



Renfrewshire Local Transport Strategy Strategic Environmental Assessment (SEA)

Scoping Report

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1. Introduction

1.1. Purpose of this Report

AECOM has been commissioned to undertake a Strategic Environmental Assessment (SEA) in support of the emerging Renfrewshire Local Transport Strategy (hereafter referred to as “the LTS”) on behalf of Renfrewshire Council. This Scoping Report presents the scoping information for the SEA process.

1.2. The Renfrewshire Local Transport Strategy

Renfrewshire’s LTS was published in 2007 and presented a 10-to-20-year vision for transport in the local authority area (shown in

Figure 1-1 below). After ten years had passed, an LTS Refresh was published, which provided an update on Renfrewshire Council's achievements against the actions set out 2007 LTS and set out a broad direction of travel for Renfrewshire for the next ten years.

As the adopted LTS is coming towards the end of its 10-to-20-year timeframe, the Council are now in the process of developing a new strategy that will cover the period 2025-2035.

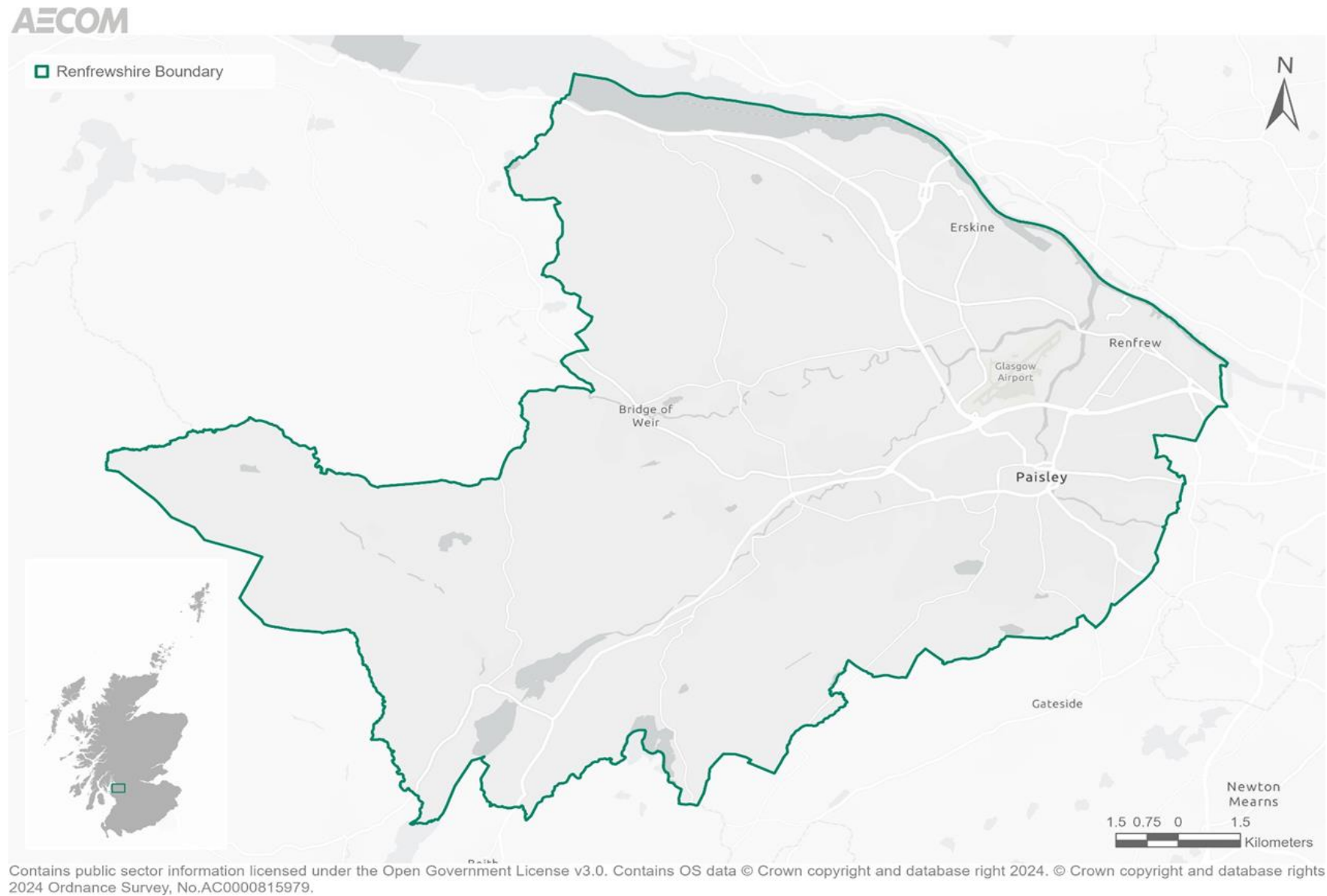
The emerging LTS for Renfrewshire will set the future direction for the Council's approach to the development and upkeep of the transport infrastructure and policy within the council area. The emerging LTS will also set out how the Council will contribute to the delivery of the obligations set out in the National and Regional Transport Strategies and other key policy drivers. To achieve this, transport policies and actions will be developed, and indicators identified to monitor the progress made on these actions.

A number of key tasks have been completed or are in the process of being completed (as of spring 2024):

- Analysis of data, undertaking a Policy Review and consultation.
- Identification of a Vision Statement, objectives and indicators.
- Generation of options and development of an Action Plan.
- Developing alternative approaches.
- Undertaking a full Strategic Environmental Assessment (SEA) and Integrated Impact Assessment.

The final LTS is programmed to be completed and launched in 2025.

Figure 1-1: Renfrewshire



2. SEA Explained

2.1. Introduction

This report has been prepared in accordance with the European Directive 2001/42/EC and section 15 of the Environmental Assessment (Scotland) Act 2005 (hereafter referred to as the “2005 Act”).

The 2005 Act requires all qualifying plans, programmes, and strategies (PPS) to undergo SEA. This provides a systematic process for identifying, reporting, and mitigating the environmental impacts of an emerging PPS.

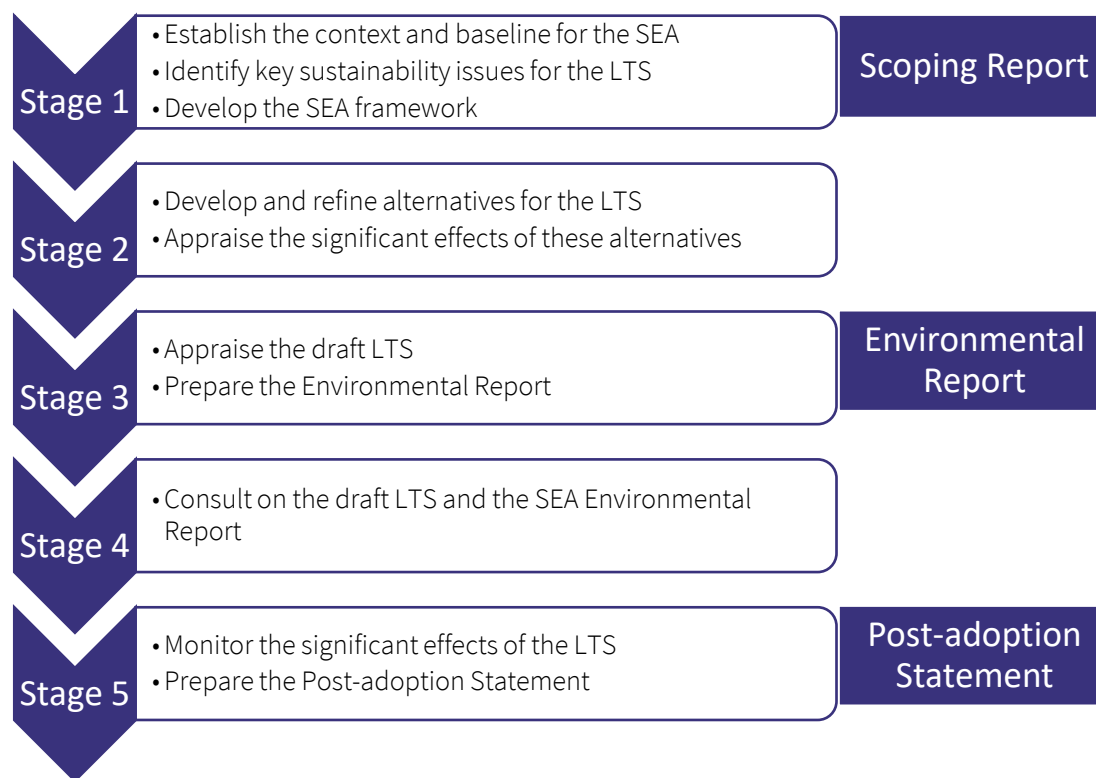
The LTS is a qualifying plan in accordance with Section 5(3) of the 2005 Act, and an SEA is therefore required.

2.2. Key Stages of the SEA Process

This SEA follows the process required by the SEA Regulations. There is guidance published by government on undertaking SEA, specifically ‘A Practical Guide to the Strategic Environmental Assessment Directive’; the ‘Practical Guide’. This sets out a five-stage process for undertaking SEA. This process, in conjunction with the SEA Regulations, guides this assessment.

The stages and outputs for the SEA are set out in **Figure 2-1** below. Scoping (the current stage) comprises Stage 1 below.

Figure 2-1: Key stages of the SEA for the LTS, and corresponding SEA outputs



2.3. Purpose of the Scoping Report

This Scoping Report has been prepared to seek the views of the Consultation Authorities (CAs). The CAs, as defined by the SEA Act, are: Historic Environment Scotland (HES), Scottish Environment Protection Agency (SEPA), and NatureScot.

The scoping process requires the Council (as the Responsible Authority) to consider in conjunction with the CAs, the scope and level of detail of the environmental assessment and an appropriate consultation period. The purpose of this report is to set out sufficient information on the LTS and its potential environmental effects to enables the CAs to form a view.

2.4. Structure of the Scoping Report

The information in this Scoping Report has been presented through eight SEA topics, which have been informed by the Environmental Assessment (Scotland) Act 2005. These are:

- Biodiversity, flora and fauna, and geodiversity.
- Climatic factors.
- Air quality and noise pollution.
- Soil and water resources.
- Cultural heritage.
- Landscape.
- Material assets; and
- Population and human health.

2.5. Scoping Report Chapters

This Scoping Report is presented through the following chapters:

- **Chapter 3: Links with other plans, programmes, and strategies** – a summary of other relevant plans, programmes and strategies that are likely to influence the LTS.
- **Chapters 4 – 11: Baseline and key sustainability issues** – an outline of the environmental, economic, and societal characteristics of Renfrewshire and key sustainability issues by SEA topic.
- **Chapter 12: SEA Framework** – sets out the objectives for each SEA topic which will inform the assessment of the draft LTS and reasonable alternatives.
- **Chapter 13: Next steps** – presents the next steps for the SEA process.

3. Links with other Plans, Programmes and Strategies

3.1. Introduction

This SEA must consider the relationships between the LTS and other relevant PPS and environmental objectives. In this context, the contents of the LTS will be partially influenced by, and will also have some influence over, objectives presented within other international, national, regional and local PPS of relevance for Renfrewshire (and Scotland as a whole).

This chapter therefore provides an overview of other relevant PPS that are likely to inform the development of the LTS.

3.2. International

- Ambient Air Quality and Cleaner Air for Europe Directive [2008/50/EC].
- Biodiversity Strategy for 2030.
- Birds Directive [2009/147/EC].
- Bonn Convention.
- Convention of Wetlands of International Importance Especially as Waterfowl Habitat (Ramsar Convention).
- European Convention on the Protection of the Archaeological Heritage (1992).
- European Landscape Convention.
- Habitats Directive [92/43/EEC].
- Intergovernmental Science-Policy Platform on Biodiversity and Ecosystem Services (IPBES) (2012).
- Kyoto Protocol UNFCCC (1997).
- Rio Declaration on Environment and Development (1992).
- SEA Directive [2001/42/EC].
- The Paris Agreement UNFCCC (2015).
- Waste Framework Directive.
- Water Framework Directive.
- World Heritage Convention.

3.3. National

- A Fairer, Greener Scotland: Programme for Government 2021-2022.
- Ancient Monuments and Archaeological Areas Act (1979).
- Cleaner Air for Scotland 2: Towards a Better Place for Everyone (2021).
- Climate Change (Emissions Reduction Targets) (Scotland) Act (2019).
- Climate Change Plan Update (2020).
- Climate Change Route Map (2022).
- Climate Change (Scotland) Act (2009).
- Community Empowerment (Scotland) Act (2015).
- Cycling Framework and Delivery Plan (2022-2030).
- Environment Act (2021).
- Environmental Noise (Scotland) Regulations (2006).
- Environment Strategy for Scotland 2020: Visions and Outcomes.
- Flood Risk Management (Scotland) Act (2009).
- Guiding principles on the environment: draft statutory guidance (2021).
- Habitats Directive and Habitats Regulations.
- Historic Environment Policy for Scotland 2019 (HEPS)
- Historic Environment Scotland Regulations.
- Land Reform (Scotland) Act (2016).
- Land Use Strategy for Scotland 2021-2026.
- Levelling Up and Regeneration Bill (2022).
- Marine (Scotland) Act (2010).
- National Parks Advice to Ministers (2023).
- National Parks (Scotland) Act (2000).
- National Performance Framework (2022)
- National Planning Framework 4 (NPF4).
- National Transport Strategy 2 (2020).
- Nature Conservation (Scotland) Act (2004).
- NatureScot Guidance (various).
- Net Zero Strategy (2021).
- Offshore Marine Regulations (2017).
- Our Past, Our Future: Strategy for Scotland's Historic Environment (2023).
- Our Place in Time: The Historic Environment Strategy for Scotland (2014).
- Planning (Listed Buildings and Conservation Areas) (Scotland) Act (1997).
- Planning (Scotland) Act (2019).

- River Basin Management Plan for Scotland 2021-2027.
- Scotland's Climate Change Adaptation Programme.
- Scotland's Forestry Strategy 2019-2029.
- Scotland's National Peatland Plan (2015).
- Scotland's Zero Waste Plan (2010).
- Scottish Biodiversity Strategy to 2045.
- Scottish Environment Protection Agency (SEPA) Regulations.
- Scottish National Marine Plan (2015).
- Scottish Soil Framework (2009).
- State of Nature Scotland Report (2019).
- The Birds Directive and Wildlife and Countryside Act (1981).
- The Scottish Government's Vision for Agriculture (2022).
- The Water Environment (Controlled Activities) (Scotland) Regulations (2011).
- UK Climate Change Risk Assessment (2022).
- Updating the Climate Change Plan 2018-2032.
- Water Environment and Water Services (Scotland) Act (2003).

3.4. Regional

- Central Scotland Green Network.
- Clydeplan Forestry and Woodland Strategy.
- Clydeplan Strategic Development Plan.
- Glasgow and Clyde Valley Green Network.
- Glasgow City Region's Climate Adaptation Strategy and Action Plan (2020-2030).
- SNH's Landscape assessment for Glasgow and the Clyde Valley
- Regional Transport Strategy for Strathclyde (2023).

3.5. Local

- Renfrewshire Local Development Plan (2021).
- Renfrewshire Contaminated Land Strategy (2022).
- Outdoors for You: Renfrewshire Outdoor Access Strategy 2016-2026.
- Renfrewshire's Plan for Net Zero.
- Renfrewshire Local Transport Strategy (2007 and 2017).

- Outdoors for You: Renfrewshire Outdoor Access Strategy (2016-2026).
- Renfrewshire's Economic Strategy 2020-2030.
- Renfrewshire Council Air Quality Action Plan (2019).
- Renfrewshire Education Improvement Plan.
- Renfrewshire Cycling Strategy 2016-2025.
- Renfrewshire Community Plan 2017 to 2027.
- Renfrewshire LDP Landscape Assessments (2011).
- Renfrewshire Environment, Housing & Infrastructure Services Service Improvement Plan (2023 – 26).
- Renfrewshire Biodiversity Action Plan (2024).
- Renfrewshire State of the Environment Report (2011) (SER).

4. Biodiversity, Flora and Fauna, and Geodiversity

4.1. Focus of the SEA Topic

- Biodiversity designations.
- Key habitats and species.
- Ecological networks.
- Geological resources.

4.2. Summary of Current Baseline

4.2.1. Designated Sites

The Convention on Wetlands of International Importance (the Ramsar Convention) is the intergovernmental treaty that provides the framework for the conservation and wise use of wetlands and their resources. The convention was adopted in 1971 and came into force in 1975. In the UK, the initial emphasis was on selecting sites of importance to water birds, and consequently, many Ramsar Sites were also designated as Special Protection Areas (SPAs).

SPAs are areas of the most important habitat for rare (listed on Annex I to the Directive) and regularly occurring migratory birds within the European Union. SPAs are classified under the EC Birds Directive, and together with Special Areas of Conservation (SACs), form the Natura 2000 network. SACs are areas which have been identified as best representing the range and variety within the European Union of habitats and (non-bird) species listed on Annexes I and II to the Directive. SACs in terrestrial areas and marine areas out to 12 nautical miles are afforded protection through the Conservation (Natural Habitats, &c.) Regulations 1994 (as amended).

Prior to the UK's exit from the European Union (EU), Scotland's SAC and SPA were part of a wider network of such sites known as the 'Natura 2000' network. They were consequently referred to as 'European sites'. Now that the UK has left the EU, Scotland's SACs and SPAs are no longer part of the Natura 2000 network but form part of a UK-wide network of designated sites referred to as the 'UK site network'. However, it is current Scottish Government policy to retain the term 'European sites' to refer collectively to SAC and SPA

(including any which are designated following the UK's exit from the EU) (Scottish Government, 2020).

A summary of the European and nationally designated sites located within Renfrewshire is provided below and shown in **Figure 4-1** at the end of this chapter. It is important to note that in some cases, sites might share overlapping boundaries if they have multiple designations. Locally important sites are shown in **Figure 4-2**.

4.2.2. Ramsar Sites

There is one Ramsar site within Renfrewshire: Inner Clyde Estuary (found in the northern region of the council area). It is a long, narrow, and heavily industrialised estuary on the west coast of Scotland – stretching 20km from Newshot Island to Ardmore Bay on the northern edge, and to Neward Castle on the southern edge. It is formed of tidal mudflats, semi-natural and unmanaged coastal vegetation, and saltmarsh. These habitats support a number of invertebrate species – the composition of which has been changing due to recent improvements in the water quality of the estuary. Notable species present within the designated area include Great cormorants, Common eiders, Slavonian grebe, Common goldeneye, Eurasian oystercatcher, and Common greenshank. It is also an important site for Common redshank populations ([Information Sheet on Ramsar Wetlands](#)).

4.2.3. Special Protection Areas

There are three SPAs within Renfrewshire.

- **Black Cart SPA** – this site totals 55.5 hectares and is located inland in the north-eastern region of Renfrewshire, north of Glasgow airport. It is an important site for Whooper swans, comprised of inland water bodies (standing water and running water) (37.2% of the area), and improved grassland (62.8% of the area). There are a number of threats to the site, including hunting and the collection of wild animals (this includes damage caused by game as well as accidental capture and the removal of species for collections), renewable abiotic energy use, the installation of utility and service lines, changes in biotic conditions, and non-specified pollution ([Standard Data Form for Black Cart \(UK9003221\)](#)).
- **Inner Clyde Estuary SPA** – partially within Renfrewshire, this site shares the same designated area as the Inner Clyde Estuary Ramsar and is located in the northern

region of Renfrewshire. Totalling 1813.72 hectares, the SPA is an important site for Common redshanks. It is comprised of: tidal rivers, estuaries, mud flats, sand flats and lagoons (including saltwork basins) environments (96.4% of the area); and salt marshes, salt pastures, and salt steppes environments (3.6% of the area). Changes to abiotic conditions within and in proximity to the SPA is a threat to the condition and quality of the designation ([Standard Data Form for Inner Clyde Estuary \(UK9003061\)](#)).

- **Renfrewshire Heights** – partially overlapping Renfrewshire in the western extent, this designation totals 8940.8 hectares, and is an important site for Hen harriers. Habitats include: alpine and sub-alpine grassland (9.3% of the area); inland rocks, screes, sands, permanent snow and ice (0.1% of the area); bogs, marshes, water fringed vegetation and fens (84.9% of the area); urban / developed areas (0.1% of the area); improved grassland (0.2% of the area); and heath, scrub, maquis and garrigue, and phygrana (5.4% of the area). Negative impacts to the SPA include grazing, ecosystem modifications, hunting and the collection of wild animals (this includes damage caused by game as well as accidental capture and the removal of species for collections), and interspecific faunal relations ([Standard Data Form for Renfrewshire Heights \(UK9020295\)](#)).

4.2.4. Special Areas of Conversation

There are no SACs within Renfrewshire. However, there are three SACs within 8km south of the council area boundary – Bankhead Moss, Beith; Cockinhead Moss; and Dykeneuk Moss.

4.2.5. Sites of Special Scientific Interest

There are eleven Sites of Special Scientific Interest (SSSIs) either wholly or partially within Renfrewshire. These are presented on [Renfrewshire Council's website](#).

- **Barmufflock Dam** - a basin mire with a range of habitats, including open mire, swamp and wet woodland.
- **Black Cart** - roost site and foraging area for wintering Icelandic whooper swans.
- **Castle Semple and Barr Lochs** - lowland wetland and fringing woodland which provide nesting and wintering habitat for a wide range of bird species.
- **Clochodrick Stone** – a large glacial erratic boulder.
- **Dargavel Burn** - active area of valley mire.
- **Formakin** - a dry herb-rich grassland.

- **Glen Moss** - a mixed basin and valley mire with important peatland habitat.
- **Inner Clyde** - intertidal mudflats and saltmarsh used as feeding grounds by waterfowl.
- **Shovelboard** - a small basin mire with a drier central area.
- **Renfrewshire Heights** - a breeding area for hen harriers.
- **Whinnerston** – comprised of two areas of unimpaired natural grassland. The grassland's one of the largest and best examples of this type of habitat in West Central Scotland.

4.2.6. National Nature Reserves

There are no National Nature Reserves within Renfrewshire.

4.2.7. Local Nature Reserves

[Local Nature Reserves](#) (LNRs) are areas of natural heritage that are at least locally important. There are 75 LNRs in Scotland, usually close to towns and cities. Local authorities select and designate LNRs under Section 21 of the [National Parks and Access to the Countryside Act 1949](#) (as amended). There are three LNRs within Renfrewshire:

- **Paisley Moss** – first designated in 1993, the site comprises 4.75 hectares of wetland, scrub and grassland habitats which provide homes for several scarce plants and vulnerable amphibian populations, as well as aquatic and terrestrial vertebrates. It is located between Glasgow airport and the M8 motorway.
- **Jenny's Well** – first designated in 1995, it is a former quarry and landfill site spanning 10.7 hectares. It is now a mosaic of grassland, scrub and woodland habitats along White Cart Water – supporting a range of birds, wildflowers and uncommon species like kingfishers and otters.
- **Durrockstock Park** - designated in 2007, the site is 6.6 hectares in size and focuses on a former reservoir which now provides habitat for waterfowl, toads and wide variety of wetland plants. The site also contains a variety of woodland and grassland habitats.

4.2.8. Geological Conservation Review Sites

[Geological Conservation Review](#) (GCR) sites contain geological and geomorphological features of national and international importance. They are selected through a process known as the Geological Conservation Review. There are nearly 900 GCR sites in Scotland.

Most of the GCR sites have statutory protection through designation as geological features in SSSIs; however, more than 200 GCR sites, (known as ‘unnotified GCR sites’) have no protective SSSI designation status. Significant areas of almost 30 further GCR sites also have no protective SSSI designation status. National Park authorities and some local authorities, therefore, treat unnotified GCR sites as ‘candidate SSSIs’ and afford them the same protection as SSSIs. Some unnotified GCR sites are also Local Nature Conservation Sites. As such, they are at least given the same protection as locally important sites – though they are actually nationally or internationally important. All other unnotified GCR sites have no statutory protection.

There is one GCR within Renfrewshire – the Bridge of Weir, located between Bridge of Weir, Crosslee and Craigends.

4.2.9. Country Parks

[Country parks](#) have been established in many parts of Scotland. Local authorities may designate country parks where they see a need, using powers under Section 48 of the Countryside (Scotland) Act 1967. Local authorities provide and manage most of Scotland’s 40 country parks. There are three country parks partially or wholly within Renfrewshire, which are:

- Muirshiel – located north of Cample Burn in the western extent of Renfrewshire.
- Castle Semple – located adjacent to Lochwinnoch.
- Gleniffer Braes – located south-east of Johnstone.

4.2.10. Habitats, Species and Green Networks

[Habitat networks](#) can help to make habitats more resilient and assist species’ survival in a fragmented landscape and changing climate. A habitat network is one that is focused on the connectivity of a single habitat or species. Meanwhile, a green network focuses on

delivering social and economic benefits as well as environmental improvements. An integrated habitat network combines the needs of several habitats and species.

Renfrewshire's habitats and opportunity areas are shown in

Figure 4-3 at the end of this chapter.

[The Central Scotland Green Network](#) (CSGN) habitat connectivity map shows that the bog and heath networks are prevalent on the council area's western and south-eastern boundary, which is also linked to the wetlands network. Grasslands and woodlands are dispersed across the entire council area.

[The NBN Atlas Scotland](#) combines information about habitats (including ancient woodland) and species from multiple sources in a single location, including data from the Glasgow Museums Biological Records Centre, which is Renfrewshire's Local Environment Record Centre. It allows users to interrogate species records, habitat, climate and soil information, and geographical boundaries using mapping tools. The tool produces a number of results for Renfrewshire, which will be explored in more detail during the next stage of the SEA process (the Environmental Report).

Ecological features of interest, such as habitats, which might have the potential to be impacted by transport infrastructure include road verges, trees, and hedgerows. As these features play an important role in providing connectivity corridors and refuges for migrating and foraging species within Renfrewshire, it will be important for the LTS to consider the potential implications on such features within the plan making process.

Habitat fragmentation occurs when larger areas of habitat are split into separate, smaller areas. This splitting of larger areas of habitat into separate, smaller ones adversely affects wildlife in a number of ways. How easily a species can spread to new areas will affect how sensitive it is to habitat fragmentation. The overall ability of a species to disperse depends on a range of factors such as its mobility and reproductive ability. Habitat fragmentation is likely to have more of an effect on species with low dispersal ability.

Invasive non-native species (INNS) are a significant driver of biodiversity decline in Renfrewshire by outcompeting native flora and fauna, disrupting ecosystems, and altering habitats. These ecological disruptions weaken natural habitats, making them less resilient to other pressures such as climate change and pollution. Without effective management and control, INNS will continue to drive biodiversity loss in Renfrewshire's ecosystems.

4.2.11. Ecosystem Services

Healthy ecosystems, made up of native plants and animals, provide important benefits that support human well-being and the integrity of the environment. These benefits include provisioning services, such as clean air, fresh water, and food; regulating services, like climate regulation, flood mitigation, and disease control; supporting services, such as soil formation, nutrient cycling, and pollination, which sustain agricultural productivity; and cultural services, including recreation, spiritual enrichment, and a sense of place. Beyond these functional benefits, biodiversity holds intrinsic value, independent of its usefulness to humans.

Therefore, in Renfrewshire, safeguarding biodiversity helps maintain vibrant, resilient natural landscapes that support both wildlife and local communities.

4.3. Summary of Future Baseline

Ecological and geological resources will potentially face increasing pressures from future transport development in Renfrewshire. This may include (but is not limited to) the loss of habitats and impacts on biodiversity networks, and potential impacts on geological resources linked to erosion and disturbances. The potential impacts on biodiversity from climate change are likely to include changes in habitat, changes in species distribution, changes in hydrology, and changes in ecosystem functioning.

European and nationally designated sites are particularly sensitive to air quality issues. In this respect, exceeding critical values for air pollutants may result in changes to the chemical status of habitat substrate, accelerating or damaging plant growth, altering vegetation structure and composition and thereby affecting the quality and availability of nesting, feeding or roosting habitats. Additionally, the nature, scale, timing, and duration of some human activities can result in the disturbance of species at a level that may substantially affect their behaviour, and consequently affect the long-term viability of their populations.

To maintain and improve the condition of biodiversity in the future, it will be important to not only protect and enhance important habitats but the connections between them. This should work alongside delivering positive effects for biodiversity. It will be crucial to effectively coordinate the delivery of new transport infrastructure to ensure that opportunities to improve green infrastructure and ecological corridors are maximised within Renfrewshire.

Scotland will not be subject to the mandatory requirements for Biodiversity Net Gain (BNG) as required in England under the Environment Act (2021), but under policy 3b of National Policy Framework 4 (NPF4), Environmental Impact Assessment schemes will need to achieve significant biodiversity enhancements. Transport infrastructure projects offer a unique opportunity to create new/expand upon existing green and blue infrastructure networks, which can utilise roadside verges or be formed alongside active travel routes.

Tree cover in neighbouring areas is also expected to increase through the Clyde Climate Forest, which will see 18 million trees planted in both urban and rural parts of Glasgow City Region over the next decade.

Biodiversity enhancements are also anticipated to be delivered in Renfrewshire through funded projects such as Biodiversity Areas in Renfrewshire project sites and Restoring Renfrewshire's Rivers project watercourses.

4.4. Key Sustainability Issues

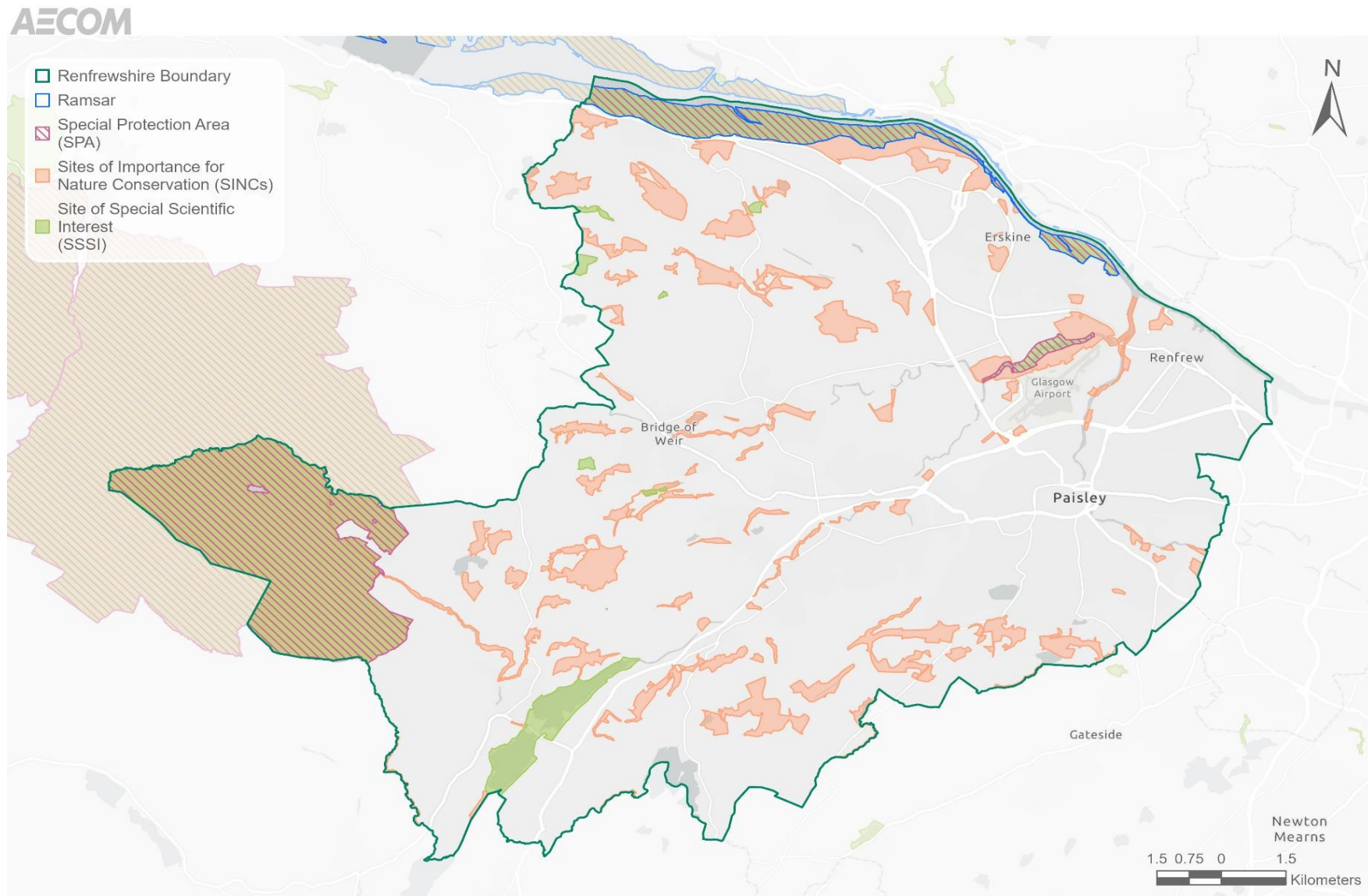
The following key issues have been identified through the baseline review for this topic:

- The nature, scale, timing, and duration of some transport activities can result in the disturbance of species at a level that may substantially affect their behaviour, and consequently affect the long-term viability of their populations. This can include effects of poor air quality on designated sites, severance of ecological networks from transport corridors, and road kills.
- Road verges are subject to a range of stresses imposed by passing traffic, including salt spray, oil, lead, and air pollutants. Parking and over running on verges can result in the complete loss of vegetation.
- There is one Ramsar site within Renfrewshire, as well as three SPAs. Whilst there are no SACs within the area, there are three within 8km of Renfrewshire. All of these designations contribute to the local and national site network, providing important biodiversity connections to allow the safe movement of species.
- Other protected areas within Renfrewshire include eleven SSSIs and three LNRs.
- There is one GCR site within Renfrewshire – its geological and geomorphological features are likely to be threatened by erosion and disturbance.
- Habitats within Renfrewshire comprise of bog and heath networks which interlink to wetlands. Grasslands and woodlands are dispersed throughout the entire council area.

- Fragmentation of wildlife habitats into smaller, isolated areas caused by new and existing development, as well as increasing traffic, reduces the scope for wildlife to move and adapt to new conditions. Habitat creation in existing and new transport corridors, as well as the delivery of positive effects for biodiversity, can help mitigate the impact of transport on biodiversity.
- The LTS presents an opportunity to provide benefits for biodiversity by including consideration of important habitats, species, undesignated sites, and connections between designated sites and undesignated sites at a localised scale. This could be achieved at an early stage of planning for future enhancements to transport infrastructure. This includes the potential to contribute to positive effects towards native tree cover within the council area, which would also complement neighbouring afforestation efforts like the Clyde Climate Forest.
- Measures to avoid the spread of invasive non-native species (INNS) are essential to avoid contributing to biodiversity declines. Management and eradication of existing INNS on sites affected by LTS actions could positively impact native biodiversity.
- Planting schemes associated with LTS actions should ensure a balance of native species (of local genetic stock wherever possible) and non-native species (climate change adaptation).
- Ecosystems are important for maintaining the health of the local environment and communities, helping to manage flood risks, improve air and water quality, and support local agriculture and green spaces, which are important for recreation and mental well-being. Therefore, nature-based solutions should be incorporated into works associated with LTS actions wherever possible.

Chapter 12 presents the SEA Framework for this topic.

Figure 4-1: European and nationally important sites for biodiversity or geodiversity conservation in Renfrewshire



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Figure 4-2: Locally important sites for biodiversity or geodiversity conservation in Renfrewshire

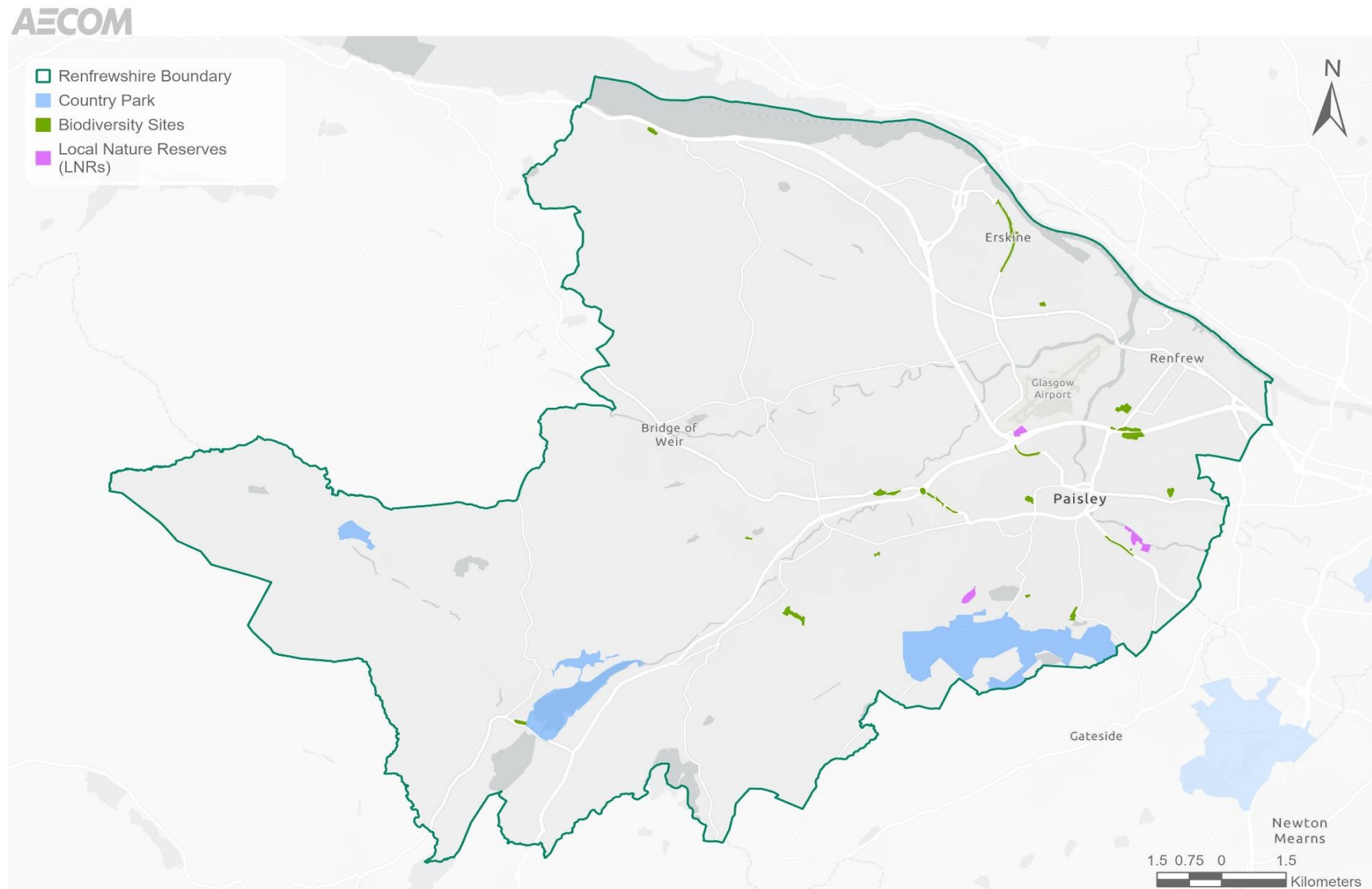
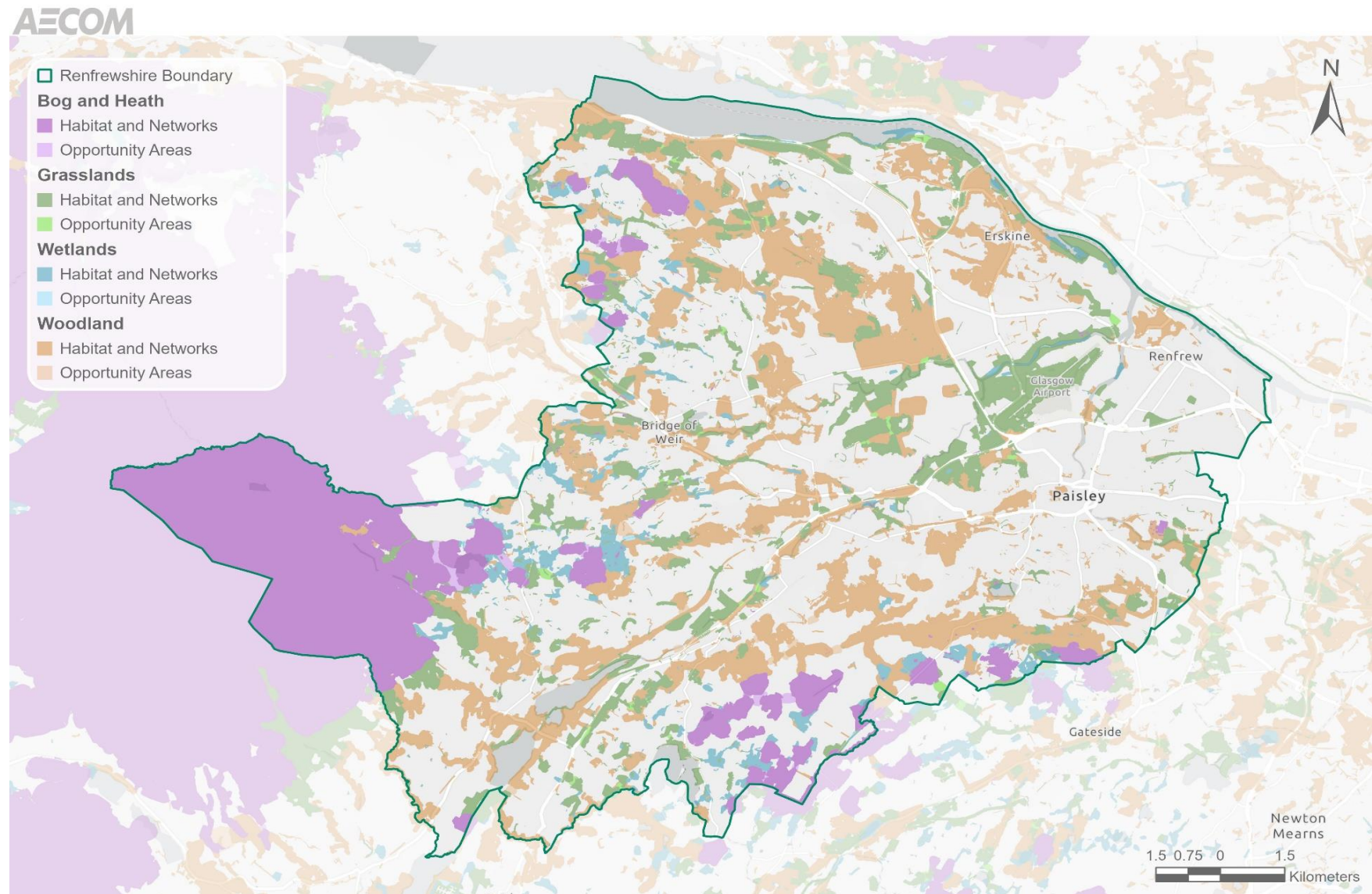


Figure 4-3: Habitats in Renfrewshire



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5. Climatic Factors

5.1. Focus of SEA Topic

- Greenhouse gas emissions.
- Potential effects of climate change.
- Flood risk.
- Climate change resilience.

5.2. Summary of Current Baseline

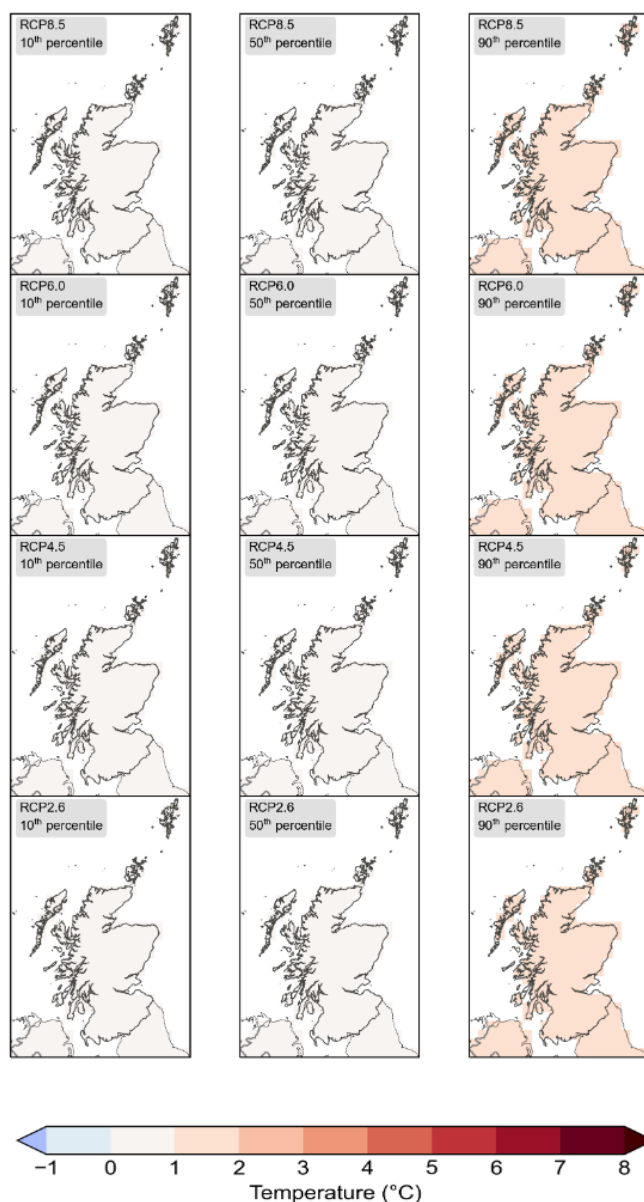
5.2.1. Climate Change and Transport

Scotland generally has cool summers, mild winters, and rainfall throughout the year ([Scotland's Environment, Climate change](#)). However, over the last few decades, Scotland has experienced a warming trend and shifting rainfall patterns. **Figure 5-1** and **Figure 5-2** overleaf illustrate the climate projections for annual mean temperature and annual rainfall for Scotland. In the future, there is expected to be warmer, wetter winters and hotter, drier summers with more extreme events ([Met Office, Climate change projections over land](#)). These changes will have major implications for the country.

Emissions from transport are a significant contributor to climate change. As such, there are two linkages between transportation and climate change that are important: 1) transportation is responsible for a significant portion of climate change through the emission of vehicular greenhouse gas (GHG) emissions, and 2) a changing climate could have serious consequences on the resiliency and performance of transportation systems in response to environmental conditions.

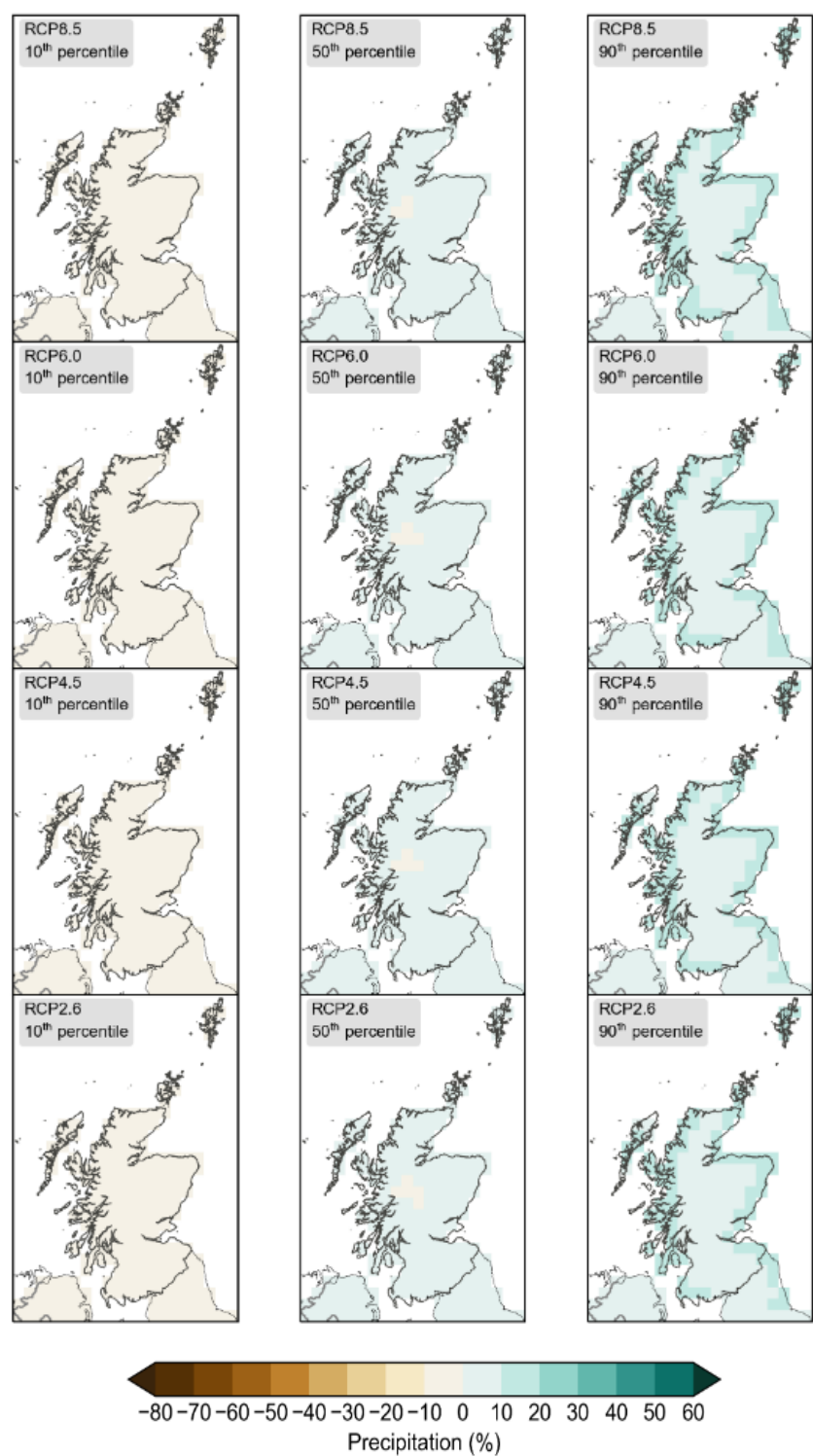
The hazards of a changing climate (such as a warmer climate, changes in precipitation patterns, higher severity storms, increasing risk of flooding and larger storm surge) could have serious implications on a wide variety of natural and human systems, including transportation. In this respect, climate change is likely to damage transportation infrastructure, affecting the reliability and capacity of transportation systems. Climate change impacts will also likely increase the cost of Scotland's transportation systems.

Figure 5-1: UKCP18 annual mean temperature anomaly in Scotland



In relation to the above figure, probabilistic projections that combine climate model data, observations and advanced statistical methods to simulate a wide range of climate outcomes for four emissions scenarios (RCP2.6, RCP4.5, RCP6.0, RCP8.5). A Representative Concentration Pathway (RCP) is a greenhouse gas concentration trajectory adopted by the IPCC. Four pathways have been selected for climate modelling and research, which describe different climate futures, all of which are considered possible depending on how much greenhouse gases are emitted in the years to come. The four RCPs, namely RCP2.6, RCP4.5, RCP6, and RCP8.5, are labelled after a possible range of radiative forcing values in the year 2100 relative to pre-industrial values.

Figure 5-2: UKCP18 annual precipitation anomaly in Scotland



Mean annual maximum and minimum temperatures have been rising since the end of the 19th Century. There is some evidence of an upward trend in mean annual rainfall, with less rain falling in summer months.

Scotland is already seeing a number of changes as a result of climate change, including changes in the growing, breeding and migration seasons, shifts in species abundance and diversity, and changing weather patterns with the potential for more floods and droughts. Continued reliance on fossil fuels, combined with demand for energy for transport and housing, has the potential to escalate emissions of carbon dioxide to increasingly dangerous and potentially irreversible levels.

The third UK Climate Change Risk Assessment was published in 2022. The key findings for Scotland were:

- Milder winters are projected to reduce fuel poverty and overall financial pressures on households from the reduction in winter energy demand.
- Hotter summers, however, may lead to a rise in heat-related deaths and hospital admissions and increased demand for air conditioning.
- Less summer rainfall may lead to a reduction in river flows, affecting public water supplies and increasing the risk of pollution, and a reduction in soil moisture, potentially damaging natural ecosystems.
- Flooding may pose an increasing threat to people, property, critical infrastructure, agriculture and important natural habitats.
- Some native animal and plant species may decline in the face of threats presented by pests, diseases and non-native invasive species.
- Agricultural output may be adversely affected from droughts, pests and disease, exacerbated by higher temperatures.

[The Scottish Greenhouse Gas Statistics 2021](#) outlines that in 2021, Scottish source emissions of the basket of seven GHGs were estimated to be 41.6 million tonnes carbon dioxide equivalent (MtCO₂e). This is 2.4% higher than the 2020 figure of 40.6 MtCO₂e; a 1.0 MtCO₂e increase.

The main contributors to this increase between 2020 and 2021 were increased emissions in domestic transport (+1.1 MtCO₂e) following the impact of the Covid-19 lockdown in 2020, and residential (+0.4 MtCO₂e) sectors. Meanwhile, emissions reductions were seen across the energy (-0.5 MtCO₂e), business (-0.2 MtCO₂e) and international aviation and shipping (-0.1 MtCO₂e) sectors. All remaining sectors showed relatively modest increases in the latest year.

Between 1990 and 2021, there was a 49.2% reduction in estimated emissions (40.3 MtCO₂e decrease). The most significant contributors to this reduction were:

- A reduction in energy supply emissions (-16.8 MtCO₂e; a 77.6% reduction).
- Land use, land-use change and forestry (LULUCF) reducing its net emissions (-5.7 MtCO₂e).
- A reduction in waste management emissions (such as landfill) (-5.0 MtCO₂e; a 76.2% reduction).
- A reduction in business emissions (-4.2 MtCO₂e; a 35.3% reduction).
- A reduction in domestic transport emissions (-2.6 MtCO₂e; a 19.3% reduction).

GHG data is not available at the local level. However, in 2021, per capita CO₂ emissions in Renfrewshire stood at 5 t CO₂ – the average for the whole of Scotland was 7.4 t CO₂. This demonstrates greenhouse gas emissions are lower in Renfrewshire in comparison. In terms of overall CO₂ emissions, this stood at 903.1 kt CO₂ in Renfrewshire in 2021. The largest contributing sector was the transport sector (300.9 kt CO₂), followed by the domestic sector (267.4 kt CO₂), and the industrial sector (120.5 kt CO₂) ([UK local authority and regional greenhouse gas emissions national statistics](#)).

[Flood risk maps provided by SEPA](#) identify that there are areas of high (10% chance or more per annum) likelihood of fluvial/coastal flooding. The high-risk areas within Renfrewshire are mostly associated with the River Clyde, Black Cart Water and White Cart water, affecting areas such as Paisley, Johnstone, and north of Glasgow Airport. Other high-risk hotspots within the council area can be found in the south-west, associated with Barr Loch, Castle Semple Loch, and Barcraigs Reservoir. A map of Renfrewshire's fluvial / coastal flood risk is provided in

Figure 5-3 at the end of the chapter.

With regard to surface water flooding, the flood risk maps provided by SEPA also shows that areas of high risk (10% chance or more per annum) can be found throughout the council area. Hotspots include north-east of Johnstone, north-east of Craigends, and south of Paisley. A map of Renfrewshire's fluvial / coastal flood risk is provided in

Figure 5-4 at the end of the chapter.

5.3. Summary of Future Baseline

Climate change has the potential to increase the occurrence of extreme weather events in Scotland, with increases in mean summer and winter temperatures, increases in mean precipitation in winter, and decreases in mean precipitation in summer. This is likely to increase the risks associated with climate change, including surface water and fluvial flood risk, as well as flooding by sea. This will result in an increased need for resilience and adaptation for transport infrastructure.

In terms of climate change mitigation, per capita emissions are likely to continue to decrease as energy efficiency measures, renewable energy production, and new technologies become more widely adopted. In particular, an ongoing increase in the use of electric vehicles (EVs) has the potential to reduce emissions from transport. In this respect, the UK Government has stated that it will disallow the sale of petrol and diesel cars and vans after 2030, and hybrids after 2035. More stringent emission standards on manufacturers will also help accelerate the trend to alternatively powered vehicles.

Alongside an uptake of cleaner vehicles, a modal shift to more sustainable modes of transportation, as well as improving the active travel network and reducing the need to travel through encouraging home working, would be beneficial to reducing transport emissions in Scotland.

5.4. Key Sustainability Issues

The following key issues have been identified through the baseline review for this topic:

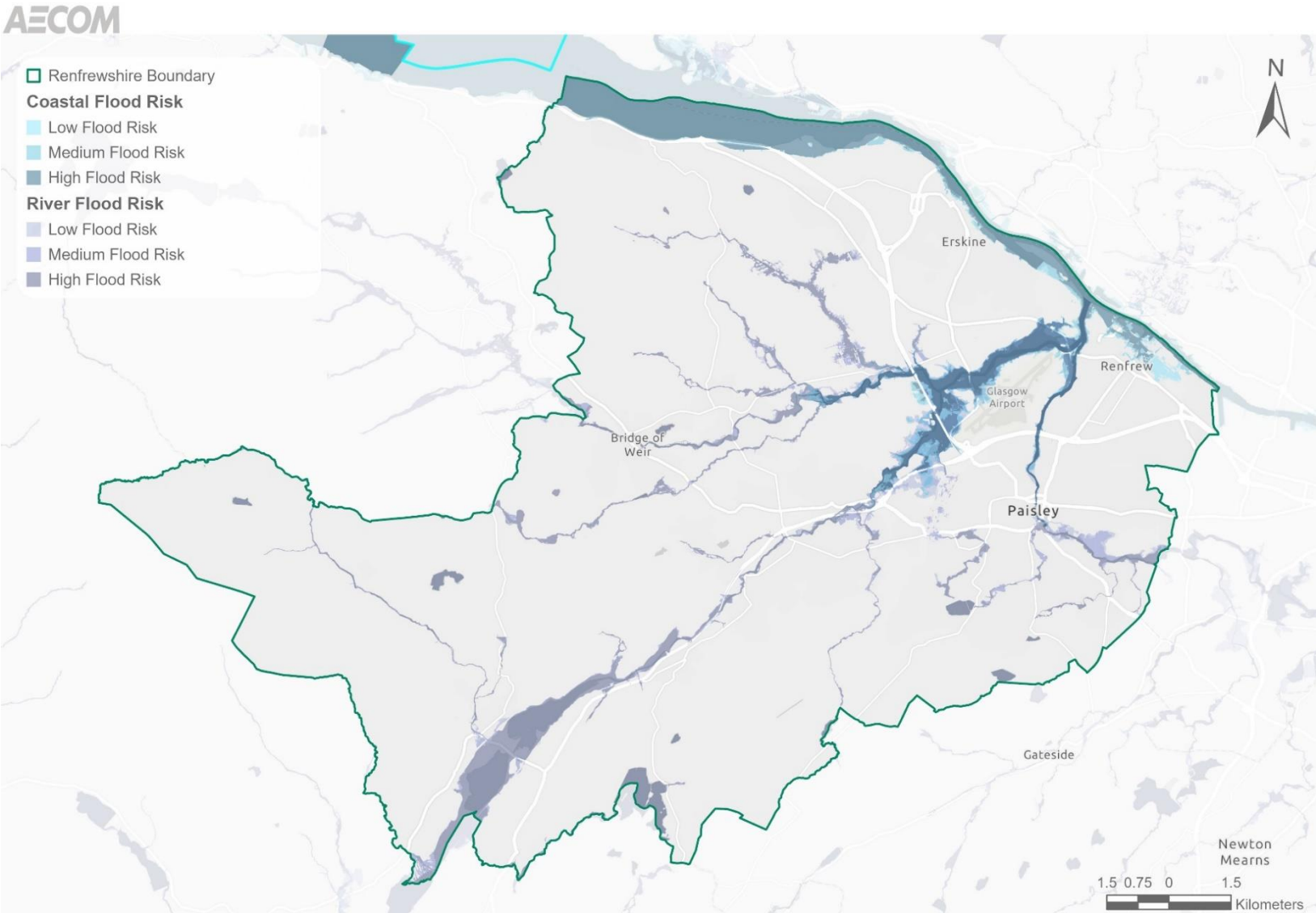
- Road transportation is a major contributor of CO₂ emissions (which is one of the main components of GHGs) in Scotland, and therefore a major factor in exacerbating climate change impacts. However, the ongoing transition towards electric and

hybrid vehicles, combined with an increase in home working and active travel uptake, has the potential to help reduce emissions from transport in the long-term.

- A range of flood risk issues exist across Renfrewshire. This includes flooding linked to fluvial, surface water, and groundwater flooding and inundation from the sea.
- The transport network of Renfrewshire has the potential to become increasingly vulnerable to the potential effects of climate change in forthcoming years. As such the resilience of the transport network to the likely impacts of climate change will be a key factor in its effective functioning.

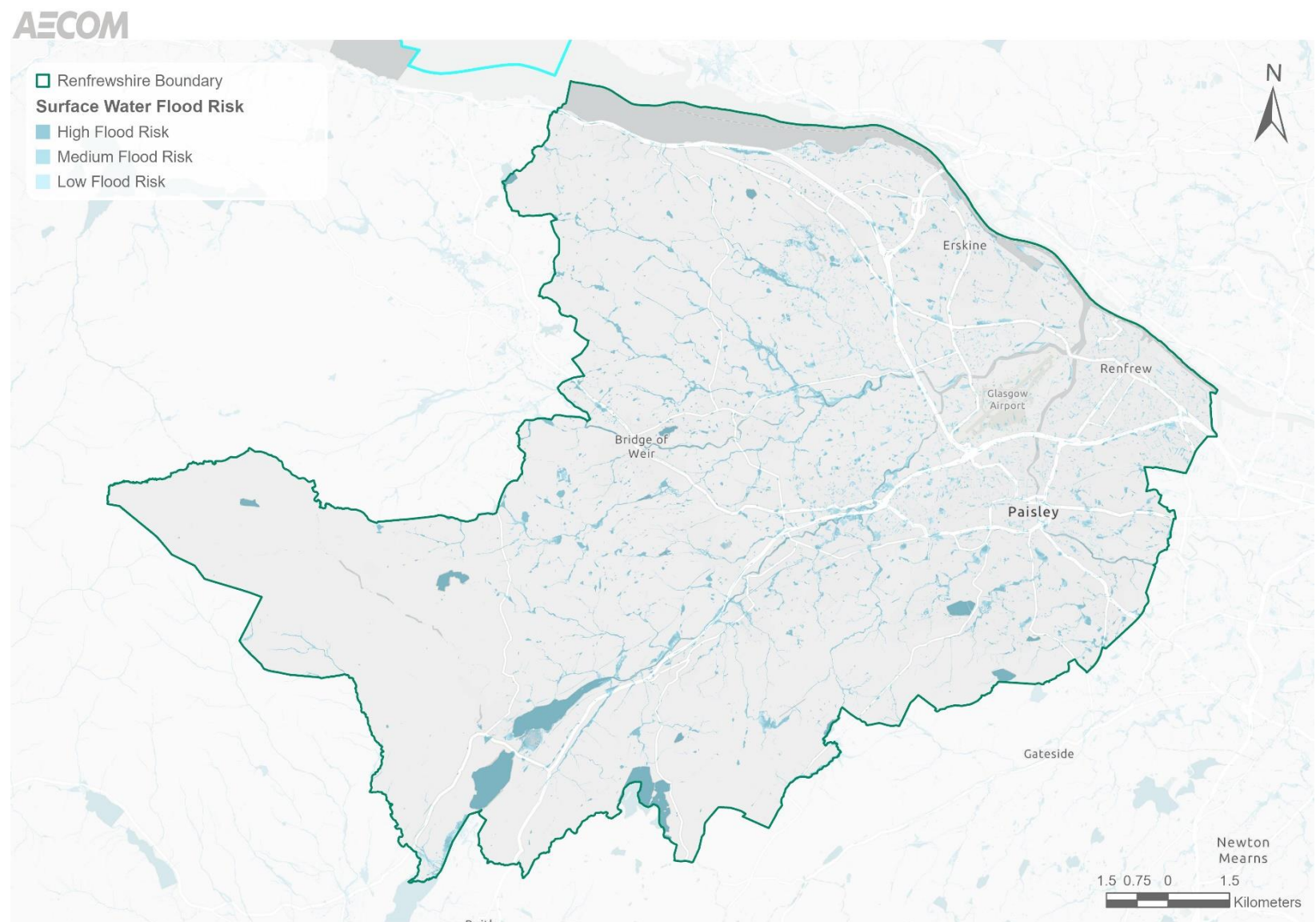
Chapter 12 presents the SEA Framework for this topic.

Figure 5-3: Fluvial / Coastal Flood Risk in Renfrewshire



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Figure 5-4: Surface Water Flood Risk in Renfrewshire



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6. Air Quality and Noise Pollution

6.1. Focus of SEA Theme

- Air pollution sources.
- Air quality hotspots.
- Air quality management.
- Noise pollution.

6.2. Summary of Current Baseline

6.2.1. Air Quality Management Areas

Local Authorities have a duty to designate any relevant areas where the air quality objectives are not (or are unlikely to be) being met as Air Quality Management Areas (AQMA) ([Air Quality Management Area – Scotland](#)). AQMAs must be designated officially by means of an 'order'. The extent of the AQMA may be limited to the area of exceedance or encompass a larger area. Following the declaration of an AQMA, the local authority is required to develop and implement a plan (Air Quality Action Plan) to improve air quality in that area. AQMAs can be for a combination of nitrogen dioxide (NO₂), sulphur dioxide (SO₂) and particulate matter (PM₁₀).

There are three AQMAs in Renfrewshire, which have all been declared due to exceedances in the air quality objective for NO₂.

- Paisley Town Centre (PTC) – first declared in 2006, this AQMA has also been designated for exceedances in the air quality objective for PM₁₀. The designated area covers central Paisley and extends along some radial roads.
- Johnstone High Street (JHS) – first declared in 2016, covering the main road that runs through Johnstone town centre.
- Renfrew Town Centre (RTC) – first declared in 2016, covering the main roads through Renfrew town centre.

Renfrewshire Council has prepared an [Air Quality Action Plan](#) (2019) in line with its statutory obligations. It is designed to address the air quality problems identified within

the council's three AQMAs. An update to the Plan was published in 2024. The update outlines that there has been a steady improvement of air quality across Renfrewshire Council and, as such, no exceedances of any air quality objectives have occurred since 2019. It also outlines new measures which Renfrewshire Council should deliver between 2024-2029 to continue to reduce concentrations of air pollutants within the council area.

The most recent [Annual Progress Report](#) (APR) for Renfrewshire was published in 2024 and reviewed monitoring data from 2023. This report confirmed there continues to be no exceedances and that monitored concentrations of both nitrogen dioxide (NO₂) and particulate matter (PM) continue to show a downward trend across Renfrewshire. As such, it is now the council's intention to revoke all three AQMAs.

A Revocation Report, which provides evidence in favour of the revocations, was prepared and submitted to the Scottish Government and the Scottish Environment Protection Agency (SEPA) in November 2024. Both statutory consultees have approved the report in support of the revocations. The report is due to be presented to the Council's Environment Policy Board in March 2025 for consideration and final approval with the AQMAs thereafter being revoked.

6.2.2. Noise Pollution

The Environmental Noise Directive requires, on a five yearly cycle, the Scottish Government to produce strategic noise maps ([Overview of Scotland's noise, Scotland's noise](#)). Noise action plans will be prepared based on the results of the noise mapping, with a public consultation on the draft action plans. The Scottish Government has commissioned work on the collaborative development of modelling and mapping to describe the noise exposure in Scotland for 2021. The work will be completed in early 2024 as part of the fourth round of noise mapping for Scotland, under the Environmental Noise (Scotland) Regulations 2006.

The noise modelling work will develop a geospatial model of the country and the updated mapping system will be capable of appraising national strategy, local policy, and individual interventions. This work will include new road and rail noise source data, and a new calculation methodology to significantly improve the evidence base. The noise maps will support the delivery of new noise actions plans to prioritise the management of noise in Noise Management Areas (NMAs), as specified by the Environment Noise (Scotland) Regulations 2006.

The current round three noise map demonstrates noise pollution in Renfrewshire is largely linked to Glasgow airport and the strategic road network (predominantly the A737 and the M8).

6.3. Summary of Future Baseline

There is likely to be a continued reliance on private vehicles in Renfrewshire, with potential for some modal shift to active/public transport. In addition, future transport infrastructure provision has the potential to increase the amount of traffic on key routes through Renfrewshire. This is especially true for the A737, the M8, and through town centres. This has the potential to increase pollutants and impacts on the AQMAs within Renfrewshire.

However, it is noted that cleaner vehicles, including the update of EVs and their associated infrastructure, have the potential to lead to improvements in air quality over the longer term. The provision and management of EV charging points across Renfrewshire has the potential to lead to positive effects in terms of addressing EV challenges, including through increasing public confidence in charging infrastructure.

6.4. Key Sustainability Issues

The following key issues have been identified through the baseline review for this topic:

- There are three active AQMAs in Renfrewshire, which cover the town centre environments of Paisley, Renfrew, and Johnstone. An Air Quality Action Plan is in place to address poor air quality in these areas.
- Outside key towns, areas of noise concern across Renfrewshire broadly link to and follow the routes of the road network, particular the M8 and A737. Another key contributor to noise pollution in Renfrewshire is Glasgow airport.
- Future transport infrastructure provision has the potential to increase the amount of traffic on key routes through Renfrewshire, with the potential for increasing pollutants.
- Modal shift away from journeys made by private vehicles and towards public transport or methods of active travel has the potential to reduce congestion and transport emissions within the council area, which would lead to better air quality in the council area.

Chapter 12 presents the SEA Framework for this topic.

7. Soil and Water Resources

7.1. Focus of SEA Theme

- Soil resources.
- Water resources and quality.

7.2. Summary of Current Baseline

7.2.1. Soil Resources

Land is a limited resource with competition for agriculture, forestry, and other uses. The value and use of land will generally depend on its quality, location and any restrictions placed on it. **Figure 7-1** at the end of this chapter shows the location of prime agricultural land across the local authority area.

Scotland's national scale land capability for agriculture map provides information on the types of crops that may be grown in different areas dependent on environmental and soil characteristics ([National scale land capability for agriculture](#)). The land capability for agriculture (partial cover) was published later at a greater resolution and, where coverage exists, is seen as the definitive mapped assessment. Soil classes range from Class 1 (land capable of producing a wide range of crops) to Class 7 (land of very little agricultural value). Land within Class 3 is subdivided to provide further information on potential yields; Classes 4 and 5 are further divided to provide information on grasslands; Class 6 is divided on the quality of the natural vegetation for grazing.

The majority of undeveloped land in Renfrewshire underlain by classes 4.1 and 4.2 – which is land capable of producing a narrow range of crops. The western extent of Renfrewshire has areas of class 5.1 and 5.3 – which is capable of being used as improved grassland. The western extent also has class 6.2, which is land capable of being used as rough grazings. There are further areas of class 5.1 to the south of Langbank, to the west of Bridge of Weir, and to the east of Lochwinnoch. The majority of the eastern and north-eastern part of Renfrewshire is in urban use, associated with Renfrew, Johnstone, and Paisley. There is an area of land in class 2 that extends from Craigends towards Inchinnan and Erskine and towards the River Clyde that would be capable of producing a wide range of crops.

[Scotland's Soils](#) provides data and information on the country's soils. This includes a national soil map of Scotland, which shows that soil types across Renfrewshire are varied. The northern region of Renfrewshire is primarily underlain by brown soils, mineral gleys, and alluvial soils; the western extent is mostly peat with peaty podzols and mineral podzols.

Other data and information provided by Scotland's Soils includes a soil risk map, which shows areas of soil at risk of erosion, runoff, leaching and compaction, and a carbon and peatland map, which shows the distribution of carbon and peatland classes across the whole of Scotland. These maps will be explored in more detail during the next stage of the SEA process (the Environmental Report).

7.2.2. Water Resources and Quality

Renfrewshire's waterbodies

The water resources located within Renfrewshire include a network of main rivers, lochs, lakes, streams, dams, and drainage ditches.

The Scottish Environment Protection Agency (SEPA) produces an annual Water Framework Directive (WFD) classification for all the waterbodies in Scotland. Most of Scotland's water environment is already in a good condition and subject to fewer pressures than most other European waters. However, there are significant environmental problems caused by a number of pressures, including diffuse and point source pollution, alterations to beds, banks and shores, alterations to water levels and flows and the presence of invasive non-native species.

According to Renfrewshire's [State of the Environment Report](#) (SER, 2011), the main concerns for the water environment within Renfrewshire are associated with diffuse pollution from sources such as fertilisers used in agriculture and forestry, contaminants from roads and pavements and atmospheric deposits of contaminants arising from industry.

In order to measure pressures on water quality in Scotland, SEPA uses an aquatic classification system which covers rivers, lochs, estuaries, coastal and groundwater bodies. These are split into management units called waterbodies, with a classification produced for each body (the number of water bodies between years varies slightly, as some water body boundaries are reviewed to ensure that they can be managed appropriately).

The WFD requires the creation of River Basin Management Plans (RBMP) ([Water Framework Directive, NatureScot](#)). In these, surface waterbodies are classified using a system of five quality classes: high, good, moderate, poor, and bad. Meanwhile, ground waterbodies are classified as good or poor. In general, the classification of waterbodies is defined by how much their condition or status differs from near natural conditions. Whilst most waterbodies in Scotland have a good or moderate status, [online mapping for the latest RBMP](#) (2015-2027) identifies several surface waterbodies within Renfrewshire that are classed as Bad or Poor condition in 2014. These are:

- Candren Burn: Bad.
- Dargavel Burn: Bad.
- White Cart Water (Kittoch Water to A726 road bridge): Poor.
- River Gryfe (d/s Barochan Burn): Poor.
- Black Cart Water: Poor.
- Castle Semple Loch: Poor.
- Dubbs Water: Poor.

The mapping also identified the following groundwaters in Renfrewshire in Poor condition:

- Govan Sand and Gravel: Poor.
- Paisley and Pollock: Poor.
- Linwood: Poor.
- Dalry: Poor.

NatureScot works with SEPA and other bodies to implement RBMPs. This includes action to improve the condition of SACs and SPAs where impacts on the water environment are leading to unfavourable condition. The key pressures on waterbodies that have been identified in the RBMP for Scotland are:

- Pollution – rural diffuse pollution (mainly from agriculture); wastewater discharges.
- Barriers to fish migration.
- Physical modification of waterbodies.
- Invasive non-native species.
- Pressures on flows and levels, for example abstraction.

7.3. Summary of Future Baseline

Population growth, development, and climate change is likely to increase pressure on water resources and associated WFD objectives. Climate change could also increase flooding, which could lead to adverse effects on water quality from overflowing of storm water drains and leaching of contaminated soils into surface waters. Soil erosion is likely to continue due to surface water flash flooding and other causes.

Compaction and sealing is also likely to continue from an increase in developed areas and impermeable surfaces (including new road infrastructure).

Pressure for development and new transport infrastructure within undeveloped areas of Renfrewshire has the potential to lead to the loss of areas of productive agricultural land.

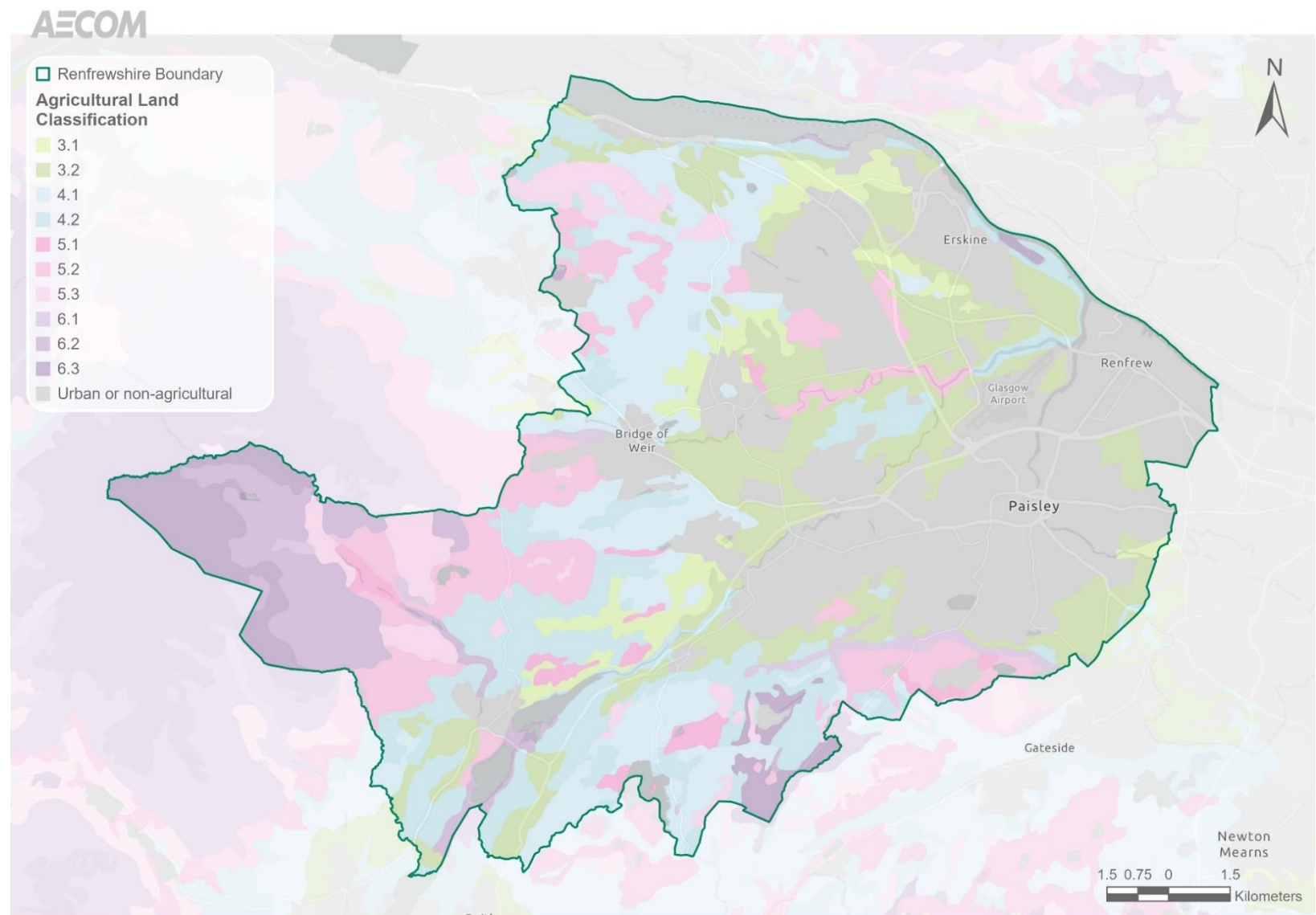
7.4. Key Sustainability Issues

The following key issues have been identified through the baseline review for this topic:

- Areas of higher quality agricultural land is present within Renfrewshire. This includes class 2 agricultural land that extends from Craigends towards Inchinnan and Erskine and towards the River Clyde. Therefore, this land should be protected from new transport infrastructure where possible.
- Increased soil erosion and compaction could be an issue for new transport infrastructure schemes, with impermeable materials reducing the drainage capacity and increasing the potential for surface water run-off issues.
- The key pressures on waterbodies in Scotland are pollution, barriers to fish migration, physical modification of waterbodies, invasive non-native species, and pressures on flows and levels. Renfrewshire's SER specifically highlights that diffuse pollution from roads and pavements is a particular concern for the council area.

Chapter 12 presents the SEA Framework for this topic.

Figure 7-1: Prime Agricultural Land



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8. Cultural Heritage

8.1. Focus of SEA Topic

- Designated and non-designated heritage assets.
- Setting, special qualities, and significance of heritage assets.
- Locally important heritage assets.
- Archaeological resources.

8.2. Summary of Current Baseline

8.2.1. Introduction

Built heritage includes ancient monuments, archaeological sites and landscapes, historic buildings, townscapes, parks, gardens and designed landscapes and other features, and comprises both statutory and non-statutory designations. The historic built environment provides a sense of identity and continuity for communities – as such, it is highly valued.

Additionally, across Scotland there are a significant number of assets of historical and archaeological importance that do not meet the criteria for designation and are classed as ‘record only’.

Compiled and managed by Historic Environment Scotland (HES), [Canmore](#) contains more than 320,000 records and 1.3 million catalogue entries for archaeological sites, buildings, industry and maritime heritage across Scotland.

[HES’s search tool](#) produces 603 results for Renfrewshire and will be an essential source of evidence during the next stages of the SEA.

A map of Renfrewshire’s designated heritage assets (excluding listed buildings) is found in

Figure 8-1, whilst a map of Renfrewshire's listed buildings is found in

Figure 8-2. Both figures are found at the end of the chapter.

8.2.2. World Heritage Sites

There are no World Heritage Sites (WHS); however, adjacent to the council area's north-eastern boundary lies the western Antonine Wall WHS, a 60km long fortification that spans the width of central Scotland.

8.2.3. Listed Buildings

[HES](#) holds a record of listed buildings of special architectural or historic interest. These assets have been listed under the [Planning \(Listed Buildings and Conservation Areas\) \(Scotland\) Act 1997](#).

Listed buildings are placed into one of three categories according to their relative importance. These are as follows:

- **Category A** – Buildings of special architectural or historical interest which are outstanding examples of a particular period, style or building type.
- **Category B** – Buildings of special architectural or historic interest which are major examples of a particular period, style or building type.
- **Category C** – Buildings of special architectural or historic interest which are representative examples of a period, style or building type.

HES's search tool produces 568 results for listed buildings in Renfrewshire – of which 38 are Category A, 335 are Category B, and the remaining 195 are Category C.

8.2.4. Scheduled Monuments

[HES](#) maintains a schedule (a list) of monuments of national importance, listed under the Ancient Monuments and Archaeological Areas Act 1979. The aim of scheduling is to preserve Scotland's most significant sites and monuments of architectural value as far as possible in the form in which they exist today.

HES's search tool produces 34 results for scheduled monuments in Renfrewshire.

8.2.5. Gardens and Designed Landscapes

Gardens and designed landscapes – grounds consciously laid out for artistic effect – are an important element of Scotland’s historic environment and landscape. Such spaces play a big role in Scotland’s heritage. HES select nationally important sites for the Inventory under the terms of the Ancient Monuments and Archaeological Areas Act 1979.

There is one garden and designed landscape within Renfrewshire. [Formakin \(Historic Environment Scotland\)](#), located in Erskine parish, is an early 20th century landscape designed by Sir Robert Lorimer, and contains a number of notable architectural features, woodland, parkland, gardens and important wildlife areas.

It is noted that the [Renfrewshire Council website](#) also indicates there is a further garden and designed landscape within the area – a portion of Finlaystone Estate.

8.2.6. Conservation Areas

[Renfrewshire Council’s website](#) also notes that there are eight conservation areas within Renfrewshire:

- Castlehead, Paisley.
- Greenlaw, Paisley.
- Houston.
- Kilbarchan.
- Lochwinnoch.
- Ranfurly, Bridge of Weir.
- Paisley Town Centre.
- Thornly Park, Paisley.

Associated conservation guides, appraisals, and management plans for these conservation areas in Renfrewshire have not been published. This represents a potential gap in the baseline, given these documents provide additional information and detail around the designations – for example, their special character and important features. However, it is noted Renfrewshire Council have produced a guide on development coming forward within conservation areas – this will be an important piece of evidence and referred to in the later stages of the SEA (the Environmental Report).

8.2.7. Buildings at Risk

The [Buildings at Risk Register](#), which is maintained by HES, brings together potential restorers and redevelopers with buildings and sites that are considered at risk or under threat. The historic places on the Register are all of architectural or historic importance. They are usually [listed buildings](#) or an unlisted building within a [conservation area](#). A building at risk may be:

- Long-term vacant.
- Neglected and / or poorly maintained.
- Structurally unsound.
- Damaged by fire.
- Unsecured and open to the elements.
- Threatened with demolition.

There are 28 Buildings at Risk in Renfrewshire. Whilst these are located across the whole area, a notable cluster can be found in and around Paisley. These will be explored in more detail during the next stage of the SEA process (the Environment Report).

8.2.8. Additional Heritage Features and Areas of Interest

It should be noted that not all historic environment features are subject to statutory designations. Consequently, there remain many non-designated features of historic interest and are an important part of local communities. For example, open spaces and key distinctive buildings are likely to have a local historic value.

8.3. Summary of Future Baseline

New transport infrastructure provision within Renfrewshire has the potential to impact on the fabric and setting of heritage assets, for example, through ground disturbance and inappropriate design and layout. It should be noted, however, that existing historic environment designations offer a degree of protection to heritage assets and their settings, and there are a range of existing initiatives to enhance historic environment assets across Scotland.

Increasing traffic levels associated with an increase in population has the potential to negatively impact heritage assets. In urban areas, this can be from vibration affecting the

structural integrity of vulnerable buildings, emissions, and from the provision of street furniture affecting the setting of assets.

Increases in visitor numbers may increase demand for recreational activities associated with key heritage assets in Renfrewshire.

An improvement in connectivity or alterations to public transport services throughout Renfrewshire could enhance access to the council area's historic sites. Consequently, this could lead to a greater number of individuals being able to enjoy the area's heritage.

8.4. Key Sustainability Issues

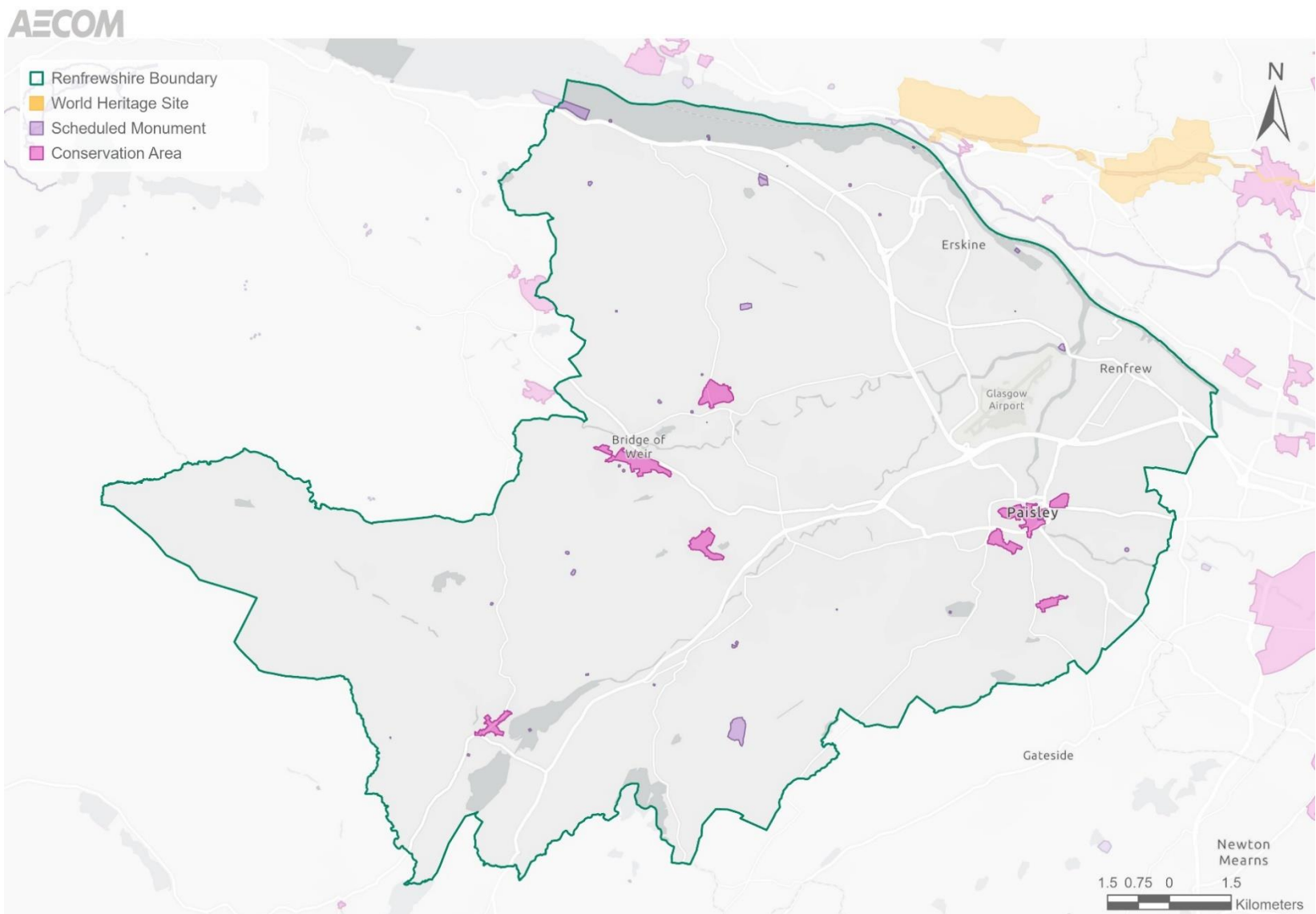
The following key issues have been identified through the baseline review for this topic:

- There are many features and areas of historic environment interest present within Renfrewshire. This includes a large number of listed buildings, scheduled monuments, and gardens and designed landscapes. There are also several structures on the Buildings at Risk Register.
- There are eight conservation areas within Renfrewshire; however, there are no associated management plans for these designations. As this time, it is not possible to determine what effect, if any, transport infrastructure has on these designated areas, their settings, and specific features.
- New transport infrastructure provision has the potential to impact on the fabric and setting of historic environment assets, through ground disturbance, inappropriate design, and layout.
- There is a need for transport infrastructure development to avoid loss of or damage to heritage features and their setting, and where possible, recognise and better reveal the significance of heritage assets into transport infrastructure, providing opportunities for enhancing their fabric and setting.
- Accessibility to the council area's most important historic sites could be improved through the LTS, which would enable more people to appreciate the area's heritage.
- It is also recognised that the LTS has the potential to establish cross-cutting provisions relating to development. This could include the creation and enhancement of functional environmental infrastructure, ecosystem services and biodiversity, providing appropriate buffers to natural spaces and restoring and enhancing connectivity. In this context, improving the resilience of such networks is likely to protect the historic environment, important views, and/or the setting of

designated and non-designated assets, in addition to the wider character of key historic settlements across Renfrewshire.

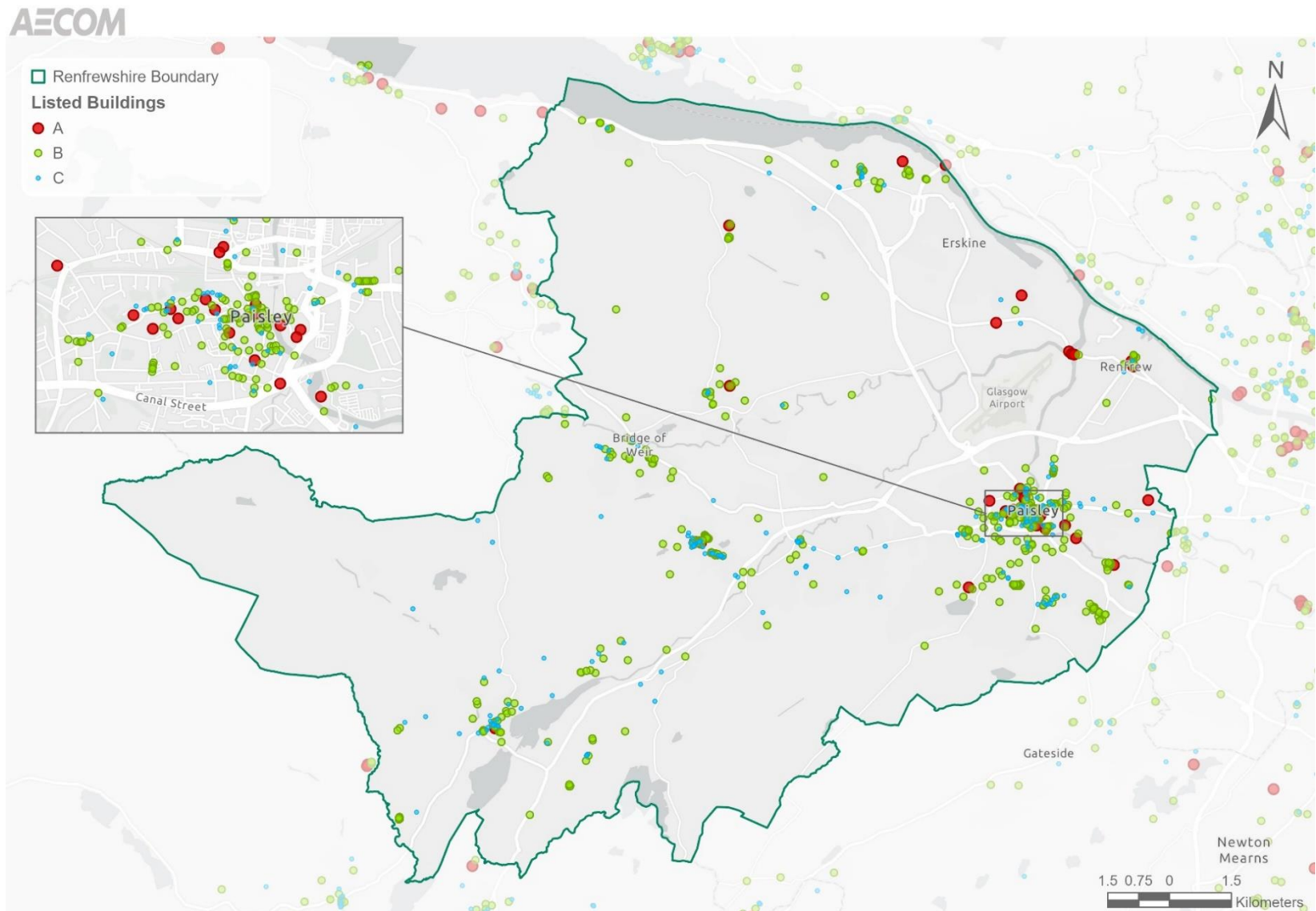
Chapter 12 presents the SEA Framework for this topic.

Figure 8-1: World Heritage Sites, Scheduled Monuments, and Conservation Areas in Renfrewshire



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Figure 8-2: Listed Buildings in Renfrewshire



9. Landscape

9.1. Focus of SEA Topic

- Designated and non-designated sites and areas.
- Landscape character and quality.
- Visual amenity.

9.2. Summary of Current Baseline

9.2.1. National Scenic Areas

Scotland's 40 [National Scenic Areas](#) (NSAs) cover 13% of the country's land. The designation's purpose is both to identify Scotland's finest scenery and to ensure its protection from inappropriate development in the planning system. NSAs are broadly equivalent to the National Landscapes (previously Areas of Outstanding Natural Beauty, or AONBs) found in England, Wales and Northern Ireland.

There are no NSAs in or near to Renfrewshire – the nearest is Loch Lomond, approximately 10km to the north of the council area.

9.2.2. Landscape Character and Quality

The [Renfrewshire LDP Landscape Assessment](#) (2011) outlines that Renfrewshire sits at a boundary where the urban sprawl of Greater Glasgow transitions into a more open rural landscape towards the west. Its terrain varies, featuring flat to gently undulating land in the north-east, extending towards settlements like Houston and Brookfield. Paisley, Linwood, and Johnstone lie within this relatively level landscape, while further south and west, the terrain becomes more rolling. Villages such as Bridge of Weir, Houston, Kilmacolm, and Howwood are nestled amid these undulations. Moving south-west towards Lochwinnoch, the landscape takes on a more rugged character.

Drainage is predominantly towards the south-west, with the Black Cart Water flowing from Castle Semple Loch and the River Gryffe draining the western part of the council area. In

the east, the White Cart Water meanders through south Glasgow, passing Paisley before merging with the Black Cart Water north of the city, ultimately joining the River Clyde.

The primary urban centre in Renfrewshire is Paisley, which connects with Renfrew to the north-east and Johnstone to the west. Smaller communities such as Bridge of Weir and Linwood are dispersed westward from Paisley. Along the banks of the River Clyde, there is a grouping of medium to smaller settlements including Langbank and Erskine.

Key transportation arteries, which affect landscape character, include the M8, running east to west north of Paisley, and the A737, which heads south-west from Paisley along the Black Cart Water Valley. The M8 transitions into the A8 between Bishopton and Langbank, continuing westward along the coast to Greenock. Similarly, the A737 crosses the county south-westward from north-west Paisley, passing through Linwood, Johnstone, Kilbarchan, and Howwood. Glasgow Airport, serving the western part of Scotland, lies north-west of Paisley near the junction of the M8 and A737.

9.2.3. Landscape Character Areas

The Glasgow and Clyde Valley Landscape Character Area (LCA) covers the administrative areas of East Dunbartonshire, West Dunbartonshire, Glasgow City, Inverclyde, Renfrewshire, East Renfrewshire, North Lanarkshire and Renfrewshire. The LCA contains a diverse range of environments, ranging from extensive urban areas to remote rural areas.

[NatureScot's 2019 assessment of the Glasgow and Clyde Valley LCA](#) offers a description of the LCA's key characteristics. It begins with the Glasgow city region, which is surrounded by plateau moorlands, hills, and coastal waters, and has been significantly shaped by human activity. The River Clyde (and its tributaries) lies at the heart of the LCA, and has historically served as a hub for settlement, transportation, and industry. The LCA contains fertile soils and is home to a third of Scotland's population; therefore, the LCA experiences ongoing housing development, inner-city renewal, and an ageing population. While traditionally reliant on heavy industry, the LCA now embraces modern sectors like engineering and technology. Green spaces, including parks and woodlands, are integral to the region's landscape, facilitating movement for both people and wildlife. Approximately 17% of the area is covered by woodland, which is similar to the Scottish average.

9.2.4. Regional Landscape Character Types

The [Renfrewshire Local Development Plan Landscape Assessments Main Issues Report](#) (2011) identifies that Renfrewshire contains seven Regional Landscape Character Types (RLCT):

- **Raised Beach (SNH Ref.1)** – found to the north of Renfrewshire along the southern shore of the Firth of Clyde.
- **Alluvial Plain (SNH Ref.2)** - large flat landscape to the north-west of Paisley, the settlements of Linwood, Houston, Bishopton and Erskine are on the peripheries of this landscape type.
- **Urban Greenspace (SNH Ref.3)** – found to the east of Paisley, this area prevents the physical and visual coalescence of Paisley with west Glasgow.
- **Rugged Upland Farmland (SNH Ref.6)** – found to the south of the Raised Beach, characterised by undulating open grazing fields with some arable farming. The settlements of Bridge of Weir, Bishopton and Erskine are within this landscape character type.
- **Green Corridors (SNH Ref.9)** – found by the northern border of Renfrewshire, overlapping with the River Clyde, White Cart Water and Black Cart Water.
- **Broad Valley Lowland (SNH Ref.10)** – found to the south of Rugged Upland Farmland, this character type is the broad valley of the Black Cart Water, including Castle Semple Loch.
- **Rugged Moorland Hills (SNH Ref.20)** – found to the south of Johnstone and the Broad Valley Lowlands.

Each RLCT has distinctive features and qualities which contribute to their character (i.e., geology, landform, cultural and ecological features etc). The Report contains guidance for the management of RLCTs in response to new development, including transport infrastructure, which may adversely impact upon the distinctive qualities of each RLCT in the absence of sensitive design.

9.2.5. Local Landscape Areas

In many places in Scotland, the scenery is highly valued locally, and local authorities often give these landscapes a local designation ([Local Landscape Areas, NatureScot](#)). These are defined as Local Landscape Areas (LLAs), following Scottish Government policy. It is noted that previous names include Special Landscape Areas (SLAs) and Areas of Great Landscape

Value (AGLVs). LLAs are present across Scotland, as defined and mapped through Local development plans. NatureScot does not maintain a national record of local landscape designations, but it does provide a nation-wide map which shows their coverage based on data from August 2016. According to the mapping, there are no LLAs in Renfrewshire, although there are several adjacent to the council area's boundary, including: Mainland (to the south-west), Bullwood / Hurllehill (to the east); and Leverndale (to the east).

9.2.6. Wild Land Areas

Wild Land Areas (WLAs) are the most extensive areas of high wildness. They are identified as nationally important in Scottish Planning Policy but are not a statutory designation. [NatureScot](#) identified 42 wild land areas following a detailed analysis in 2014. Fieldwork for the wild land descriptions was undertaken between 2013 and 2015, and the final document was published in 2017. There is one WLA in Renfrewshire: Waterhead Moor, which partially falls within the council area by its western border.

9.2.7. Visual Amenity

The views across Renfrewshire are also an important consideration in the transport planning process as the location, design, layout and use of materials in transport infrastructure can impact important views if they are not considered and assessed. Changes due to both development and landscape manipulation can see these views degraded over time.

In addition, views experienced from the road, rail and active travel network can often be far-reaching and dramatic, particularly within the more rural areas of Renfrewshire and on the approach into key towns.

9.3. Summary of Future Baseline

New transport infrastructure provision across Renfrewshire has the potential to lead to incremental but small changes in landscape character and quality. This includes from the loss of landscape features and areas with an important visual amenity value.

Increasing traffic levels associated with an increase in population also have the potential to negatively impact landscape character and tranquillity.

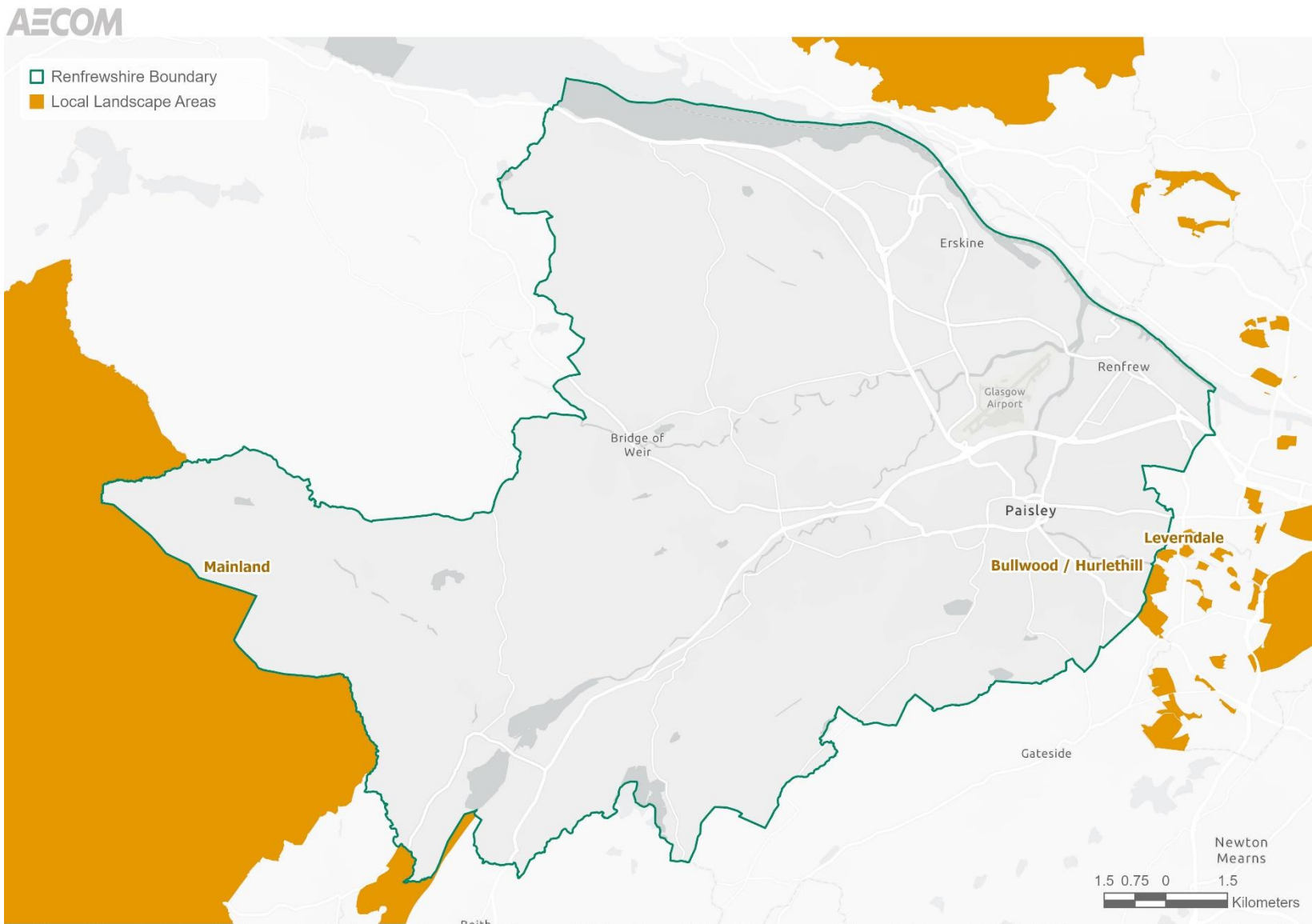
9.4. Key Sustainability Issues

The following key issues have been identified through the baseline review for this topic:

- Renfrewshire lies within one LCA and seven RLCTs. The associated assessments provide a summary of the character, sensitivities, and forces of change for each area. Transport infrastructure has an influence on many aspects of these character areas.
- Views are an important consideration in the transport planning process as the scale, height, and mass of development can ultimately impact important views if they are not appropriately considered through design and layout of new transport infrastructure.
- Transportation infrastructure such as roads, highways, and railways can lead to the loss of important landscape features (such as trees), and fragment natural habitats, leading to the loss of biodiversity and disruption of ecosystems.

Chapter 12 presents the SEA Framework for this topic.

Figure 9-1: Local Landscape Areas in Renfrewshire



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10. Material Assets

10.1. Focus of SEA Topic

- Mineral resources.
- Waste.
- Sustainable design.

10.2. Summary of Current Baseline

10.2.1. Geology

Renfrewshire's geology ([GEN UKI, Renfrewshire Brief Description](#)) is notable for its extensive volcanic rock formations from the Lower Carboniferous period and significant coalfields north of the volcanic area, extending from Houston to the eastern border near Rutherglen. The Carboniferous system is well represented in the council area, starting with red sandstones along the coast near Innerkip, which extend inland to Loch Thom. These are succeeded by the Cement-stone series, largely replaced by volcanic rocks like basalts and porphyrites, forming a hilly belt across the county. These volcanic rocks often contain agates and zeolites, with numerous vents indicating past volcanic activity. The transition from volcanic rocks to the overlying Carboniferous Limestone series is usually faulted, but where visible, it comprises ashy sandstones, grits, and conglomerates, occasionally with bands of tuff.

The Carboniferous Limestone series dominates north of the volcanic rocks, with coal seams and ironstones extensively faulted but present, especially around Johnstone and Linwood. Intrusive basalt sheets occur near Quarrelton and Howwood, creating geological features like anticlinal arches. Further east, towards Shawlands and Crossmyloof, there is a development of the middle coal-bearing and upper limestone groups. Glacial evidence, including striations, suggests ice movement from the Highland mountains to the south-east, then south-west across Renfrewshire towards the Firth of Clyde.

10.2.2. Mineral Resources

Mineral resources are defined as natural concentrations of minerals or, in the case of aggregates, bodies of rock that are, or may become, of potential economic interest due to their inherent properties. Since minerals are a non-renewable resource, minerals safeguarding is the process of ensuring that non-minerals development does not needlessly prevent the future extraction of mineral resources, of local and national importance.

The [Renfrewshire Local Development Plan Background Paper – Minerals](#) (2013) identifies that Renfrewshire has a long history of minerals extraction, with 346 known sites where mineral workings have been carried out throughout the past 300 years. However, there is now a low level of interest in developing new operations due to these sites being exhausted or no longer economically viable. At the time of the Paper's writing, there were only two operational mineral workings within Renfrewshire (Highcraigs in Johnstone and Reilly Quarry at Bishopton), both of which are quarries working igneous rocks used for crushed rock aggregates.

The Paper continues, saying that although there is insufficient demand to justify minerals operations within Renfrewshire, new development proposals will be required to give consideration to prior extraction of mineral resources where appropriate. This would prevent further sterilisation of resources which would be otherwise inaccessible.

10.2.3. Waste

The production and disposal of waste is becoming an increasingly important issue. Waste is produced by households, by industrial processes, by the construction and demolition industry, through commercial activities and agricultural practices and by public services and utilities. Waste can affect the environment through its visual impact, emissions to the air, leachate to groundwater, runoff to surface water as well as the contamination of land. Renfrewshire's SER highlights that the level of waste generated per household in Renfrewshire had been steadily reducing, whilst recycling rates in the council area were increasing. Renfrewshire Council achieved the Scottish Government's targets for household waste of 30% in 2008 and 40% in 2010; however, it is unknown as to whether the subsequent goals of 50% by 2013, 60% by 2020 were achieved in the council area as latest report is over ten years old.

10.2.4. Transport and Material Assets

The construction and maintenance of transport infrastructure in Renfrewshire requires the use of material assets, particularly roads. Asphalt is the most common material used to construct roads; it is a mixture of aggregates, binder and filler. Aggregates are processed mineral materials such as crushed rock, sand, gravel, and various other materials. Binder is used to unite the aggregates together to form a cohesive mixture.

Notably, asphalt can be made using recycled materials or non-petroleum based renewable resources (bio-asphalt). The use of such materials will ensure that non-renewable resources are not depleted.

10.3. Summary of Future Baseline

The consumption of natural resources to maintain Renfrewshire’s transport network has a negative environmental effect. However, if maintenance is not undertaken, the integrity and quality of the transport network would deteriorate to the detriment of accessibility and economic growth. Additionally, there would be impacts on the environment, for example increased GHG emissions from longer travel times.

New infrastructure projects (including transport infrastructure) inherently use material assets and produce waste. It is anticipated that this trend will continue over the coming years.

10.4. Key Sustainability Issues

The following key issues have been identified through the baseline review for this topic:

- There is a need for the construction, maintenance and operation of transport infrastructure to reduce the quantity of primary materials required, make use of surplus materials, and minimise the disposal of waste via landfill.
- Transport infrastructure projects (akin to most development projects) inherently use material assets and produce waste. If not appropriately mitigated, waste can affect the environment through its visual impact or by emissions to the air, leachate to groundwater, and runoff to surface water as well as the contamination of land.

Chapter 12 presents the SEA Framework for this topic.

11. Population and Human Health

11.1. Focus of SEA Topic

- Population.
- Health and wellbeing.
- Crime and community safety.
- Road safety.

11.2. Summary of Current Baseline

11.2.1. Population Estimates and Change

At the time of the 2022 Census, the population of Renfrewshire stood at 183,800. National Records of Scotland's (NRS) mid-2017 population estimates put the population of Renfrewshire at 176,830 in 2017. Hence, between 2017 and 2022 the population increased by 4%. For comparison, the population of neighbouring Glasgow City recorded a very small decrease (0.05%), whilst the overall population of Scotland increased by 0.2%, during the same time period.

Over a longer period, between 2001 and 2021, the population of Renfrewshire has increased by 4.1%. Meanwhile, the population nationally has increased by 8.2%.

In terms of population age, the 45-64 age group was the largest in Renfrewshire in 2021, with a population of 50,823 (28.2%). In contrast, the 75+ age group was the smallest, with a population of 15,538. Between 2001 and 2021, the 0-15 age group saw the largest percentage decrease (-11.1%), whilst the 75+ age group saw the largest percentage increase (+36.7%).

11.2.2. Scottish Index of Multiple Deprivation

The [Scottish Index of Multiple Deprivation](#) (SIMD) is a relative measure of deprivation across 6,976 small areas (called data zones). If an area is identified as 'deprived', this can relate to people having a low income but it can also mean fewer resources or opportunities. SIMD looks at the extent to which an area (known as a 'data zone') is

deprived across seven domains (income, employment, education, health, access to services, crime and housing). The SIMD provides each data zone with a ranking, from most deprived (ranked 1) to least deprived (ranked 6,976).

It is worth noting that SIMD is an area-based measure of relative deprivation: not every person in a highly deprived area will be experiencing high levels of deprivation. Data zones in rural areas tend to cover a large land area and reflect a more mixed picture of people experiencing different levels of deprivation. This means that SIMD is less helpful at identifying the smaller pockets of deprivation found in more rural areas, compared to the larger pockets found in urban areas.

The [SIMD \(2020\) mapping tool](#) shows that there are areas in Renfrewshire that fall within the 10% most deprived data zones in Scotland. These can be found in parts of Johnstone, Linwood, Paisley, and west Renfrew.

Renfrewshire's SER outlines that there are pockets of deprivation dispersed through the Renfrewshire area and people in these communities may experience disadvantage, and encounter problems associated with low income, poor health, low educational attainment and lack of access to learning opportunities and employment.

In 2022 Renfrewshire Council launched its 10-year '[Housing-led Regeneration and Renewal Programme](#)'. The Programme will invest £100 million into the Council's housing stock in eight areas of Renfrewshire that fall within the 5% most deprived SIMD data zones. This investment will not only enhance the housing conditions in these areas but will also contribute to the improvement of their communities (which may have knock-on effects such as an increase in the use of green space and more active travel journeys).

11.2.3. Health and Wellbeing

According to Renfrewshire SER, the health of the council area's population is 'fair' but leaning towards 'poor', and below the national average for employment and alcohol related deaths indicators. This is particularly evident within communities identified as economically, socially and environmentally deprived. The Report also notes that Renfrewshire has a relatively high level of crime compared to other areas of Scotland.

There is well documented evidence that environmental deprivation is related to health and health behaviour. Access to good quality greenspace and the wider countryside are important in promoting healthy lifestyles. The provision of greenspace and access to the

core path is noted as ‘fair’ across Renfrewshire and is generally improving. The SER notes that the settlements of Johnstone, Linwood and Paisley would benefit most from actions to improve the quality of their green spaces.

Data from NRS outlines that Renfrewshire’s life expectancy at birth was higher for females (80.0 years) than for males (75.5 years) during the period 2019-2021. Life expectancy at birth for females and males in Renfrewshire is lower than the national level. Notably, male life expectancy at birth in Renfrewshire has increased more rapidly than female life expectancy at birth between 2001-2003 and 2019-2021.

Data from Scotland’s 2011 Census shows that 51.5% of the population of Renfrewshire during this time were in very good health, 29.2% were in good health, 13.0% were in fair health, 4.8% were in bad health, and 1.5% were in very bad health. In addition, 10.2% of the population provided varying levels of unpaid care during this time. Data from the 2011 Census has been used because topic data from the 2022 Census was not released at the time of writing. Therefore, whilst this data provides some insight into the health of the population, it is recognised that it is not up to date.

The [Scottish Household Survey](#) (SHS) is an annual survey conducted by the Scottish Government that covers a range of areas, including transport. This data is published at a local authority level. Although the sample sizes in this survey are smaller than in the Census they are more up to date and are more reflective of the current travel behaviours of residents. The SHS results for 2022 shows that the main mode of travel to work in Renfrewshire was car or van with 65% of respondents travelling to work this way, and a further 4.0% were passengers in a car or van. Of the remaining modes, 14.0% walked to work, 6.0% took bus and 7.0% travelled by train, with 3.0% using other modes. None of the respondents travelled by bicycle. It is noted that this survey had a small sample size, and therefore does not represent an entirely accurate picture.

11.2.4.Crime and Community Safety

According to [data provided by the Scottish Government](#), there were 9,146 recorded crimes in Renfrewshire during the period 2022/ 2023. This represents 3.2% of all recorded crimes in Scotland during this period, matching its share of the total Scottish population.

With regard to perceptions of crime in Renfrewshire, 78.1% of adults in Renfrewshire perceive the local crime rate as ‘the same or a little or a lot less’ (the equivalent figure for Scotland is 75.0%). This suggests that 19.4% of adults in Renfrewshire perceive the local

crime rate as deteriorating over the period of 2019-2021. This data is also available from the [Scottish Government website](#).

11.2.5. Road Safety

Results from the Reported Road Casualty Statistics (RRCS) (which uses data from Police Scotland for people killed or seriously injured on Scotland's roads) show that number of people seriously injured on roads in Renfrewshire decreased for the periods 2012-2016 to 2018-2022 (81 people down to 54 people) and that the number of people killed on roads in Renfrewshire decreased slightly in the same period from 2012-2016 to 2018-2022, from 5 people down to 3. It should be noted that this analysis uses a moving 5-year average which helps negate large year-to-year fluctuations in the data.

11.3. Summary of Future Baseline

Renfrewshire has an aging population, with a 36.7% increase in the 75+ age group between 2001 and 2021 (National Records of Scotland). This has associated transport and accessibility issues.

New housing and employment provision has the potential to increase traffic and cause congestion at key pinch points on Renfrewshire's transport network. This could lead to declining road safety for pedestrians.

Obesity is seen as an increasing issue by health professionals, and one that will contribute to significant health impacts on individuals, including increasing the risk of a range of diseases, including heart disease, diabetes and some forms of cancer. Transport planning will play a key role in encouraging active transport choices (for example, walking and cycling) as well as accessibility to sports and recreation facilities.

Changes in air quality and noise quality in the vicinity of certain routes in Renfrewshire are likely to take place with the implementation of ongoing transport improvements. This will likely impact upon the health of residents.

11.4. Key Sustainability Issues

The following key issues have been identified through the baseline review for this topic:

- Renfrewshire is experiencing an increase in population, which is likely to translate into a slightly higher demand for transport. The population is also ageing; this has implications for transport provision and accessibility.
- Areas in several settlements in the central-western region of Renfrewshire are amongst the ‘most deprived’ according to the overall SIMD.
- In 2011, 6.3% of the population of Renfrewshire were in bad or very bad health, whilst 10.2% of the population provided varying levels of unpaid care.
- The majority of people in Renfrewshire drive to work and only 14.0% of Renfrewshire’s population walk or cycle to work. This could imply that functioning active travel infrastructure provision across the council area, or access to this provision, is currently limited.
- The SER notes that the settlements of Johnstone, Linwood and Paisley would benefit most from actions to improve the quality of their green spaces.
- There were 9,146 recorded crimes in Renfrewshire during the period 2022 / 2023, representing 3.2% of all recorded crimes in Scotland.
- In terms of road safety, there was an average of 62 road casualties per annum in Renfrewshire for the period 2017-2021.

Chapter 12 presents the SEA Framework for this topic.

12. SEA Framework

12.1. Proposed SEA Framework

Given the breadth of potential impacts, no topics have been screened out of the SEA process. **Table 12-1** below sets out the proposed SEA Framework, providing SEA objectives against each topic.

It is important to note that the Framework is deliberately high-level to ensure flexibility to respond to the scope of the emerging LTS/ alternatives and the latest evidence. Equally, there is flexibility to make modest adjustments to the SEA Framework over the course of the plan-making/ SEA process.

Table 12-1: Proposed SEA Framework

SEA topic	SEA objectives
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Biodiversity, flora and fauna, and geodiversity	Conserve and enhance internationally, nationally, and locally designated sites for biodiversity and geodiversity in accordance with their significance and in line with established good practice. Take a strategic, landscape-scale approach, focused on habitat connectivity across the transport network and climate change resilience. Ensure accordance with the mitigation hierarchy (avoid, mitigate, compensate) in order to reduce negative effects of new transport infrastructure on ecological and geological resources.
Climatic factors	Support climate change mitigation through limiting the contribution of transport to GHG emissions. Support the resilience of the transport network to the potential effects of climate change, including flooding and extreme heat events. Linked to the biodiversity objective, support the restoration of natural processes, and avoid actions that further constrain the natural environment's ability to respond to climate change.
Air quality and noise pollution	Deliver improvements to air quality in Renfrewshire by supporting the use of more sustainable modes of travel, including active travel and public transport. Support the achievement of air quality objectives, including within air quality management areas (AQMA's). Reduce noise from transportation sources.
Soil and water resources	Promote the efficient use of land, with a focus on avoiding the loss of best and most versatile agricultural land as far as possible. Minimise the impact the transport network has on water quality and the physical state of water bodies.

Cultural heritage	Conserve and enhance Renfrewshire’s historic environment, including both designated and non-designated heritage assets. Protect archaeological assets from disturbance as a result of the construction of new transport infrastructure. Consider links to landscape and place-making and promote an understanding of the local heritage resource.
Landscape	Protect and enhance the character, quality and setting of Renfrewshire’s landscape, townscape and villagescape features. Integrate high quality green infrastructure into new transport infrastructure, linking it to the wider landscape. Recognise close links with other objectives, including biodiversity and heritage.
Material assets	Promote sustainable management and design solutions that encourage the reduction, re-use and recycling of waste and materials during the construction, maintenance, and operational phases of transportation projects and schemes.
Population and human health	Improve access to key services, facilities and amenities. Improve access to education, employment and economic opportunities. Improve access to high quality green infrastructure networks. Promote good health by encouraging active modes of travel (for example, walking and cycling). Improve road safety, including for vulnerable users.

13. Next Steps

13.1. Subsequent Stages for the SEA Process

Scoping is the current stage in the five-stage plan-making / SEA process. The next stage will involve appraising ‘reasonable alternatives’ for a range of LTS issues and feeding back initial findings so that they might be considered when preparing the draft LTS. Once the draft LTS has been prepared, it will be subjected to SEA, and an SEA Environmental Report prepared for consultation alongside it.

In accordance with [Schedule 3 of the Environmental Assessment \(Scotland\) Act 2005](#), the SEA Environmental Report must contain a range of specified information including:

- A summary of the likely significant effects on the environment as a result of the LTS policies.
- An appraisal of the draft LTS and reasonable alternatives.
- An outline of the reasons for selecting the alternatives dealt with; and
- Other information including a summary of the SEA scope and a description of measures envisaged for monitoring.

The purpose of providing this information in the SEA Environmental Report is to inform both:

- Those who might want to make representations on the draft LTS approach/ alternatives; and
- Those tasked with finalising the LTS.

Subsequent to consultation on the draft LTS / SEA Environmental Report, updates will be made to the LTS, and where appropriate, further SEA work will be undertaken.

At adoption, a Post-adoption Statement will be prepared. The purpose of the Post-adoption Statement is to: highlight the reasons for choosing the preferred Strategy in light of other reasonable alternatives; how environmental considerations have been integrated into the Strategy’s development process; how consultation responses have been considered; and to highlight what measures have been taken to monitor the significant environmental effects of the LTS.

13.2. Consultation on the Scoping Report

Public involvement through consultation is a key element of the SEA process. At the scoping stage, the SEA Regulations require consultation with the Consultation Authorities (CAs). This Scoping Report will be issued to HES, SEPA and NatureScot via the SEA Gateway.

CAs are invited to comment on the content of this Scoping Report, in particular the evidence base for the SEA, the identified key issues and the proposed SEA Framework.



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