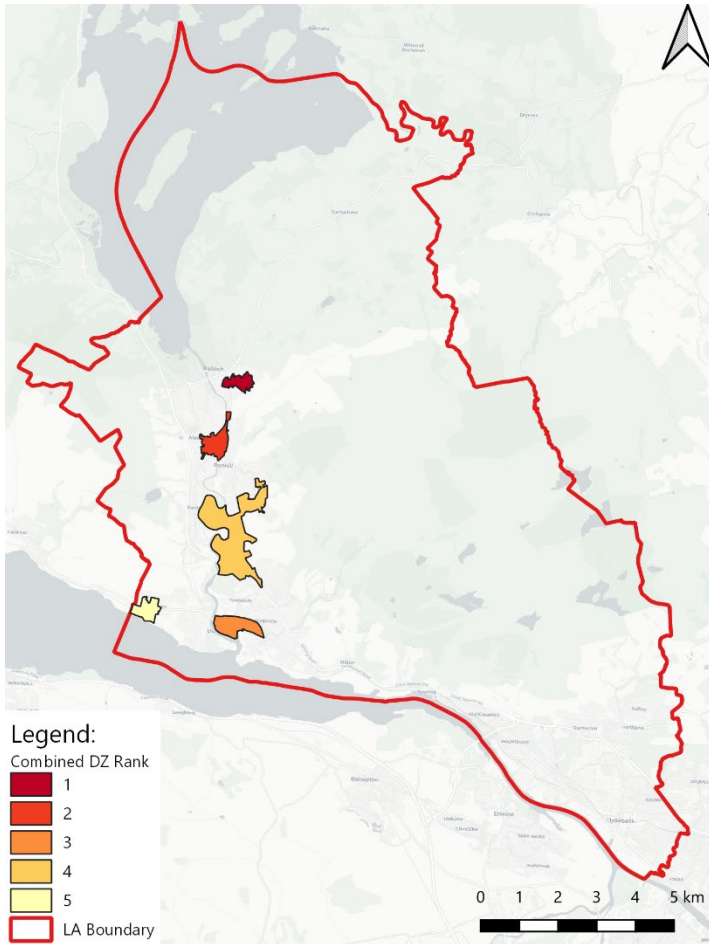


Figure 0—14 On Gas Grid Final Strategic Zone

Table 0—7 On Gas Strategic Zones summary table

	No. OnGG Category 1	No. OnGG Category 2	No. OnGG Category 3	No. Fuel Poverty	SIMD Decile	Combined Ranking
<b>Lomond – 02</b>	369	113	15	208	1	1
<b>Alexandria – 01</b>	295	98	240	224	2	2
<b>Dumbarton – 05</b>	323	72	289	289	3	3
<b>Bonhill – 02</b>	431	132	95	174	4	4
<b>Dalreoch – 05</b>	271	96	8	138	1	5

## Poor building energy efficiency and poor building energy efficiency as a driver of fuel poverty

### Screening methodology

The analysis uses the Home Analytics (v3.8.1) solely to model domestic properties within West Dunbartonshire for two LHEES Considerations surrounding property’s building fabric and poor energy efficiency, these considerations are:

- **Poor Energy Efficiency:** Identify possible locations where poor building energy efficiency exists across the local authority.

- **Poor Energy Efficiency as a Driver for Fuel Poverty:** Identify possible locations where poor building energy efficiency acts as a driver for fuel poverty and/or extreme fuel poverty.

For reference, the Default Indicators for the “Poor Energy Efficiency” and “Poor Energy Efficiency as a Driver for Fuel Poverty” LHEES Considerations are, with those selected listed:

- Single Glazing (Not Selected)
- Uninsulated Walls (**Selected**)
- Loft Insulation <100 mm (**Selected**)
- Fuel Poverty Probability (fuel bill >10% of income after housing) (**Selected**)
- Extreme Fuel Poverty Probability (fuel bill >20% of income after housing) (**Selected**)

The selected indicators align with WDC’s retrofit programme, whereby they have never included double glazing and focus on Enhanced Wall Insulation (EWI) (external) with loft insulation.

Poor building energy efficiency is a recognised factor that can contribute to fuel poverty, thus the removal of poor energy efficiency measures will impact and contribute to Scotland’s statutory target of no households being in fuel poverty as far as reasonably possible by 2040.

LHEES analysis identifies that West Dunbartonshire’s fuel poverty rates (2023) are as follows:

- Fuel Poverty Rate = **29%**
- Extreme Fuel Poverty Rate = **12%**

### Ranking

To enable the identification of the top five ranking low regrets Poor Building Energy Efficiency as a Driver for Fuel Poverty Data Zones for retrofit within West Dunbartonshire, all Data Zones were ranked based upon aggregated counts of properties within each category and then weighted to generate an overall ranking.

The indicator weightings used within the zone ranking are as follows:

*Table 0—8 Poor Building Energy Efficiency DZ Indicator Weightings*

	<100mm Loft Insulation	Uninsulated Walls	Combined Poor Energy Efficiency (left)	Fuel Poverty	SIMD
<b>Weighting (%)</b>	50%	50%	50%	25%	25%

For reference, the default weightings within the LHEES Practitioner Guidance for the Poor Building Energy Efficiency Consideration are, “Single Glazing = 33%”, “Uninsulated Walls = 33%” and “<100mm Loft Insulation”, however as follows to align with WDCs existing building energy efficiency retrofit schemes, ‘Single Glazing’ has been removed from the consideration.

Following these weighted rankings, the top five ranking Data Zones were the following:

1. Alexandria – 01
2. Leven – 01
3. Balloch – 01
4. Singer and Clydebank South – 02



## 5. Dumbarton - 05

The locations of these zones are presented below:

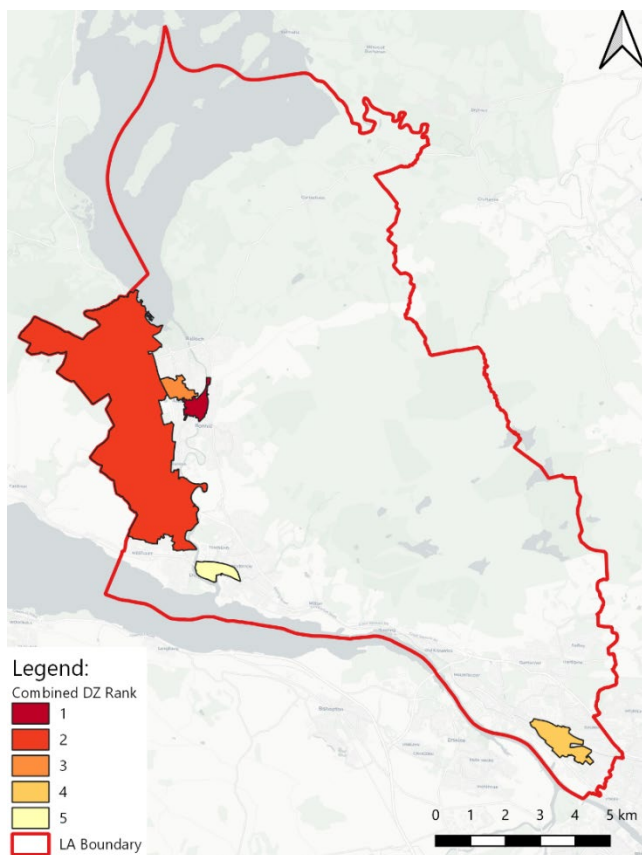


Figure 0—15 Poor Building Energy Efficiency as a Driver for Fuel Poverty Top 5 Ranking Zones

### Finalised Strategic Zones

Each Data Zone has undergone a second weighted ranking process encompassing additional indicators. These are as follows:

- Poor Building EE and FP – The combined ranking as presented above.
- Poor Building EE and EFP – A ranking generated from the same process as presented above however the Extreme Fuel poverty was ranked.
- Category 3 Properties – Due to these properties being classified as requiring significant building fabric retrofit for heat pumps for both off and on gas considerations.
- Heritage Buildings – A ranking based on low number of heritage buildings within (listed or within conservation areas) as planning implications make retrofitting these properties more difficult.

The additional indicator weightings used to define the final zone rankings are as follows:

Table 0—9 Poor Building Energy Efficiency as a Driver for Fuel Poverty Final Strategic Zone Indicator Weightings

	Poor Building EE and FP (above)	Poor Building EE and EFP	Category 3 Properties	Heritage Buildings
<b>Weighting (%)</b>	30%	30%	20%	20%

Following these additional weighted rankings, the top five ranking Data Zones were the following:

1. Singer and Clydebank South – 02
2. Drumry – 05
3. Alexandria – 01
4. Clydebank – 01
5. Balloch – 01

The locations of these zones are presented below:

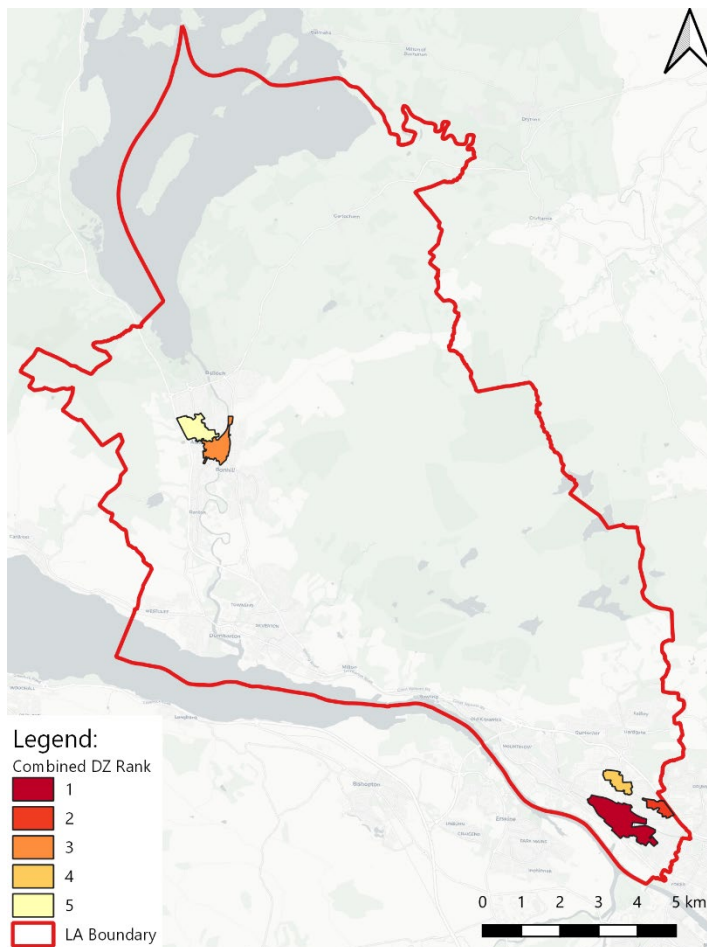


Figure 0—16 Poor Building Energy Efficiency as a Driver for Fuel Poverty Final Strategic Zones

Table 0—10 Poor Building Energy Efficiency as a Driver for Fuel Poverty Final Strategic Zones summary table

	No. <100mm Loft Insulation	No. Uninsulated Walls	No. Fuel Poverty	No. Extreme Fuel Poverty	SIMD Decile (of 10)	No. Cat. 3 Properties	No. Heritage Buildings	Combined Ranking
<b>Singer and Clydebank South – 02</b>	69	247	174	74	2	219	0	1
<b>Drumry – 05</b>	8	240	166	99	1	227	0	2
<b>Alexandria – 01</b>	103	325	224	66	2	244	5	3
<b>Clydebank – 01</b>	27	237	161	71	2	183	0	4

<b>Balloch – 01</b>	112	355	153	65	2	332	6	5
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## Mixed tenure and mixed use

### Screening methodology

The analysis uses the Home Analytics (v3.8.1) dataset and the Non-Domestic Analytics (v1.1) datasets to model properties within West Dunbartonshire where there are buildings of mixed-tenure, mixed-use and historic buildings (covering Listed buildings and Conservation Areas). Currently, this is covered by four focus areas:

- Mixed-tenure buildings
- Mixed-use buildings
- Listed buildings
- Conservation areas

For reference, Indicators for the mixed-tenure, mixed-use LHEES Consideration are:

- Mixed-tenure Flag (Mixed-tenure) – Domestic only (due to no data for non-domestic)
- Dwellings within buildings >1 (Mixed-use) – Domestic (a proxy used for domestic data for mixed-use is for where more than one unit is in the same building, e.g. a block of flats).
- Mixed-use Flag (Mixed-use) – Non-Domestic (more than one typology present within building, e.g. residential and café).

The analysis also focuses on properties located within Conservation Areas or those that have a Listed building status, for which the Indicators are:

- Within a Conservation Area – Domestic and Non-Domestic
- Listed buildings – Domestic only (due no data for non-domestic)

### Ranking

To enable the identification of the top five Data Zones for integration and further interrogation within an LHEES Delivery Plan, all 121 Data Zones within West Dunbartonshire have been ranked based upon aggregated counts of properties within each indicators, with a weighting per indicator rank also applied to generate an overall ranking.

The indicator weightings used within the zone ranking are as follows:

Table 0—11 Mixed Tenure Mixed Use Indicator Weightings

	Domestic Mixed Use	Domestic Mixed Tenure	Domestic Listed	Domestic Conservation Area	Non-Dom Mixed Use	Non-Dom Conservation Area
Weighting (%)	10%	30%	20%	15%	10%	15%

Following these weighted rankings, the top five ranking Data Zones were located in and are as follows:

1. Dumbarton – 05
2. Dalreoch – 01
3. Kilpatrick – 06
4. Dumbarton – 03
5. Dumbarton – 04

The locations of these zones are presented in Figure 0—12.

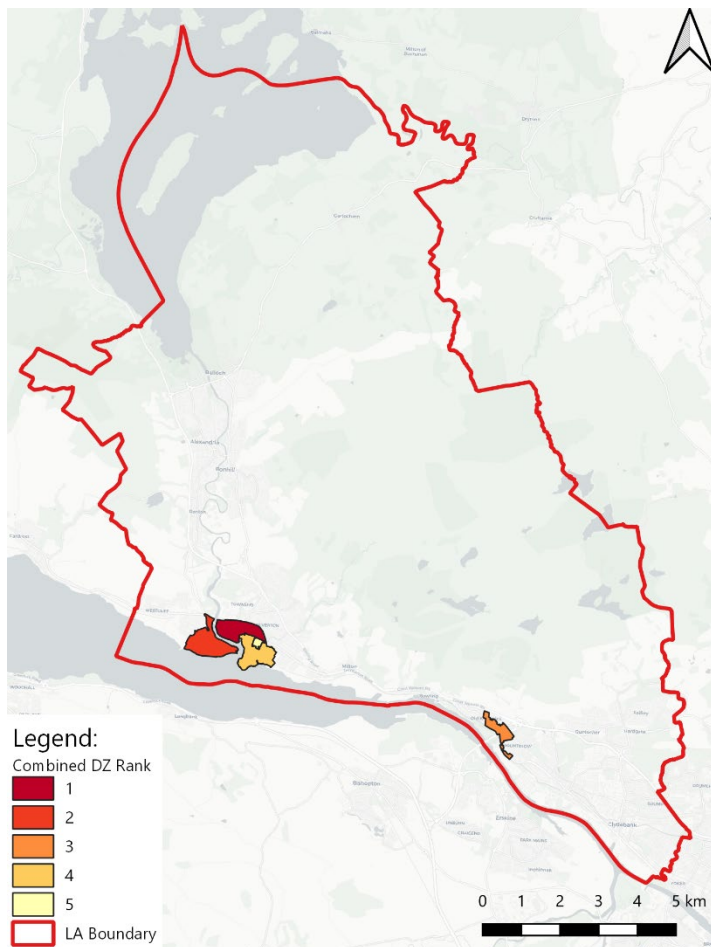


Figure 0—17 Mixed Tenure Mixed Use Top 5 Ranking Data Zones

Table 0—12 Mixed Tenure and Mixed Use Strategic Zones summary table

	Domestic Mixed Use	Domestic Mixed Tenure	Domestic Listed	Domestic Conservation	Non-Dom Mixed Use	Non-Dom Conservation Area	Combined Ranking
<b>Dumbarton – 05</b>	784	503	30	312	67	177	1
<b>Dalreoch – 01</b>	412	264	20	277	13	11	2
<b>Kilpatrick – 06</b>	300	154	3	60	9	2	3
<b>Dumbarton – 03</b>	427	246	0	77	4	4	4
<b>Dumbarton – 04</b>	268	258	0	332	12	14	5

## Summary of Strategy and next steps

The LHEES for West Dunbartonshire has identified a series of Strategic Zones within which action will be taken to deliver heat decarbonisation projects. The Strategic Zones selected provide high-level focus areas for further development.

Theme	Strategic Zone		Notes	
Heat networks	Clydebank	Clydebank	Developing the existing Queens Quay network into the wider Combined Heat Network Zone	
		Littleholm		
		Dalmuir		
		Kilbowie		
		Golden Jubilee Hospital		
	Dumbarton	Alexandria	New heat networks to deliver low carbon heat to homes and businesses in Dumbarton and Alexandria.	
Heat pump installations and energy efficiency interventions	On gas grid decarbonisation	Lomond 02		
		Alexandria 01		
		Dumbarton 05		
		Bonhill 02		
		Dalreoch 05		
	Off gas grid	Singer and Clydebank South 06		
		Drumry 02		
		Leven 01		
		Drumry 07		
		Clydebank East 03		
	Poor building energy efficiency as a driver of fuel poverty	Singer and Clydebank South 02		
		Drumry 05		
		Alexandria 01		
		Clydebank 01		
	Innovative project delivery mechanisms	Mixed tenure and mixed use buildings	Dumbarton 05	This LHEES Consideration highlights Strategic Zones in which novel ways of delivering heat decarbonisation may need to be tested – for example funding heat pumps and retrofits to buildings with a mixture of public and private tenure, and domestic and non-domestic usage.
			Dalreoch 01	
Kilpatrick 06				
Dumbarton 03				
Dumbarton 04				

### Heat networks

The LHEES has identified a total of 7 Heat Network Strategic Zones, with a combined heat demand of 162.6 GWh/year. Delivering these heat networks could therefore deliver 19% of the total heat demand for West Dunbartonshire, exceeding the 8% target for heat networks set nationally in the Heat Networks (Scotland) Act.

The Queens Quay network is already operational, and this Strategy identifies options for extension and interconnection with future heat networks in the southern part of the local authority. Some

work has already been undertaken to assess the business case for extension, however this Strategy identifies other options that may need further consideration. Further expansion potential of the network may be possible at Exxon and Carless industrial sites and will be reviewed as the sites progress.

For the new Heat Network Zones in Dumbarton and Alexandria, the first step will be to undertake preliminary feasibility studies to determine the potential financial viability of the schemes and to identify low carbon heat opportunities in the area.

### Heat pumps and energy efficiency

Delivering heat decarbonisation across the fifteen Strategic Zones under the On-Gas, Off-Gas and Energy Efficiency LHEES Considerations will aim to bring buildings in West Dunbartonshire up to the thresholds set by Scottish Government's Heat in Buildings Strategy.

All buildings in West Dunbartonshire will need to meet the relevant national targets, however the Strategic Zones inform the Council's activity and areas of focus and engagement as decarbonisation programmes are implemented.

The Delivery Areas, to be detailed as part of the LHEES Delivery Plan, set out at a granular level the streets and buildings that will be part of the first five years of the LHEES in West Dunbartonshire.

### LHEES Delivery Plan

Following adoption of the LHEES Strategy, the first LHEES Delivery Plan for West Dunbartonshire will be developed, put out to consultation, and published. This Delivery Plan will cover the first five-year period of LHEES action in West Dunbartonshire. This will focus on projects at a more granular scale, Delivery Area, which includes smaller clusters of buildings and individual streets.

Stakeholder engagement is a key theme through LHEES, and as part of the Delivery Plan a Monitoring and Evaluation Plan will be developed. This will set out how West Dunbartonshire Council will approach engagement with stakeholder groups – both those already consulted in developing the LHEES, and new stakeholders such as the Community Councils. This may also include more targeted awareness and engagement campaigns in the prioritised Strategic Zones and Delivery Areas. Through this engagement potential delivery mechanisms will be developed further: cross-authority collaboration; joint ventures; and commercialisation.

The other key theme tackled in the Delivery Plan is the near-term actions and opportunities to be set out for each of the Delivery Areas. This includes ensuring that LHEES actions align with, and complement, existing plans, programmes and activity around heat decarbonisation and energy efficiency in the local authority, and can draw on existing funding programmes and schemes.

### Challenges for Delivery

The delivery of heat network zones and energy efficiency retrofit across the entire local authority area is a vast undertaking and there are many challenges that West Dunbartonshire Council and our businesses and communities will have to address:

- Funding gap – financing large scale infrastructure and energy efficiency interventions is expected to have colossal costs. Funding from Scottish Government and other public funding sources needs to be maximised, private sector funding needs to be leveraged in, and support is required for local businesses and communities to ensure they access available funding streams;

- Viability – heat networks require electricity for operation, irrespective of the renewable heat source, and many potential developments will only be viable if electricity can be supplied directly from a renewable source;
- Retrofit – progress is being made in the retrofit of energy efficiency measures, however a more holistic ‘whole home’ approach is needed to maximise available funding and ensure a no regrets delivery;
- Skills gap – both within the Council and across the market there is a significant gap in skills and knowledge. We need to consider training for staff internally to ensure concerns about renewable technologies and procedures for retrofit heat and energy efficiency measures are addressed. There is a significant lack of skilled workforce within the green jobs sector and this requires our influence to boost education and training in green industries within the local authority area;
- Behaviour change – heat decarbonisation and energy efficiency retrofit can change the way that homes and buildings operate to ensure efficiency. Public acceptance of new technologies and behaviour change towards heating controls and operating systems will need a clear focus; and
- Just transition – when making evidence based decisions on the delivery of LHEES, there needs to be an assurance that we do not adversely affect our communities and businesses; the cost to achieve net zero should not burden those least able to pay.



# Appendix

## Heat Networks

### Indicators

	Theme:	Value:	Additional notes:
Strategic Zoning and Pathways	Linear Heat Density (LHD)	8,000 kWh/yr/m	Benchmarks of 4,000 are typically used for very rural local authorities i.e. Highlands, and 16,000 for dense urban areas i.e. Glasgow, with 8,000 for local authorities with a mix of urban and rural geographies.
	Anchor Load Heat Demand Threshold	500 MWh/yr	Heating demands from Scotland Heat Map 2019
	Anchor Load Threshold per Potential Zone	2 or more	
	Maximum Zone Radius	250 m	Maximum connection buffer after LHD analysis set to 250m, due to large heat demand data points within the Scotland Heat Map creating LHDs of 10s of kilometres which is technically unfeasible.
	Opportunity Category	Either High, Medium or Low	Manual assessment of initial viability of each zone, based upon heat demand, typology and ownership of loads and constraints.
	Fuel Poverty Household	fuel bill >10% of income after housing	
	Extreme Fuel Poverty Household	fuel bill >20% of income after housing	
	Zone Opportunity Category Rank	60% Weight	Used to rank and prioritise Strategic Zones for Delivery Area analysis (top 5 ranking taken forward to DLA analysis)
	Zone Anchor Load Count Rank	10% Weight	
	Zone Heat Demand Rank	10% Weight	
Zone Fuel Poverty Count Rank	20% Weight	A ranking of 1 was applied to each Zone with e.g. the highest heat demand, and 12 the lowest (due to 12 zones).	
Finalisation of Delivery Areas	Heat Demand Category	Low: 73 – 250 MWh/yr Medium: 250 – 500 MWh/yr = High: >500 MWh/yr =	Heat demands from Scotland Heat Map 2019  Within BEIS 2 <sup>nd</sup> National Comprehensive Assessment (NCA) threshold value of 73 MWh/year is considered the minimum for heat network connection  250-500 MWh/year is the middle threshold between the NCA and LHEES anchor load benchmarks  500 MWh/year is the LHEES threshold for anchor loads
	Heat Networks (Scotland) Act 2021 - national target of heat network supplied heat	2.6 TWh by 2027 6 TWh by 2030	
	Indicative heat network Linear Heat Density (LHD) viability threshold	4 MWh/year/m	

## Off Gas Grid

### Indicators

	Theme:	Value:	Additional notes:
Strategic Zoning and Pathways	Off- gas grid properties	Off Gas = Yes	Home Analytics (v 3.8.1) dataset
	Off-gas grid Category 0	1. Off Gas = Yes 2. Heating System = Heat pump or communal	Home Analytics (v 3.8.1) dataset Category 0 - Already have a low carbon heating system (heat pumps or communal heating).
	Off-gas grid Category 1	1. Off Gas = Yes 2. Category 0 = No 3. Listed = No 4. Conservation = No 5. Insulated Wall = Yes 6. Glazing = Double or Triple 7. Loft Insulation = No Loft or 99 mm+ 8. Heating Fuel = Biomass, Solid, LPG or Oil	Home Analytics (v 3.8.1) dataset Category 1 - Immediate potential for heat pump retrofit (i.e. well insulated properties with a wet heating system).
	Off-gas grid Category 2	1. Off Gas = Yes 2. Category 0, 1 = No 3. Uninsulated Wall and type solid brick or stone, system built or timber = No 4. Risk to narrow hard to insulate cavity = No	Home Analytics (v 3.8.1) dataset Category 2 - Secondary potential for heat pump retrofit (i.e. in need of moderate fabric / heat distribution system upgrade to be heat pump ready).
	Off-gas grid Category 2 Weighting	1. Off Gas = Yes 2. Category 2 = Yes 3. Glazing = Double or Triple = +20% 4. Insulated Wall = Yes = +20% 5. Loft Insulation = No Loft or 99 mm+ = +20% 6. Tenure = Housing Association or Local Authority = +20% 7. Heating Fuel = Oil or LPG = +20%	Home Analytics (v 3.8.1) dataset
	Off-gas grid Category 3	1. Off Gas = Yes 2. Category 0, 1, 2 = No	Home Analytics (v 3.8.1) dataset Category 3 - Tertiary potential for heat pump retrofit (i.e. properties in need of significant fabric / heat distribution system upgrade to be heat pump ready) or those not suited to heat pump technology, with electric (storage or direct) or biomass likely to be the most viable decarbonisation technology.
	Off-gas grid Category 3 Heat pump	1. Off Gas = Yes 2. Category 3 = Yes 3. Heating Fuel = LPG or Oil	Home Analytics (v 3.8.1) dataset
	Off-gas grid Category 3 Biomass or Electric	1. Off Gas = Yes 2. Category 3 = Yes 3. Heating Fuel <> LPG or Oil 4. Fuel = Electric = Electric 100% (ignore rest)	Home Analytics (v 3.8.1) dataset Category equals highest percentage weighting after exercise

	Theme:	Value:	Additional notes:
		5. Fuel = Biomass or Solid = Biomass 100% (ignore rest) 6. Property Type = Detached = Biomass +20% 7. Property Type = Semi Detached = Biomass +15% 8. Wall = Solid brick or stone = Biomass +15% 9. Property Type = Flats = Electric +20% 10. Urban Classification = Electric +10% 11. Insulated Walls = Yes = Electric +10% 12. Glazing = Double or Triple = +20%	
	Prioritisation Value	2+ Standard Deviations	Used to identify 100m x 100m areas of high counts of the selected indicator.
	Category 0 DZ Rank	0% Weight	Used to rank Strategic Zones.
	Category 1 DZ Rank	65% Weight	A ranking of 1 was applied to each Strategic Zone with e.g. the highest count of Off-gas grid Category 1 properties, and inverted for the lowest.
	Category 2 DZ Rank	30% Weight	
	Category 3 DZ Rank	5% Weight	Combined weighting is DZ Off-gas grid Rank
Generation of Initial Delivery Areas	Scottish Index of Multiple Deprivation (SIMD)	Decile of 1 falls within the most deprived 10% of DZs nationally.  While a decile of 10 means the DZ falls within the least deprived 10% of DZs nationally.	
	Fuel Poverty Indicator	Fuel Poverty Probability (fuel bill >10% of income after housing)	Home Analytics (v 3.8.1) dataset
	Off-gas grid DZ Rank	66% Weight	Used to rank and prioritise Strategic Zones. Top 5 ranking taken forward to Delivery Level Area Analysis.
	SIMD DZ Rank	17% Weight	
	Fuel Poverty DZ Rank	17% Weight	
Building level pathway assessment	Public property EPC targets	EPC B (SAP Score >= 81)	Based upon the Scottish 2021 Heat in Buildings Strategy and Energy Efficiency Standard for Social Housing (ESSH) target of EPC band B for social housing by December 2032.
	Private property EPC targets	EPC C (SAP Score >= 69)	Based upon the Scottish 2021 Heat in Buildings Strategy of new regulations for private rented properties to achieve EPC C or above by 2028
	Category 0	Exclude	
	Portfolio Energy Analysis Tool (PEAT) Key Details	Per property budget = Unlimited SAP Score = As above Target Heat Demand = N/A Target CO2 = N/A	

	Theme:	Value:	Additional notes:
		Costing Template = Standard EST costs 08/2023	
	PEAT Measures Automatic	Radiators and distribution system Underfloor Heating Storage heater distribution (No distribution system) Warm air distribution Modern storage heating controls Time and temperature zone control for radiator systems Time and temperature zone control for underfloor heating New hot water cylinder Solar hot water system Hot water from combi Electric immersion Hot water cylinder with electric immersion back-up Dual electric immersion	
	PEAT Measures Selected	Replace all low energy light bulbs Draught proofed windows Draught proofed external doors Loft insulation Cavity wall insulation Hard to treat cavity wall insulation Hard to treat cavity wall insulation - bead Loft insulation top-up Insulation for flat roofing Room in roof walls and sloping parts, 100mm insulation Internal wall insulation External wall insulation New insulated uPVC external doors A-rated glazing (uPVC) A-rated glazing (uPVC) for roof Solid floor insulation Suspended wooden floor insulation Air source heat pump Ground source heat pump Thermostatic radiator valves Thermostatic radiator valves, for use linked community system Thermostatic radiator valves, for flat rate community system Additional thermostatic controls, warm air systems Hot water cylinder insulation Hot water cylinder insulation and new hot water controls (cylinder stat and water heater timer) New hot water controls (cylinder stat and water heater timer) Insulating jacket, new hot water controls (cylinder stat and water heater timer) and pipework insulation Additional insulating jacket for existing foam insulated tank Additional insulating jacket for existing foam insulated tank and new hot water controls (cylinder stat and water heater timer) 2.5kW Solar panels (photovoltaic cells)	
PEAT Measures Excluded	Replace last 10 percent with CFL Replace last 20 percent with CFL Replace last 30 percent with CFL Replace last 40 percent with CFL Replace 50 percent with CFL Replace 40 percent with CFL Replace 30 percent with CFL		

	Theme:	Value:	Additional notes:
		Replace 20 percent with CFL Replace 10 percent with CFL Mains gas combi-condensing boiler Mains gas condensing boiler Oil combi-condensing boiler Oil condensing boiler Oil combi-condensing boiler (plus oil storage tank) Oil condensing boiler (plus oil storage tank) LPG combi condensing boiler LPG condensing boiler Biomass boiler (wood pellets) Pellet stove with back boiler, with DHW Modern storage heaters Mains gas condensing warm air system LPG condensing warm air system Secondary heating log stove 5.5kW mast mounted wind turbine	
	Flat – Manual External Wall Insulation	Manual EWI = (No. individual UPRNs within Parent UPRN) - PEAT EWI (for that parent UPRN)	
	Flat – Communal Heating	1 per Parent UPRN	Individual heat pump systems are not assigned to properties with a 'flat' tenure in PEAT.

### Categorisation

Category 0		
1	Heat pump or communal heating system	Already defined as low and zero emissions
Category 1		
1	Not Category 0	Avoids double counting
2	Not listed property	Additional considerations for planning
3	Not in a conservation area	Additional considerations for planning
4	Insulated walls	Thermal efficiencies needed for heat pumps
5	Double or triple glazing	Thermal efficiencies needed for heat pumps
6	Loft if present has 99 mm+ insulation	Thermal efficiencies needed for heat pumps
7	Wet system (biomass, solid, LPG or oil)	Significantly ease transition to heat pumps
Category 2		
1	Not Category 0 or 1	Avoids double counting
2	Not uninsulated solid brick or stone, system built or timber frame	Insulation is beyond a moderate upgrade
3	No risk of narrow hard-to-insulate cavity	Require more than a moderate upgrade to bring up to the required thermal efficiency
Category 3		
1	Not Category 0, 1 or 2	Avoids double counting properties

## On gas grid

### Indicators

	Theme:	Value:	Additional notes:
Strategic Zoning and Pathways	On-gas grid properties	Off Gas = No	Home Analytics (v 3.8.1) dataset
	On-gas grid Category 0	1. Off Gas = No 2. Heating System = Communal	Home Analytics (v 3.8.1) dataset  Category 0 - Already have a low or zero emissions heating system, properties that defined as on-gas and are connected to a heat network.
	On-gas grid Category 1	1. Off Gas = No 2. Category 0 = No 3. Listed = No 4. Conservation = No 5. Insulated Wall = Yes 6. Glazing = Double or Triple 7. Loft Insulation = No Loft or 99 mm+	Home Analytics (v 3.8.1) dataset  Category 1 - Considered to be highly suited to a heat pump solution minimal fabric upgrade required prior to heat pump installation and they have a wet heating system.
	On-gas grid Category 2	1. Off Gas = No 2. Category 0, 1 = No 3. Uninsulated Wall and type solid brick or stone, system built or timber = No 4. Risk to narrow hard to insulate cavity = No	Home Analytics (v 3.8.1) dataset  Category 2 - Secondary potential for heat pump retrofit (i.e. in need of moderate fabric / heat distribution system upgrade to be heat pump ready).
	On-gas grid Category 2 Weighting	1. Off Gas = No 2. Category 2 = Yes 3. Glazing = Double or Triple = +25% 4. Insulated Wall = Yes = +25% 5. Loft Insulation = No Loft or 99 mm+ = +25% 6. Tenure = Housing Association or Local Authority = +25%	Home Analytics (v 3.8.1) dataset
	On-gas grid Category 3	1. Off Gas = No 2. Category 0, 1, 2 = No	Home Analytics (v 3.8.1) dataset  Category 3 - Tertiary potential for heat pump retrofit (i.e. properties in need of significant fabric / heat distribution system upgrade to be heat pump ready).
	Prioritisation Value	2+ Standard Deviations	Used to identify 100m x 100m areas of high counts of the selected indicator.
	Category 0 DZ Rank	0% Weight	Used to rank Strategic Zones.  A ranking of 1 was applied to each Strategic Zone with e.g. the highest count of OnGG Category 1 properties, and inverted for the lowest.  Combined weighting is DZ OnGG Rank
	Category 1 DZ Rank	60% Weight	
	Category 2 DZ Rank	35% Weight	
Category 3 DZ Rank	5% Weight		

	Theme:	Value:	Additional notes:
Generation of Initial Delivery Areas	Scottish Index of Multiple Deprivation (SIMD)	Decile of 1 falls within the most deprived 10% of DZs nationally.  While a decile of 10 means the DZ falls within the least deprived 10% of DZs nationally.	
	Fuel Poverty Indicator	Fuel Poverty Probability (fuel bill >10% of income after housing)	Home Analytics (v 3.8.1) dataset
	OnGG DZ Rank	66% Weight	Used to rank and prioritise Strategic Zones.
	SIMD DZ Rank	17% Weight	
	Fuel Poverty DZ Rank	17% Weight	Top 5 ranking taken forward to Delivery Level Area Analysis.
Building Level Pathway Assessment	Public property EPC targets	EPC B (SAP Score >= 81)	Based upon the Scottish 2021 Heat in Buildings Strategy and Energy Efficiency Standard for Social Housing (ESSH) target of EPC band B for social housing by December 2032.
	Private property EPC targets	EPC C (SAP Score >= 69)	Based upon the Scottish 2021 Heat in Buildings Strategy of new regulations for private rented properties to achieve EPC C or above by 2028
	Category 0	Exclude	
	Portfolio Energy Analysis Tool (PEAT) Key Details	Per property budget = Unlimited SAP Score = As above Target Heat Demand = N/A Target CO2 = N/A Costing Template = Standard EST costs 08/2023	
	PEAT Measures Automatic	Same as per Off-gas grid	
	PEAT Measures Selected	Same as per Off-gas grid	
	PEAT Measures Excluded	Same as per Off-gas grid	
	Flat – Manual External Wall Insulation	Manual EWI = (No. individual UPRNs within Parent UPRN) - PEAT EWI (for that parent UPRN)	
Flat – Communal Heating	1 per Parent UPRN	Individual heat pump systems are not assigned to properties with a 'flat' tenure in PEAT.	

### Categorisation

Category 0		
1	Communal heating system	Already defined as low and zero emissions
Category 1		
1	Not Category 0	Avoids double counting

<b>2</b>	Not listed property	Additional considerations for planning
<b>3</b>	Not in a conservation area	Additional considerations for planning
<b>4</b>	Insulated walls	Thermal efficiencies needed for heat pumps
<b>5</b>	Double or triple glazing	Thermal efficiencies needed for heat pumps
<b>6</b>	Loft if present has 99 mm+ insulation	Thermal efficiencies needed for heat pumps
<b>Category 2</b>		
<b>1</b>	Not Category 0 or 1	Avoids double counting
<b>2</b>	Not uninsulated solid brick or stone, system built or timber frame	Insulation is beyond a moderate upgrade
<b>3</b>	No risk of narrow hard-to-insulate cavity	Require more than a moderate upgrade to bring up to the required thermal efficiency
<b>Category 3</b>		
<b>1</b>	Not Category 0, 1 or 2	Avoids double counting properties



## Poor building energy efficiency

Theme:	Value:	Additional notes:
<b>Strategic Zoning and Pathways</b>		
Poor Building Energy Efficiency Indicator	Uninsulated Walls	Home Analytics (v 3.8.1) dataset
Poor Building Energy Efficiency Indicator	Loft Insulation <100 mm (with Room in Roof (RIR))	Home Analytics (v 3.8.1) dataset
Prioritisation Value	2+ Standard Deviations	Used to identify 100m x 100m areas of high counts of the selected indicator.
Poor Building Energy Efficiency Probability	Probability Weighting = Loft Insulation (RIR) (50%), Uninsulated Walls (50%)	
<b>Strategic Zoning and Pathways – DZ Ranking</b>		
<100mm Loft Insulation with RIR DZ Rank	50% Weight	Used to rank Strategic Zones.  A ranking of 1 was applied to each Strategic Zone with e.g. the highest count of Uninsulated Walled properties, and inverted for the lowest.
Uninsulated Wall DZ Rank	50% Weight	Combined weighting is DZ Poor Building Energy Efficiency Rank

## Poor building energy efficiency as a driver of fuel poverty

Theme:	Value:	Additional notes:
West Dunbartonshire's fuel poverty rates (2023)	Fuel Poverty Rate = 29% Extreme Fuel Poverty Rate = 12%	
Fuel Poverty Indicator	Fuel Poverty Probability (fuel bill >10% of income after housing)	Home Analytics (v 3.8.1) dataset
Extreme Fuel Poverty Indicator	Extreme Fuel Poverty Probability (fuel bill >20% of income after housing)	Home Analytics (v 3.8.1) dataset
Scottish Index of Multiple Deprivation (SIMD)	Decile of 1 falls within the most deprived 10% of DZs nationally.  While a decile of 10 means the DZ falls within the least deprived 10% of DZs nationally.	
Prioritisation Value	2+ Standard Deviations	Used to identify 100m x 100m areas of high counts of the selected indicator.
Poor Building Energy Efficiency as a Driver for Fuel Poverty Probability	Probability Weighting = Loft Insulation (RIR) (25%), Uninsulated Walls (25%), Fuel Poverty Probability (50%)	
Poor Building Energy Efficiency as a Driver for Extreme Fuel Poverty Probability	Probability Weighting = Loft Insulation (RIR) (25%), Uninsulated Walls (25%), Extreme Fuel Poverty Probability (50%)	
Combined Poor Building Energy Efficiency DZ Rank	50% Weight	Used to rank Strategic Zones
Fuel Poverty DZ Rank	25% Weight	Combined weighting is DZ Poor Building Energy Efficiency as a Driver for Fuel Poverty Rank
SIMD DZ Rank	25% Weight	
Combined Poor Building Energy Efficiency DZ Rank	50% Weight	Used to rank Strategic Zones
Extreme Fuel Poverty DZ Rank	25% Weight	Combined weighting is DZ Poor Building Energy Efficiency as a Driver for Extreme Fuel Poverty Rank
SIMD DZ Rank	25% Weight	
Poor Building Energy Efficiency as a Driver for Fuel Poverty DZ Rank	30% Weight	Used to rank and prioritise Strategic Zones.  Top 5 ranking taken forward to Delivery Level Area Analysis.
Poor Building Energy Efficiency as a Driver for Extreme Fuel Poverty DZ Rank	30% Weight	

Theme:	Value:	Additional notes:
Off-gas grid Category 3 DZ Rank	10% Weight	
OnGG Category 3 DZ Rank	10% Weight	
Domestic Listed DZ Rank <b>(Inverted Rank)</b>	10% Weight (inverted rank to identify areas with low counts)	
Domestic Conservation Area DZ Rank <b>(Inverted Rank)</b>	10% Weight (inverted rank to identify areas with low counts)	
Public property EPC targets	EPC B (SAP Score >= 81)	Based upon the Scottish 2021 Heat in Buildings Strategy and Energy Efficiency Standard for Social Housing (ESSH) target of EPC band B for social housing by December 2032.
Private property EPC targets	EPC C (SAP Score >= 69)	Based upon the Scottish 2021 Heat in Buildings Strategy of new regulations for private rented properties to achieve EPC C or above by 2028
Fuel Poverty	Not in Fuel Poverty = Exclude	
Energy efficiency is not a driver of fuel poverty	In Fuel Poverty and achieve EPC target = Exclude	
Portfolio Energy Analysis Tool (PEAT) Key Details	Per property budget = Unlimited SAP Score = As above Target Heat Demand = N/A Target CO2 = N/A Costing Template = Standard EST costs 08/2023	
PEAT Measures Automatic	Same as per Off-gas grid	
PEAT Measures Selected	Same as per Off-gas grid However following removed: Air source heat pump Ground source heat pump	
PEAT Measures Excluded	Same as per Off-gas grid However following added: Air source heat pump Ground source heat pump	
Flat – Manual External Wall Insulation	Manual EWI = (No. individual UPRNs within Parent UPRN) - PEAT EWI (for that parent UPRN)	

## Mixed-tenure, mixed-use and buildings in Conservation Areas

<u>Theme:</u>	<u>Value:</u>	<u>Section:</u>	<u>Additional notes:</u>
<b>Strategic Zoning and Pathways</b>			
Domestic Mixed-Tenure Indicator	Mixed Tenure = Yes	Home Analytics (v 3.8.1) dataset	
Domestic Mixed-Use Indicator	Dwellings within buildings >1 = Yes	Home Analytics (v 3.8.1) dataset	
Domestic Listed Property Indicator	Listed = A, B, C	Home Analytics (v 3.8.1) dataset	
Domestic Conservation Area Indicator	Conservation Area = Yes	Home Analytics (v 3.8.1) dataset	
Non-Domestic Conservation Area Indicator	Conservation Area = Yes	Non-Domestic Analytics (v 1.1) dataset	
Non-Domestic Mixed-Use Indicator	1. Dwellings within buildings >1 = Yes 2. Typologies = >1	Non-Domestic Analytics (v 1.1) dataset	
Prioritisation Value	2+ Standard Deviations	Used to identify 100m x 100m areas of high counts of the selected indicator.	
<b>Strategic Zoning and Pathways – DZ Ranking</b>			
Domestic Mixed Use DZ Rank	10% Weight	Used to rank Strategic Zones  Combined weighting is DZ Mixed-Tenure, Mixed-Use and Historic Buildings Rank.	
Domestic Mixed Tenure DZ Rank	30% Weight		
Domestic Listed DZ Rank	20% Weight		
Domestic Conservation Area DZ Rank	15% Weight		
Non-Domestic Mixed-Use DZ Rank	10% Weight		
Non-Domestic Conservation Area DZ Rank	15% Weight		

**WEST DUNBARTONSHIRE COUNCIL****Report by Chief Officer: Roads & Neighbourhood****Infrastructure Regeneration and Economic Development Committee:****21 February 2024**

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**Subject: Net Zero Cooperation Agreement****1. Purpose**

- 1.1** The purpose of this report is to seek permission from Committee to enter a Net Zero Cooperation Agreement developed between West Dunbartonshire Council (The Council) and Glasgow City Council (GCC). The Agreement proposes to share expertise, skills, resources and infrastructure to help deliver our Climate Change Action Plans to deliver Net Zero ambitions.

**2. Recommendations**

- 2.1** It is recommended that Committee:

- (i) Approves the proposal to enter into the Net Zero Cooperation Agreement with Glasgow City Council;
- (ii) Notes that the agreement will be governed through the establishment of a Project Board;
- (iii) Notes that updates will be provided to committee within the Climate Change Action Plan annual monitoring report; and
- (iv) Authorises the Chief Officer Regulatory and Regeneration to enter the Net Zero Cooperation Agreement on such conditions as considered appropriate.

**3. Background**

- 3.1** The Council's Climate Change Strategy was approved in November 2020 in response to the global climate emergency, setting a long term target for West Dunbartonshire becoming Net Zero by 2045. The target set follows a similar trajectory to the national target set for Scotland as a whole.
- 3.2** The Council's Climate Change Action Plan approved in October 2021 sets out actions and objectives to transition towards Net Zero. In addition national guidance and legislation outlines targets and expectations for councils.
- 3.3** A key challenge in the delivery of the Strategy and Action Plan is the availability of resources, skills and financial implications.

**3.4** The Council's Climate Change Action Plan is monitored through an annual report to the IRED Committee.

#### **4. Main Issues**

**4.1** GCC and the Council share common objectives in relation to achieving Net Zero and meeting the targets placed on councils by the Scottish Government under the Climate Change (Scotland) Act 2009 as amended by the Climate Change (Emissions Reduction Targets) (Scotland) Act 2019.

**4.2** Both councils also have statutory duties in common including:

- provision of municipal waste management and recycling services (Environmental Protection Act 1990 and The Waste (Scotland) Regulations 2012),
- provision of heat network zoning (Heat Networks (Scotland) Act 2021),
- duty to secure best value (Local Government in Scotland Act 2003).

**4.3** Both councils have set out their approach to the Climate Emergency and this is detailed in their respective strategy documents; GCC's Climate Plan and the Council's Climate Change Strategy.

**4.4** There is an opportunity to develop a Cooperation Agreement to share expertise, skills, resources and infrastructure where collaboration would provide a mutual benefit to delivering our Climate Change Action Plans and transition to Net Zero.

**4.5** The Net Zero Cooperation Agreement sets out four initial areas of collaboration:

- Energy Sustainability
- Transition to Electric Fleet
- Waste Strategy
- Sustainable Transport

Working groups will be established for each of the four workstreams with Officers with appropriate skills, expertise and knowledge in attendance.

#### **4.6 Energy Sustainability**

Both councils are required to deliver a Local Heat Energy Efficiency Strategy (LHEES) which sets out plans and priorities for reducing energy demand, decarbonising heat and improving the energy efficiency of buildings. The following are examples of the activities that this workstream could explore:

- Identification of LHEES opportunities for sharing,
- Investigate district heating systems and renewables opportunities with a focus on cross boundary working and use of the River Clyde channel,

- Exploration of cross boundary measures to adapt to impacts of climate change including increased flooding, as well as developing plans to capture carbon emissions.

Early discussions are likely to focus on identifying how LHEES Priorities identified in the Councils' respective Strategies may be delivered through emerging delivery plans which seek to address demand and exploit opportunities irrespective of local authority boundaries.

#### **4.7 Transition to Electric Fleet and Wider Vehicle Electrification**

Both councils are required to develop a programme of transition to Ultra-Low Emission Vehicles or Zero Emission Vehicles as part of a fleet decarbonisation programme to comply with ambitious targets set by the Scottish Government. Actions could include:

- Developing the vehicle replacement programme to transition to ultra-low and zero emission fleet including identifying appropriate vehicle options for best value and operational service delivery,
- Upskilling and training of workforce to maintain and repair the electric fleet,
- Development of policies and incentives that encourage a change in employee travel behaviour to limit the use of fleet vehicles or private cars and review use of pool cars,
- Identification of fleet and public electric vehicle charging infrastructure requirements and locations for depot and shared charging hubs.

In respect of this limb of the cooperation agreement both councils currently participate in the wider City Region Electric Vehicle Charging Senior Officers Group, but under this agreement the two councils will additionally develop vehicle charging sites with mutual benefit for fleet operations and public charging opportunities.

#### **4.8 Waste Strategy**

Both councils have committed to The Charter for Household Recycling, and associated Code of Practice, designed to support the increase of quantity and quality of recyclables, provide access to and encourage use of recycling services for all residents and implement efficient service delivery.

Given this shared commitment, there is a clear opportunity to cooperate and shape strategy through knowledge transfer and the sharing of lessons learned in respect of waste management and recycling services, for example:

- Improving waste management and recycling services to meet statutory and legislative obligations,
- Sharing waste treatment and storage infrastructure to deliver best value, resilience and promote more sustainable services that are compliant with forthcoming legislation,
- Developing improved education and communications to support recycling and reuse of materials in accordance with the circular economy,
- Exploring use of technology to improve customer experience and operational efficiency.

An early outcome of this agreement will be the processing of West Dunbartonshire Council's Residual Waste at the Glasgow City facility (GREC) in Polmadie which as well as addressing West Dunbartonshire Council's residual waste requirements, will increase recycling of waste on a Council and City Region basis.

#### **4.9 Active and Sustainable Travel**

Ambitious targets are set out in the national and regional transport strategies and within the route map to achieve a 20% reduction in car kilometres by 2030 requiring the improvement of existing active travel path networks. With both councils being members of the Glasgow Regional Bus Partnership and the Clyde Metro Project Group. There is an opportunity to cooperate by:

- Sharing knowledge, expertise and skills to implement the design and delivery of sustainable and active travel infrastructure,
- Joint development of key boundary linkages such as quality bus corridors, cycle and walking routes and sustainable transport hubs,
- Identifying route options that improve connectivity and reduce social exclusion by improving access to education and employment,
- Promoting sustainable and active transport within the respective workforces and our communities through development of Active Travel Strategies and behavioural change initiatives.

#### **4.10 Governance**

A Project Board will oversee and resolve any issues arising during the life of the cooperation agreement. The board will be responsible for monitoring progress of the activities identified within the workstreams, reviewing



proposals for further collaborative activities and report annually to the respective councils.

The working groups will manage day-to-day matters.

#### **4.11 Funding and Costs**

Each council will make a financial contribution reflective of their own respective costs and expenses under the cooperation agreement.

The Project Board will assess the financial contribution for each financial year and this will be reported via the Council's financial reporting process with an annual financial position set out in the annual monitoring report.

#### **4.12 Agreement Duration and Termination**

The term of agreement will be until cancelled by either council with 12 months written notice.

### **5. People Implications**

- 5.1** There are no current people implications however as the workstreams develop proposals any people implications will be considered within that process.

### **6. Financial and Procurement Implications**

- 6.1** Both councils will benefit financially from the Cooperation Agreement. A financial contribution will be made by each council in relation to joint activities being undertaken following agreement on quantum and scope. The detail of this will be agreed by the Project Board and reported to Council within the Climate Change Action plan annual monitoring report.

It is too early to accurately estimate the quantum of financial benefit for both councils however it is anticipated that considerable financial as well as social benefit will accrue to both parties through common and complementary approaches to pursuing net-zero. The level of financial benefit for the Cooperation agreement as a whole will be monitored through the service financial monitoring reports and the Project Board and through an annual report to the Council.

- 6.2** Where potential future procurement opportunities arise from the Cooperation Agreement each requirement will be subject to a position paper outlining the project details with the relevant resource and a procurement strategy to consider the optimum route to deliver best value for both parties. Each procurement will be reported in line with the Council's standing orders and will follow relevant procurement regulations and be presented to the relevant Project Boards and future committees as required.

## **7. Risk Analysis**

**7.1** The Cooperation Agreement seeks to address the opportunities for inter-authority collaboration in a number of regulated areas which focus on the Net-Zero and Climate Change challenges which both councils face in the coming years. As the approach is innovative the councils have, as well as considering advice from its own internal legal services, sought external legal advice and consideration of all such advice has contributed to the approach adopted in the Cooperation Agreement and will influence the councils' approaches to advancing the agreement while minimising risk.

## **8. Environmental Sustainability**

**8.1** The Cooperative Agreement will support both councils to deliver the climate change requirements in relation to their respective action plans.

## **9. Equalities Impact Assessment (EIA)**

**9.1** Activities will be screened and an Equality Impact Assessment will be undertaken if required.

## **10. Consultation**

**10.1** Consultations have been undertaken with Finance, Legal and respective teams who are responsible for the delivery of the Climate Change Action Plan.

## **11. Strategic Assessment**

**11.1** This proposal will contribute to the following strategic priorities:

- Our communities are resilient and thriving;
- Our environment promotes a greener future.

Gail Macfarlane  
Chief Officer: Roads and Neighbourhood Services  
Date: 21 February 2024

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**Appendices:** None

**Background Papers:**

Report to West Dunbartonshire Council Dated 25 November 2020, Climate Change Strategy

Report to West Dunbartonshire Council Dated 27 October 2021, Climate Change Action Plan

[www.west-dunbarton.gov.uk/council/key-council-documents/plans-and-strategies/sustainable-development/climate-change](http://www.west-dunbarton.gov.uk/council/key-council-documents/plans-and-strategies/sustainable-development/climate-change)

EIA Screening (Number 969)

**Wards Affected:** All



**WEST DUNBARTONSHIRE COUNCIL****Report by Chief Officer: Resources****Infrastructure Regeneration and Economic Development Committee:****21 February 2024**

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**Subject: Lease of West Dunbartonshire Activity Centre, 73 Ardoch Crescent, Brucehill, Dumbarton G82 4EN**

**1. Purpose**

- 1.1** The purpose of this report is to seek Committee approval for West Dunbartonshire Council (the Council) to approve the lease of West Dunbartonshire Activity Centre (the centre) to West Dunbartonshire Gymnastics Club (the club).

**2. Recommendations**

- 2.1** It is recommended that the Committee:
- (i) Approves lease of West Dunbartonshire Activity Centre for a period of 10 years to West Dunbartonshire Gymnastics Club.
  - (ii) Authorises the Chief Officer Resources to conclude negotiations.
  - (iii) Authorises the Chief Officer Regulatory and Regeneration to conclude the transaction on such conditions as considered appropriate.

**3. Background**

- 3.1** In March 2023, as part of savings options put forward to address a £21million budget gap, members agreed to review community facility provision, across West Dunbartonshire. The review sought to reduce the provision to a level more consistent with neighbouring local authorities and address reduced usage post-pandemic. Transferring responsibility to manage and control community facilities to voluntary organisations through community lease arrangements would reduce the costs to West Dunbartonshire Leisure Trust and the Council.
- 3.2** Officers of the Council have been engaging with West Dunbartonshire Gymnastics Club with a view to them assuming full responsibility for the property when it closes. The club currently have a month to month licence of the premises which allows them use of the Hall 3 days per week at specific times contained within the terms and conditions.

#### **4. Main Issues**

- 4.1** The club was founded in 2011 and moved into the centre in 2018. They are fully committed to the local community.
- 4.2** The club offers a wealth of opportunities to local children by providing:
- Classes to children of all ages, 6 days per week throughout the year
  - Over 550 members per week use West Dunbartonshire Activity Centre as a gymnastics training facility.
  - Provision of competitive and non-competitive gymnastics classes.
  - Scholarship arrangements for local children who wouldn't otherwise be able to attend classes.
  - In partnership with the local Dunbartonshire Disability Sports Club and West Dunbartonshire Leisure Trust, they have created a weekly disability training session for young members and the wider community, with the ambition to create a display team.
  - A pathway for young gymnasts in the area to access new skills and training through their coaching pathway. Many of these young local volunteers develop into their coaching workforce within the club and become employed as WDGC coaches.
- 4.3** The club have created a strong bond with the wider West Dumbarton community. During the summer months they offer free gymnastics taster sessions for non-members and work together with West Dunbartonshire Leisure Trust to deliver Summer Camps during the school holidays. This helps to support working families by providing recreational activities for children throughout the summer period.
- 4.4** The market rent for lease has still to be agreed and this will take into account any work required by the group to the centre.
- 4.5** The centre was fitted out as a purpose built facility by the club in 2018 which they maintain and repair.
- 4.6** It is intended that any necessary statutory repairs required by the Council as landlord from will be completed prior to the date of entry.
- 4.7** West Dunbartonshire Leisure Trust Sports Development will continue to require access to the facility for 15 hours per week over 38 weeks. In addition, a further 77 hours for School Holiday Camps. The Club will benefit from an income associated with this usage which will assist with the anticipated running costs.
- 4.8** The offer of lease to the club is subject to agreement of the usual terms and conditions associated with a full repairing lease.
- 4.9** The club will work with West Dunbartonshire Leisure Trust in the coming months to ensure existing uses can be maintained.

**4.10** As part of the lease agreement the centre will continue to be used as a polling station.

## **5. People Implications**

**5.1** There are no significant people implications other than the resources required by Legal Services and Resources to negotiate and conclude the transaction..

## **6. Financial and Procurement Implications**

**6.1** The Council will benefit from an annual rent for the centre.

**6.2** West Dunbartonshire Leisure Trust will no longer incur resources in managing and maintaining the centre.

**6.3** West Dunbartonshire Leisure Trust will generate a revenue saving of approximately £142,258 per annum achieved via property and running costs.

**6.4** No financial outlays are required by the Council to facilitate this arrangement.

**6.5** There are no procurement implications arising from this report.

## **7. Risk Analysis**

**7.1** The lease will be subject to is subject to legal due diligence. There is a risk of the lease not proceeding due to any emerging issues during the diligence and leasing process. This is standard for any lease transaction.

## **8. Environmental Sustainability**

**8.1** An up to date asbestos report and other relevant safety documentation will be provided for the centre and passed to the club.

**8.2** Any refurbishment of the centre will require to be in line with current building standards.

## **9. Equalities Impact Assessment (EIA)**

**9.1** An Equality Impact Assessment is not applicable for the purpose of this report.

## **10. Consultation**

**10.1** Consultations have been undertaken with Finance, Regeneration and Regulatory, Greenspace, Citizen Culture & Facilities and West Dunbartonshire Leisure Trust.

## **11. Strategic Assessment**

- 11.1** By agreeing to this proposal WDLT will benefit from savings in relation to operating costs and maintenance.
- 11.2** The recommendation in this report supports the delivery of the Council Strategic Plan and in particular the achievement of the following priorities:
- Our Communities – Resilient and Thriving;
  - Our Council – Inclusive and Adaptable

Laurence Slavin  
Chief Officer: Resources  
Date: 13 February 2024

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**Appendices:** None

**Background Papers:** None

**Wards Affected:** Ward 3



**WEST DUNBARTONSHIRE COUNCIL****Report by Chief Officer: Resources****Infrastructure Regeneration and Economic Development Committee:****21 February 2024**

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**Subject : East End Football Pitch, Glasgow Road, Dumbarton G82 1RH****1. Purpose**

- 1.1** The purpose of this report is to seek Committee approval for West Dunbartonshire Council (the Council) to transfer East End Football Pitch and associated Pavilion, Glasgow Road, Dumbarton (the pavilion) to St Patrick's Former Pupils (the club).

**2. Recommendations**

- 2.1** It is recommended that the Committee:
- (i) Approve the lease of East End Football Pitch and associated Pavilion for a period of ten years to St Patrick's Former Pupils.
  - (ii) Authorise the Chief Officer, Supply, Property and Distribution to conclude negotiations.
  - (iii) Authorise the Chief Officer, Regulatory and Regeneration to conclude the transaction on such conditions as considered appropriate.

**3. Background**

- 3.1** In March 2023, as part of savings options put forward to address a £21million budget gap, members agreed to review community facility provision, across West Dunbartonshire. The review sought to reduce the provision to a level more consistent with neighbouring local authorities and address reduced usage post-pandemic. Transferring responsibility to manage and control community facilities to voluntary organisations through a combination of community asset transfers or community lease arrangements would reduce the costs to West Dunbartonshire Leisure Trust and the Council.
- 3.2** Whilst the Pavilion was not part of this initial review the Council continue to engage with groups across the authority to encourage transfer of ownership where possible either by disposal, community asset transfer or lease arrangements.

#### **4. Main Issues**

- 4.1 The Council have been working with the club continue to support other local football teams which will allow them access to the facility for training and matches with no change to their current bookings as users.
- 4.2 All users currently using the pitch will continue to be accommodated in their existing slots.
- 4.3 Presently, the club only require use of the pavilion and pitch for 2 hours on a Monday and Wednesday evening and on a Saturday afternoon. Therefore, there is ample opportunity for the facility to be used out with these times and the club will actively encourage new users.
- 4.4 The club are committed to helping local charities. They have recently raised £13,000 for the local food bank through a sponsored run and an annual golf day has also raised money for Enable and the Children's Hospice.
- 4.5 The club will continue with their fundraising efforts and will utilise the pavilion to host other activities such as a Gala Day to raise funds for kids football. They are keen to create a hub within at the pavilion for use by community groups.
- 4.6 It is anticipated that the lease of the pavilion will commence on 1<sup>st</sup> April 2024.
- 4.7 It is intended that any necessary statutory repairs required by the Council as landlord from will be completed prior to the date of entry.
- 4.8 The offer of lease to the club is subject to agreement of the usual terms and conditions associated with a full repairing lease.
- 4.9 The market rent for lease has still to be agreed and this will take into account any work required by the group to the centre.

#### **5. People Implications**

- 5.1 There are no significant people implications other than the resources required by Legal Services and Resources to negotiate and conclude the transaction.

#### **6. Financial and Procurement Implications**

- 6.1 The Council will benefit from an annual rent for the centre.
- 6.2 West Dunbartonshire Leisure Trust will no longer incur resources in managing and maintaining the centre.

- 6.3 West Dunbartonshire Leisure Trust will generate a revenue saving of approximately £28,000 per annum achieved via property and running costs.
- 6.4 No financial outlays are required by the Council to facilitate this arrangement.
- 6.5 There are no procurement implications arising from this report.

## 7. Risk Analysis

- 7.1 The asset transfer is subject to legal due diligence.

## 8. Equalities Impact Assessment (EIA)

- 8.1 An Equality Impact Assessment is not applicable for the purpose of this report.

## 9. Equalities Impact Assessment (EIA)

- 9.1 An Equality Impact Assessment is not applicable for the purpose of this report.

## 10. Consultation

- 10.1 Consultations have been undertaken with Finance, Greenspace, Citizen Culture & Facilities and West Dunbartonshire Leisure Trust.

## 11. Strategic Assessment

- 11.1 By agreeing to this proposal WDLT will benefit from savings in relation to operating costs and maintenance.
- 11.2 The recommendation in this report supports the delivery of the Council Strategic Plan and in particular the achievement of the following priorities:
  - Our Communities – Resilient and Thriving;
  - Our Council – Inclusive and Adaptable

Laurence Slavin  
Chief Officer: Resources  
Date: 13 February 2024

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**Appendices:** None

**Background Papers:** None

**Wards Affected:** Ward 3