15. Socio-economics, Tourism and Recreation

15.1 Introduction

15.1.1 This chapter of the EIA Report provides an assessment of the likely significant effects from the Proposed Development on identified socio-economic, tourism and recreation (including public access) receptors.

15.1.2 This chapter draws upon relevant conclusions from other technical assessment chapters of this EIA Report, in particular the likely 'primary' environmental or physical effects arising from changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects on the tourism and recreation sector. This assessment should therefore be read in conjunction with: **Chapter 3 – Description of the Proposed Development**, **Chapter 9 – Landscape and Visual Impact Assessment**, **Chapter 10 – Historic Environment**, and **Chapter 14 – Traffic and Transport**, of the EIA Report.

15.2 Relevant Legislation, Policy and Guidance

15.2.1 The overarching policy framework applicable to this EIA Report for the Proposed Development is set out in **Chapter 5 – Planning Policy Context** of the EIA Report. An overview of the policies of specific relevance to this socio-economic, tourism and recreation assessment is provided below.

Legislative Context

15.2.2 The Proposed Development comprises up to two wind turbines, each with a rated capacity of up to 5MW, and a battery storage up to 11MW, resulting in an expected maximum installed capacity of up to 21MW. As detailed within **Chapter 5 – Planning Policy Context,** of the EIA Report, and the Hierarchy Regulations, the Proposed Development is categorised as a 'major' development as it exceeds the 20MW threshold.

15.2.3 The Proposed Development falls within Schedule 2 of the EIA Regulations, as detailed in **Chapter 5** of the EIA Report. From an early stage of the project, the Applicant recognised the likely need to undertake an EIA owing to the potential for significant environmental effects from the Proposed Development.

15.2.4 The EIA process has played a central role in developing the design of the Proposed Development which has been summarised in **Chapter 4 – Approach to Preparing the EIA Report** of the EIA Report.

Planning Policy Context

15.2.5 The Development Plan and other relevant planning policy are discussed in detail within **Chapter 5 – Planning Policy Context** of the EIA Report. The following documents were examined for their relevance to this socio-economic, tourism and recreation assessment of the Proposed Development:

- National Planning Framework 4 (2023);
- East Ayrshire Local Development Plan (2017);

- East Ayrshire Supplementary Planning Guidance (2017);
- East Ayrshire Local Development Plan 2 (2023);
- East Ayrshire Economic Development Strategy (2014);
- Dumfries and Galloway Wind Energy Development: Development Management; Considerations Supplementary Guidance (2020);
- Scotland's National Strategy for Economic Transformation (2022);
- The Scottish Energy Strategy (2017);
- Scotland Outlook 2030 (2021);
- Tourism Scotland (2020);
- Ayrshire and our Islands Visitor Economy Strategy (2023);
- Ayrshire & Arran Tourism Strategy (2012-2017);
- East Ayrshire Tourism Action Plan (2017); and
- A Cultural Strategy for Dumfries and Galloway (2022).

15.2.6 This policy framework highlights the importance of considering net socio-economic effects, including supply chain effects, in this assessment. The Proposed Development provides an opportunity to contribute to national renewable energy targets and the critical measures announced at COP26 to meet the challenges of global warming, in addition to the legislative requirements. The provision of renewable energy infrastructure to support the transition to a low carbon economy together with the impacts on communities, impacts on tourism and recreation, and the delivery of sustainable development are also of relevance to this assessment.

The Development Plan

15.2.7 Section 5.4 of **Chapter 5 – Planning Policy Context** refers to National Planning Framework 4 ('NPF4') which was adopted on 13th February 2023. As a result, the statutory Development Plan covering the Development Site comprises:

- National Planning Framework 4 (NPF4) (2023); and
- East Ayrshire Local Development Plan (2017).

15.2.8 The publication of NPF4 has coincided with the implementation of certain parts of the Planning (Scotland) Act 2019 (the 2019 Act). A key provision is that in the event of any incompatibility between a provision of NPF4 and a provision of a Local Development Plan (LDP), then whichever of them is the later in date will prevail. This is echoed by Section 13 of the 2019 Act, which amends Section 24 of the Town and Country Planning (Scotland) Act 1997 (the 1997 Act).

15.2.9 NPF4 sets out a new national policy position for spatial planning, whilst replacing National Planning Framework 3 ('NPF3') and Scottish Planning Policies ('SPP').

National Planning Framework 4 (2023)

15.2.10 NPF4 sets out the long-term plan for Scotland and guides spatial development, sets out national planning policies, designates national developments and highlights regional spatial priorities. It is part of the development plan, and so influences planning decisions across Scotland. NPF4 provides the spatial strategy for Scotland to 2045 and takes

account of the target of net zero emissions by 2045 set by the Scottish Government. It provides a strong framework for the deployment of renewable energy developments and identifies the need for strategic-scale renewable energy developments, including onshore wind farms.

15.2.11 NPF4 also sets out a range of new policy tests, requirements, and expectations for all developments. Of particular relevance, Policy 11 states that development proposals in relation to energy project "*will only be supported where they maximise net economic impact, including local and community socio-economic benefits such as employment, associated business and supply chain opportunities*".

East Ayrshire Local Development Plan (2017)

15.2.12 The East Ayrshire Local Development Plan ('LDP') 2017 was adopted by East Ayrshire Council ('EAC') in February 2017. The LDP's aim is that *'East Ayrshire will be a desirable place in which to live, work, invest and visit'.*

15.2.13 The LDP contains a number of policies of relevance along with a proposed wind energy spatial framework.

15.2.14 Policy OP1: Overarching Policy sets out a number of criteria relating to general environmental and amenity issues which should be considered in the determination of all development proposals.

15.2.15 Map 12 of the LDP sets out a spatial framework for wind energy development above 50m in height. This spatial framework identifies three groups of areas:

- Group 1: Areas where development will not be acceptable (only applicable to National Parks and National Scenic Areas, none of which are located within East Ayrshire);
- Group 2: Areas of significant protection; and
- Group 3: Areas with potential for development.

15.2.16 The Development Site covers areas identified within Group 3. In particular, Policy RE3 (Wind Energy Proposals over 50m in height) provides support for proposed wind energy developments in Group 3 areas *"where it can be demonstrated that they are acceptable in terms of all applicable Renewable Energy Assessment Criteria set out in Schedule 1".*

15.2.17 Schedule 1 sets out a number of assessment criteria for renewable energy developments, including:

- Landscape and visual impacts;
- Cumulative impacts;
- Impacts on tourism and recreation;
- Public access including impact on long distance walking and cycling routes and scenic routes identified in National Planning Framework 3 ('NPF3') amended; and
- Net economic impact, including local and community socio-economic benefits such as employment, associated business and supply chain opportunities.

15.2.18 Other relevant policies include:

- Policy RE5: Wind Energy and the Landscape;
- Policy TOUR4: The Dark Sky Park;
- Policy TOUR5: Galloway and Southern Ayrshire Biosphere;

- Policy T4: Development and Protection of Core Paths and Natural Routes;
- Policy ENV7: Wild Land and Sensitive Landscape Areas;
- Policy ENV8: Protecting and Enhancing the Landscape; and
- Policy ENV12: Water, Air and Light and Noise Pollution.

East Ayrshire Supplementary Planning Guidance (2017)

15.2.19 The East Ayrshire Supplementary Planning Guidance 'Planning for Wind' (2017) has been adopted by EAC and therefore forms part of, and has the same weight as, the LDP. The Supplementary Planning Guidance recognises that tourism is a key element of the wider economy. It requires wind energy applications to provide an assessment of any potential impacts of the development on relevant tourism resources including the Dark Sky Park and Scottish Dark Sky Observatory, heritage and cultural attractions and their setting, important strategic routes, the core path network and rights of way, the high scenic and landscape quality of the Irvine and Doon Valleys, Loch Doon and Glen Afton and associated hill tops and viewpoints, and the Galloway and Southern Ayrshire Biosphere.

15.2.20 The Supplementary Planning Guidance recognises that wind energy developments have the potential to contribute positively to the local economy, as discussed in Section 3.2.3 of the Guidance. It requires proposals to be accompanied by detailed information outlining the economic benefits of the development for the local area and at a regional and national level, including direct job creation associated with construction and operation, indirect job creation and supply-chain opportunities for local businesses, and wider benefits to the local economy pertaining to any particular recreational/public access features that the proposal may include.

East Ayrshire Local Development Plan 2 (2023)

15.2.21 On 5th December 2022, EAC submitted Local Development Plan 2 ('LDP2') to the Scottish Ministers for Examination. The plan and all necessary paperwork were submitted on 24 February 2023. The submission is now being processed and once adopted, it will supersede the East Ayrshire Local Development Plan (2017) and the East Ayrshire Minerals Local Development Plan (2020) to form the Development Plan for East Ayrshire.

15.2.22 Policies of relevance within the East Ayrshire LDP2 include Policy: RE1 Renewable Energy and Policy SS12: Making space in settlements for green energy. The relevant sections of Policy RE1 seeks to protect environmental receptors including the landscape, cultural and natural heritage, water, air quality and general amenity from unacceptable significant impact. Policy SS12 provides support for renewable development in green and blue spaces and making use of vacant land or brownfield sites.

15.2.23 Other relevant policies include:

- Policy SS6: Galloway and Southern Ayrshire Biosphere;
- Policy SS11: Skills & Employment;
- Policy OS2: Safeguarded Open Space;
- Policy NE3: Local Landscape Area;
- Policy TOUR4: The Dark Sky Park;
- Policy INF1: Infrastructure First;
- Policy WM2: Development & the Circular Economy; and

- Policy FIN1: Financial Guarantees.

East Ayrshire Economic Development Strategy (2014)

15.2.24 The current economic development strategy for East Ayrshire sets out the baseline economic position of East Ayrshire and a series of economic development priorities with associated key actions for the local authority over the period 2014-2025. The Strategy[82] is aligned with the vision set out in the approved East Ayrshire Community Plan (2015), namely, to create:

"A thriving area with a strong local economy delivering higher levels of sustainable growth and employment for the benefit of existing and future residents".

15.2.25 Six key priorities are identified to implement this economic development vision:

- Integrate East Ayrshire with the regional economy;
- Facilitate economic restructuring;
- Improve the vibrancy of our town centres;
- Improve the quality of the tourism offer;
- Increase economic participation in our communities; and
- Accelerate the pace of infrastructure improvements.

15.2.26 Under Priority 2 – Economic Restructuring, renewables are identified as a *"primary growth sector"* and the need to *"support rural diversification and spread the benefits of investment across our communities"* is acknowledged.

Other Policy Documents

Dumfries and Galloway Supplementary Planning Guidance 'Wind Energy Development: Development Management Considerations' (2020)

15.2.27 The Dumfries and Galloway Supplementary Planning Guidance 'Wind Energy Development: Development Management Considerations' (2020) has been adopted by Dumfries and Galloway Council and forms part of, and has the same weight as, the adopted Dumfries and Galloway Local Development Plan 2 (2019). The Supplementary Planning Guidance requires applications to be supported by an accurate assessment of the potential socio-economic effects of the development including cumulative effects and, if necessary, any mitigation measures. This includes the overall number of jobs created and economic activity associated with procurement, construction, operation (including ongoing maintenance) and decommissioning/restoration. The Supplementary Planning Guidance identifies tourism as an important element of the local economy and therefore any detrimental impacts on this economic sector resulting from wind energy developments should be minimised. Applicants are required to demonstrate how they have taken into account local tourism and recreational facilities, including tourist accommodation, the impact the development may have on these facilities, the impact from viewpoints, the impact on the factors which contribute to the appeal of these destinations, and any mitigation measures they think are appropriate to overcome issues identified.

[82] East Ayrshire Economic Development Strategy (2014-2025).Available at: https://www.east-ayrshire.gov.uk/Resources/PDF/E/EconomicDevelopmentStrategy2014-2025.pdf (Accessed 09/03/20)

Scotland's National Strategy for Economic Transformation (2022)

15.2.28 This Strategy is focused on a small number of priorities. It focuses on five policy programmes with the greatest potential benefit and how to deliver them, rather than address every potentially beneficial action for every industry. The programmes have been carefully chosen, based on the evidence.

15.2.29 A sixth programme on delivery introduces a new streamlined delivery model in which all participants are clear about their roles and accept accountability for their actions. The strategy will draw on the strengths of people and organisations from all sectors of the economy – a "Team Scotland" approach. In combination, these six programmes are intended to transform the Scottish economy over the next decade and drive economic opportunities.

The Scottish Energy Strategy (2017)

15.2.30 The Scottish Energy Strategy (2017) sets out the Scottish Government's vision for the future energy system, focusing on a vision for Scotland by the year 2050.

15.2.31 The Strategy states that "*a diverse, well balanced energy supply portfolio or 'energy mix' will remain essential as Scotland decarbonises, providing the basis for secure and affordable heat, mobility, and power in future decades*".

Scotland Outlook 2030 (2021)

15.2.32 Scotland Outlook 2030, has been developed through an equal partnership between the Scottish Tourism Alliance, Scottish Government, VisitScotland, Scottish Enterprise, Highlands and Islands Enterprise and Skills Development Scotland. It has been guided by the Strategy Steering Group with representatives from industry, public bodies, and the partner organisations.

15.2.33 The strategy looks at sustainable growth and the impact which tourism will have on being able to deliver the strategy against the backdrop of a climate crisis. As the nation is transitioning to a net-zero society, the industry must reflect the strategy through thoughts, decisions, and activity. The strategy aims to look at all aspects of sustainability - from the benefits that are delivered to tourist destinations, commitment to the green agenda, and support to the local and wider environment. This is central to the vision of being able to create a country that is a world leader in 21st century tourism. Sustainable growth is about increased value for all.

Ayrshire and Our Islands Visitor Economy Strategy (2023)

15.2.34 The Strategy was launched on 15 March 2023 by the Ayrshire & Arran Destination Alliance. It sets out four regional strategic priorities:

- Connect our high quality, memorable experiences;
- Connect our diverse businesses to grow and build community prosperity;
- Regenerate the region through the talent and creativity of our people; and
- Harness our natural and place-based assets to enhance our environment for the benefit of visitors and our communities.

East Ayrshire Tourism Action Plan (2017)

15.2.35 This Plan highlights the importance of sustainable tourism development and specifically calls for growth in the green tourism sector. One of the strategy's key objectives is to strengthen the promotion of East Ayrshire as a green tourism destination.

Ayrshire & Arran Tourism Strategy (2012)

15.2.36 Published by the Ayrshire Economic Partnership, this Strategy is supported by four relevant objectives:

- *"Increase annual number of visitors coming to Ayrshire and Arran by 10%, from 3.50 million to 3.85 million;*
- *Increase annual spend by visitors by 20% from £348 million to £418 million;*
- *Increase employment supported by the sector by 10% from 8,915 jobs to 9,807 jobs; and*
- *Enhance and conserve the region's natural, heritage and cultural assets".*

15.2.37 The Strategy identifies eight important tourism offers in Ayrshire and Arran, all of which have significant growth potential: "*Culture & Heritage, including Burns, Activities & Natural Environment, Golf, Sailing, Food & Drink, Islands, Weddings & Civil Partnerships, and Business Tourism".*

A Cultural Strategy for Dumfries and Galloway (2022)

15.2.38 This Strategy acknowledges the importance of the tourism sector to the local and regional economy, noting the opportunity to exploit the potential of cultural tourism and to build upon existing successes.

Technical Guidance

15.2.39 There are no specific guidelines or requirements for socio-economic assessment either set out by statutory or advisory guidance regarding the preparation of EIA Reports. The assessment of the likely significant socio-economic, tourism and recreation effects of the Proposed Development presented in this chapter has followed a methodology taking cognisance of the following reports and guidance:

- BiGGAR Economics for Renewable UK. (2021) Wind Farms & Tourism Trends in Scotland: Evidence from 44 Wind Farms (The BiGGAR Report 2021);
- IEMA. (2017) Guidelines for Environmental Impact Assessment;
- NatureScot. (2014) A handbook on environmental impact assessment: Guidance for Competent Authorities, Consultees and others involved in the Environmental Impact Assessment Process in Scotland;
- HM Treasury, The Green Book: Central Government Guidance on Appraisal and Evaluation (2022);
- Historic Environment Scotland (2016) (Updated 2020) Managing Change in the Historic Environment: Setting; and
- Historic Environment Scotland (2018) Environmental Impact Assessment Handbook

15.3 Consultation

15.3.1 Throughout the scoping process, and subsequently during the ongoing EIA process, relevant organisations were contacted with regards to the Proposed Development. **Table 15.1** outlines the consultation responses received in relation to socio-economics, tourism and recreation.

Table 15.1 Scoping Responses

Consultee	Issue Raised	Response and where Considered in this chapter
East Ayrshire Council	*"The EIA Report should address the consequences of the development for users of the countryside and its direct and indirect impacts on tourism and recreational interests and resources in the vicinity."* *"Strategies for long term public access to the site for recreational uses during its operational phase should be considered including any options for connections to be made with surrounding land and uses."* *"Management of public access to the site during the construction, operational and decommissioning periods of the application site should be detailed."* *"The EIA Report should also address the economic aspects of the project including any community benefit or other benefits accruing locally, regionally and nationally by way of jobs and investment."*	**Chapter 9 – Landscape and Visual Impact** of the EIA Report assess the amenity effects of the Proposed Development. As discussed in **Section 15.3**, this chapter considers the likely tourism, recreation and public access effects of the Proposed Development underpinned by the identification of key components of the tourism and recreation business sector and public access routes with the potential to be affected by the Proposed Development. As discussed in **Section 15.3**, this chapter considers the direct and indirect effects on recreation and public access, including impacts to key public access routes such as core paths and Public Rights of Way (PRoW), during the construction, operational and decommissioning phases of the Proposed Development. Effects on public access are further assessed in **Chapter 9 - Landscape and Visual Impact** (including the amenity assessment of public access) and **Chapter 14 – Traffic and Transport** of the EIA Report**.** As raised in **Chapter 3 – Description of the Proposed Development** of the EIA Report, a Construction Environment Management Plan (CEMP) will accompany the application for the Proposed Development. Of relevance to the issues raised, the CEMP will include measures and procedures to manage public access and amenity effects during construction. As detailed in the EIA Scoping Report submitted in February 2020 (**Appendix 4A**) and **Section 15.3** of this chapter, the assessment presented shall considered the direct and indirect effects regarding the employment/labour market, relevant key business sectors (e.g., construction and tourism and recreation), and local communities resulting from inward investment from the Proposed Development.

Consultee	Issue Raised	Response and where Considered in this chapter
East Ayrshire Leisure	*"It is noted that the management of public access is not mentioned within the scoping report, nor has an Outdoor Access Management Plan been submitted"* *"It is recommended that an Outdoor Access Management Plan is produced and submitted as part of the EIA. This must be a robust document that provides details such as proposed alternative public access provision during the construction and decommission phases, as well as proposed access opportunities that will be provided during the operational phase, including technical specifications. A signage plan for each phase, and a path maintenance and monitoring schedule should also be included."*	As detailed in the EIA Scoping Report submitted in February 2020 (**Appendix 4A**), this chapter will consider tourist and recreational activities along with any core paths of Public Rights of Way (PRoW) within or surrounding the Development Site identified within **Chapter 9 – Landscape and Visual Impact** of the EIA Report (whilst amenity effects for those using access routes will be considered within **Chapter 9 – Landscape and Visual Impact** of the EIA Report). The Project area is not frequently accessed by members of the public and therefore it is not considered that an Outdoor Access Management Plan will be required. Access to the Development Site will, however, be promoted through walker accessible gates and signage (where agreed with other third parties, such as Forestry and Land Scotland (FLS) and Pencloe Wind Farm). As discussed in **Section 15.6**, the CMS for the Proposed Development includes a Construction Traffic Management Plan (CTMP) to be secured through a planning condition. The CTMP will seek to minimise the traffic and transport effect from the Proposed Development, through the construction phase, with consideration given towards matters such as peak traffic periods and signage. The CTMP will be developed via discussions between the local roads authority and the construction contractor.
NatureScot	*"SNH guidance on landscape and visual impacts of wind farms can be found on our website. We would recommend that this guidance is taken into account when you consider the landscape and visual impacts of this proposal."* *"You may also find the East Ayrshire Landscape Wind Capacity Study (2018) helpful."* *"Due to the proximity of Dumfries and Galloway Council you should also refer to the Dumfries & Galloway Wind Farm Landscape Capacity Study (2017)."*	As discussed in **Section 15.5** and **Section 15.5** of this chapter, alongside **Chapter 9 – Landscape and Visual Impact** of the EIA Report, this chapter has given cognisance to the guidance and landscape capacity studies raised by NatureScot.
RSPB Scotland	*"We would also wish to see any compensatory planting for the forest lost during construction of this*	See **Appendix 3A** of the EIA Report for further information.

Consultee	Issue Raised	Response and where Considered in this chapter
	windfarm to be planted in a way that is sympathetic to the biodiversity of the chosen area. For this reason, we would recommend that native broadleaved trees and scots pine are used as compensatory species, and that encroachment onto valuable open habitats is avoided where possible."	
Historic Environment Scotland (HES)	*"We recommend that the assessment methodology makes reference to our Managing Change guidance note on Setting and the recently updated EIA Handbook."*	As discussed in **Section 15.5** and **Section 15.5** of this chapter, alongside **Chapter 10 – Historic Environment** of the EIA Report, this chapter has given cognisance to the guidance raised by HES in the assessment presented.

15.3.2 A number of community consultation events were held from April to June 2023. The initial public consultation took place on 25 April 2023 with a community drop-in event. There were 33 people in attendance at this event. Following this, two further consultations were held on 14 and 28 June 2023. There were 12 attendees on 14 June and 13 on 28 June 2023.

15.3.3 During all three events, members of the project team were available to answer questions and provide feedback forms to attendees. Representatives of the project team also attended the New Cumnock Community Council Meeting on 26th April 2023.

15.3.4 Concerns raised related to too many turbines in the area, speeding traffic, visual impacts and damage to the countryside and nature including destruction of peat. Feedback received from the consultation relating to the layout was largely neutral with one liking it and two with specific concerns.

15.4 Methodology

15.4.1 This section provides an overview of the data gathering methodology which has been used for this socio-economic assessment.

Assessment Scope

15.4.2 This socio-economic, tourism and recreation assessment follows the approach set out in the EIA Scoping Report submitted in February 2020 (**Appendix 4B**) and conforms with the subsequent EIA Scoping Opinion issued by East Ayrshire Council (April 2020) (**Appendix 4A**). In doing so, it takes into consideration associated consultation responses from statutory and other consultees. The responses to consultation is discussed further in **Section 15.3**.

15.4.3 The assessment of receptor sensitivity has been informed by publicly available information sources and other technical chapters of relevance submitted within this EIA Report.

15.4.4 The principal aspects considered within this assessment are:

- Direct, indirect and induced employment/labour market effects during the construction, operational and decommissioning phases of the Proposed Development.

- Direct and indirect effects on relevant key business sectors (e.g., construction and tourism and recreation) during the construction, operational and decommissioning phases of the Proposed Development.
- Direct and indirect effects on local communities resulting from inward investment, during the construction, operational and decommissioning phases of the Proposed Development.
- Direct and indirect effects on tourism catalysed by changes attributable to the operation or decommissioning phases of the Proposed Development.
- Direct and indirect effects on recreation and public access, including impacts to key public access routes such as core paths and Public Rights of Way ('PRoW'), during the construction, operational and decommissioning phases of the Proposed Development. Effects on public access are further assessed in **Chapter 9 – Landscape and Visual Impact** (including the amenity assessment of public access) and **Chapter 14 – Traffic and Transport** of the EIA Report.

Study Area

15.4.5 The following Study Areas have been adopted, each focused upon the geographical area where socio-economic, tourism and recreation effects are likely to occur, and which have the potential to be significant in the context of the EIA Regulations:

- **Socio-economics and Labour Study Area:** East Ayrshire Local Authority ('LA') area forms the Study Area extent; and
- **Tourism and Recreation Study Area (including public access):** The Zone of Theoretical Visibility ('ZTV') and viewpoint analysis presented in **Chapter 9 – Landscape and Visual Impact Assessment** indicates that significant visual and cumulative effects extend out up to 6.8km from the nearest turbine locations. Taking a precautionary approach, and drawing from consultation advice and best practice guidance, the visual assessment has been focused on receptors within a 10km Study Area. This 10km Study Area has been adopted for the purpose of the Tourism and Recreation Study Area, enabling consistency with **Chapter 9 – Landscape and Visual Impact Assessment** and taking cognisance of the relationship between visual effects and amenity/experiential value of a receptor.

Baseline Data Collection

15.4.6 To inform the assessment, a desk-based review of publicly available data was undertaken, to establish relevant baseline socio-economic, tourism and recreation conditions at the Development Site and within each of the identified aforementioned Study Areas. The following sources have been used to inform the assessment of likely effects: standard socio-economic and demographic data from available datasets; NOMIS (the Office for National Statistics website); standard sources of tourist and visitor data found on Visit Scotland's website; and other individual research reports. Conclusions on previous surveys carried out regarding attitudes to wind farms have also been reviewed.

15.4.7 A desk–based analysis has been carried out to determine key factors which influence the tourism within the Study Area. Relevant baseline conditions are presented separately for the Socio-economic and Labour Market Study Area and the Tourism and Recreation Study Areas, based on publicly available information at the time of writing. Scotland has been used as a comparator for the Study Areas where appropriate.

Approach to the Assessment

15.4.8 The following subheadings present the approach to assessment for the Socio-Economic Assessment and the Tourism and Recreation Assessment. Each section clearly presents the criteria used to determine the sensitivity of a receptor and the magnitude of change from the presence of the Proposed Development.

Approach to Socio-economic Assessment

15.4.9 This socio-economic assessment follows the approach set out in the EIA Scoping Report submitted in February 2020 (**Appendix 4B**) and conforms with the subsequent EIA Scoping Opinion issued by East Ayrshire Council (April 2020) (**Appendix 4A**). In doing so, it takes into consideration associated consultation responses from statutory and other consultees. It, moreover, takes cognisance of the community consultation undertaken on 25th April 2023, 14th June 2023 and 28th June 2023. The Assessment Scope is discussed in **Section 15.4.4** and the applicable Study Area is discussed in Paragraph 15.4.5.

15.4.10 Best practice principles have been applied to assess the employment and labour market impact of the Proposed Development. An economic impact model, consistent with appraisal guidance, has been used to measure net additional employment and GVA[83].

15.4.11 The method adopted for this assessment draws on publicly available information and is based upon:

- Establishing the baseline conditions to determine the existing socio-economic characteristics in accordance with the aforementioned Study Areas;
- Defining receptor sensitivity to the Proposed Development where possible;
- Identifying the potential change that a receptor would experience as a result of a Proposed Development, with consideration given to its magnitude, temporal scope (e.g., short/long term, temporary/permanent) and valency (i.e., adverse/beneficial);
- Identifying the significance of the potential socio-economic effects;
- Identifying mitigation measures where significant adverse effects are predicted; and
- Identifying any residual effects after mitigation.

Sensitivity

15.4.12 For employment effects, the availability of labour and skills is critical in accommodating the demands, needs and requirements of the Proposed Development. Adequate labour and skills capacity results in a low sensitivity, while limited labour and skills capacity results in a high sensitivity. Sensitivity criteria in terms of employment are shown in **Table 15.2** below.

Table 15.2: Sensitivity criteria - Socioeconomics

Sensitivity	Definition
Very High	Where there is the requirement for very technical specialist input, which is difficult to source at a national level and/or there is very low labour or skills at a local level.

[83] The economic impact model allows the guidance to be applied to the quantitative elements of the employment impact assessment

Sensitivity	Definition
	Where the economy has no realistic capacity to manage adverse changes to their operations.
High	Where there is some requirement for technical specialist input, which is difficult to source at a national level and / or where there is limited labour or skills available at the local level. Where the economy has little capacity to manage adverse changes to its operations.
Medium	Where there is limited requirement for very technical specialist input, which is difficult to source at a national level, and/or where there are some constraints to the availability of labour or skills at the local level. Where the economy has capacity to manage adverse changes to their operations.
Low	Where there no requirement for technical specialist input, and / or where there is a readily available labour force and skills. Where the economy or land uses have substantial capacity to manage adverse changes to their operations.

Magnitude of Change

15.4.13 The magnitude of change from the construction and operation of the Proposed Development on identified socio-economic receptors is determined using the criteria outlined in **Table 15.3** below. This assessment has been informed by all publicly available information sources at the time of this assessment. Note the change may be beneficial or adverse in all instances.

Table 15.3: Magnitude of Change - Socioeconomics

Magnitude of Change	Definition
Very High	An impact that would be very adverse/beneficial and is very likely to affect the operations of businesses.
High	An impact that would be adverse/beneficial and is likely to affect the operations of businesses.
Medium	An impact that would be adverse/beneficial and that may have some effect on the operations of businesses.
Low	An impact that is anticipated to have a slight effect (either adversely or beneficially) and is unlikely to have any effect on the operations of businesses.

Approach to Tourism and Recreation Assessment

15.4.14 As noted above, this assessment follows the approach set out in the EIA Scoping Report (February 2020) (**Appendix 4B**), the EIA Scoping Opinion (April 2020) (**Appendix 4B**) and takes cognisance of the community consultation undertaken on 25th April 2023, 14th June 2023 and 28th June 2023.

15.4.15 The assessment of likely tourism, recreation and public access effects was underpinned by the identification of key components of the tourism and recreation business sector and public access routes with the potential to be affected by the Proposed Development.

15.4.16 Tourist destinations and visitor attractions included in this assessment, include those features that appear as prominent landmarks or landscape features and locations associated with passive recreation such as walking and where there is a clear relationship between the feature / destination and the landscape[84]. Tourism and recreational receptors considered and assessed in this chapter are those for receptors which **Chapter 9 - Landscape and Visual Impact Assessment** and **Chapter 10 - Historic Environment** have identified significant adverse effects.

15.4.17 The Assessment Scope is discussed in **Section 15.4.4** and the applicable Study Area is discussed in Paragraph 15.3.5.

Sensitivity

15.4.18 Sensitivity criteria applied to the tourism and recreation assessment are shown in **Table 15.4** below.

Table 15.4 Sensitivity – Tourism and Recreation

Sensitivity	Definitions
Very High	Where the receptor or resource is defined as being of National (UK) Status.
High	Where the receptor or resource is defined as being National (Scotland) status.
Medium	Where the receptor or resource is defined as being of regional status.
Low	Where the receptor or resource is defined as being of local status.

Magnitude of Change

15.4.19 The magnitude of change from the construction and operation of the Proposed Development on identified tourism and recreation receptors is determined using the criteria outlined in **Table 15.5** below.

Table 15.5: Magnitude of Change – Tourism and Recreation

Magnitude of Change	Definition
Very High	An impact that would be very adverse/beneficial and is very likely to affect the operations of tourist attractions or recreational uses/users.
High	An impact that would be adverse/beneficial and is likely to affect the operations of tourist attractions or recreational uses/users.
Medium	An impact that would be adverse/beneficial and that may have some effect on the operations of tourist attractions or recreational uses/users.

[84] The assessment excludes other recreational / tourist destinations where the focus of activity is indoors, for example museums, libraries, and gift shops. The assessment also excludes locations for sports, such as quad biking and team sports, fishing and hunting / stalking activities, where the primary focus would be activity rather than the landscape.

Low	An impact that is anticipated to have a slight effect (either adversely or beneficially) and is unlikely to have any effect on the operations of tourist attractions or recreational uses/users.

Significance of Effects

15.4.20 In line with standard EIA practice, the sensitivity of receptors is considered against the Magnitude of Change to determine the significance of effect (see **Table 15.6** below). Major effects are significant in EIA terms, moderate effects are probably significant in EIA terms and minor/negligible effects are not significant in EIA terms.

Table 15.6 Significance Matrix of Effects

		Magnitude of change				
		Very high	High	Medium	Low	Very low
Sensitivity/importance/value	Very high	Major (Significant)	Major (Significant)	Major (Significant)	Major (Significant)	Moderate (Probably significant)
	High	Major (Significant)	Major (Significant)	Major (Significant)	Moderate (Probably significant)	Minor (Not significant)
	Medium	Major (Significant)	Major (Significant)	Moderate (Probably significant)	Minor (Not significant)	Negligible (Not significant)
	Low	Major (Significant)	Moderate (Probably significant)	Minor (Not significant)	Negligible (Not significant)	Negligible (Not significant)
	Very Low	Moderate (Probably significant)	Minor (Not significant)	Negligible (Not significant)	Negligible (Not significant)	Negligible (Not significant)

Approach to Cumulative Impact Assessment (CIA)

15.4.21 The EIA Regulations require assessment of the likely significant cumulative effects of the Proposed Development and other approved developments, at construction and operational stages. In the context of the Proposed Development, the relevant SNH guidance[85] states that the CIA should be undertaken only for operational and consented wind energy development and other planning applications for wind energy development.

15.4.22 A cumulative search was undertaken on 07 February 2023 using data available from relevant planning authority websites and the sites considered for inclusion in the CIA are listed in **Table 4.4** of **Chapter 4 – Approach to Preparing the EIA Report** of the EIA Report.

[85] *Assessing the Cumulative Impact of Onshore Wind Energy Developments*, SNH (2012)

15.4.23 The assessment of cumulative effects in relation to this chapter, are presented in **Section 15.9**.

Assumptions

15.4.24 The following limitations and assumptions have been adopted in this assessment:

Construction Phase

15.4.25 The construction phase assessment has been undertaken assuming a programme of 18 months. This is based on 12 months for the wind farm elements and an additional six months for battery installation, as presented in **Chapter 3 – Description of the Proposed Development** of the EIA Report**.**

Capital Expenditure

15.4.26 Construction costs for the Proposed Development were provided by the client in March 2023 to an estimated value of:

- Construction costs: £2.2m;
- Wind turbine capital expenditure: £8.7m; and
- Total capital expenditure: £21.0m (includes grid connect costs, costs for battery installation and totals all spend up to operations).

15.4.27 It is assumed that the costs have been provided in 2023 prices.

Operational Phase

15.4.28 The Proposed Development would be designed with an operational life of 35 years. During the 35 years, the turbines would be maintained and serviced at regular intervals in accordance with manufacturer recommendations and industry best practice.

Operational Costs

15.4.29 In March 2023, capital expenditure costs for the Proposed Development were identified by RWE to be £21.0 million. It is assumed that the costs relate to 2023 prices.

Operational Employment

15.4.30 At this stage, it is assumed that the operation of the Proposed Development will likely be maintained by existing employees at Enoch Hill 1.

Community Benefits

15.4.31 The Proposed Development will adhere to the Scottish Government best practice guidelines in relation to community benefits.

Decommissioning Phase

15.4.32 As the Proposed Development nears the end of its operational life, a decision will be taken as to whether or not a life extension, repowering or decommissioning will be required. However, for impact assessment purposes, the EIA Report assumes that the project will be decommissioned.

15.4.33 The decommissioning phase assessment has been undertaken assuming that at the end of the operational phase the Applicant will seek to remove the wind turbines, kiosks, control building and substation compound, and battery storage compound and re-instate the Development Site. Upon decommissioning the access tracks would likely be left in situ for future use by landowner and other stakeholders. It is assumed that decommissioning will take up to six months. Consideration of Relevant Receptors

15.4.34 It is important to note that any potential receptor with no or negligible sensitivity to possible socio-economic change(s) arising from the Proposed Development, has no potential to experience likely significant effects (within the context of the EIA Regulations) and have therefore been excluded from this assessment. This ensures the assessment remains proportionate and focused on reporting likely significant effects.

15.4.35 The following receptors have been scoped out of the assessment presented within this chapter:

- Effects on the amenity of local residents, the local community or access due to changes in landscape character, visual amenity or the setting, noise and traffic as these are considered in the relevant EIA Report chapters (i.e., **Chapter 9 – Landscape and Visual Impact Assessment**; **Chapter 7 – Noise and Chapter 14 – Traffic and Transport** of the EIA Report);
- Due to the scale of the project (consisting of two turbines and a battery storage unit), any local demographic changes would be temporary, and very limited in nature. It is therefore predicted that there would be no discernible effects at regional and national level;
- Effects on tourism during the construction period (18 months). This is due to the temporary nature of construction work and the fact that much of the work (excluding the short-term turbine erection which is considered as part of the operational effect) would only be visible from within the Development Site boundary or relatively close to it.

15.4.36 The approach set out in the EIA Scoping Report submitted in February 2020 (**Appendix 4A**) suggested that the direct and indirect effects on public safety (with respect to potential accident or injuries from a wind turbine during operation) would be assessed within this chapter. However, as presented in **Chapter 3 – Description of the Proposed Development** of the EIA Report, such a risk has now been designed out of the development and therefore this matter has been scoped out of a formal assessment within this chapter.

Environmental Measures Embedded into the Development Proposal

15.4.37 Embedded measures of relevance to this technical assessment are discussed further in **Section 15.6**.

15.5 Baseline Conditions

15.5.1 Relevant baseline conditions are presented separately for the Socio-economic and Labour Market Study Area and the Tourism and Recreation Study Areas below, based on publicly available information at the time of writing. Scotland has been used as a comparator for the Study Areas where appropriate.

The Site

15.5.2 The Development Site is located approximately 6km south-west of the settlement of New Cumnock and approximately 9km to the east of Dalmellington in East Ayrshire (see **Figure 1.1**). It is located within the East Ayrshire *Southern Uplands with Forestry LCT,* subsequently referred to as the 'host' landscape, and within the southwestern extent of the locally designated Afton Sensitive Landscape Character Area (SLCA).

15.5.3 The Development Site is located within an extensive area of the Southern Uplands and bounded to the west, south and east by extensive coniferous forestry and Carsphairn Forest.

15.5.4 Access to the Development Site is via Afton Road to the east, which leads to the existing access track through Pencloe Forest.

15.5.5 The derelict Monquhill Farmhouse is located within the Development Site and there are no designated heritage assets within the Development Site boundary.

The Surrounding Area

Surrounding Land Use

15.5.6 Open moorland used for grazing lies to the north of the Development Site, where the site of the consented Enoch Hill Wind Farm is situated. The consented Pencloe Wind Farm is located to the east, and the operational Brockloch Rig (formerly Windy Standard and Windy Standard Extension Wind Farms) is approximately 1.3km to the south. The Carsphairn and Pencloe forests surround the west, south and east of the Development Site. As such, the Southern Uplands with Forestry LCT is already characterised by wind farm development.

15.5.7 The landscape character within 10km (consistent with the Tourism and Recreation Study Area) is classified for wind farm development within the East Ayrshire Council Local Development Plan Non-Statutory Planning Guidance: East Ayrshire Landscape Wind Capacity Study ('EALWCS') (2018) and the Dumfries and Galloway Wind Farm Landscape Capacity Study Supplementary Guidance ('DGWLCS') (2020). Further discussion regarding the EALWCS and DGWLCS wind capacity studies is presented in **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report.

Labour Market and Socio-economic Baseline

15.5.8 In 2021, East Ayrshire had a total population of 122,000. Overall, the Study Area has a lower percentage share of a working age population[86] (at 62.0% compared to 63.8% for Scotland) and a higher pensionable age[87] (at 21.0% compared to 19.6% for Scotland)[88].

15.5.9 **Table 15.7** below presents the key metric of economic activity across the Labour Market Study Area, including economic activity rate which measures the percentage of the population (employed and unemployed) who are active or potentially active members of the labour market.

[86] Aged 16 to 64 years

[87] Aged 65 years and over

[88] ONS (2021) Population estimates - local authority based by five year age band

Table 15.7: Key economic metrics (ONS)

	Economic Activity (16 – 64 years)	Employment Rate (16 – 64 years)	Median Full Time Gross Annual Pay
Socio-economics and Labour Study Area	78.2%	75.3%	£33,964.00
Scotland	76.2%	73.2%	£33,332.00

15.5.10 The Study Area exhibits a higher economic activity rate in comparison to Scotland, demonstrating a high proportion of people who are working, available for work or training. The employment rate suggests the 75.3% are in employment, 2.1% above that for Scotland. This increases economic activity and employment perhaps contributes towards an increase of £632.00 in the Median Full Time Gross Annual Pay in the Study Area.

15.5.11 Job density indicates the available of jobs per resident (16-64 years). The Study Area exhibits there to be less than one job per resident (0.63), below that for Scotland (0.81) (ONS, 2021).

15.5.12 Employment by industry for the Study Area reflects the profile for Scotland in which the leading industry is human health & social work activities (23.53% for East Ayrshire and 15.29% for Scotland) and wholesale & retail trade, repair of motor vehicles and motorcycles (14.12% for Ease Ayrshire and 14.14% for Scotland) (ONS, 2021). This is reflected in employment by occupation figures, in which 20.5% of the Study Area are employed in professional occupations (ONS, 2022).

Key business sector: Construction

15.5.13 The construction sector in the Study Area supports some 2,500 jobs representing 5.88% of total jobs in the Study Area. This is comparative to the national figure of 6.04% jobs in construction (ONS, 2021).

15.5.14 Gross Value Added ('GVA') is a measure of the value of goods and services produced in an area. The ONS publishes regular updates, the most recent was 2019, which reports 2018 data (ONS, 2019).

15.5.15 In 2018 it was estimated that the GVA for the construction industry in the Study Area was £96 million. Dividing this figure by the number of construction employees in 2018 for the Study Area (2,000 employees (ONS, 2018)) demonstrates there to be £48,000 GVA per head within the industry.

Key Business Sector: Tourism Accommodation

15.5.16 The Study Area supports some 3,000 people employed within the Accommodation and Food and Beverage sector in 2021 (ONS,2021).

15.5.17 In 2018, it was estimated that the GVA for the Accommodation and Food and Beverage sector within the Study Area was £41 million. Dividing this figure by the number of employees within the sector in 2018 for the Study Area (3,000 employees (ONS, 2018)) demonstrates there to be £13,667 GVA per head within the industry.

Tourism and Recreation

Economic Importance of Tourism

15.5.18 At the national level, the tourism sector is recognised by the Scottish Government as an important part of the Scottish economy, supporting a range of business activity and employment opportunities (Scottish Government, 2023). The tourism industry is described by Scottish Tourism Alliance as a "*cornerstone of the Scottish Economy and vital to the economic performance of towns, cities, regions across the length and breadth of Scotland*".

15.5.19 The latest available figures show that sustainable tourism generated some £4.1 billion GVA in 2018. Of all overnight visits to Scotland in 2019, some 80% were made by UK residents (comprising 14.1 million trips), while the remaining 20% of overnight visits were from international visitors (comprising 3.5 million trips).

15.5.20 Of all tourism-based businesses in Scotland, hotels and similar accommodation is the largest sector – supporting over 47,000 jobs and generating almost £1.4 billion GVA in 2018 (Visit Scotland, 2020). This is reflective of the fact that the economic contribution of the tourism sector is underpinned by visitor accommodation.

15.5.21 In 2021, Visit Scotland's insight department produced a summary of statistics on tourism for Ayrshire & Arran. It reported on East Ayrshire, North Ayrshire and South Ayrshire council areas (Visit Scotland, 2020). The statistics presented stem from 2019, indicating that overnight trips and expenditure in Ayrshire and Arran decreased from 2018, when they were the highest, they had been in half a decade. Between 2017 and 2019, visitors made nearly 750,000 overnight trips per year to the region, spending nearly 3 million nights annually. Overnight tourism expenditure was £189 million per year on average, a 10% drop from 2016-2018. The vast majority of trips to the region were undertaken by British travellers (89.0% of all trips in 2017-2019). Domestic travellers also accounted for three quarters of all overnight spend in Ayrshire and Arran in the same period.

15.5.22 Within the Ayrshire and Arran region (East Ayrshire, North Ayrshire and South Ayrshire), the tourism economy was worth an annual average of £604m between 2017 and 2019, providing a GVA of £258.5m in 2018 (of which East Ayrshire contributed £50.2m) (Visit Scotland / Alba, 2021). In East Ayrshire there were 208 tourism businesses, employing 2,800 people in 2018.

Tourist Destinations and Visitor Attractions

15.5.23 Dean Castle Country Park was the most popular free visitor attraction in Ayrshire and Arran in 2019 with over 1.3 million visits, with the Maclaurin Galleries next with over 40,000 visits. Culzean Castle and Country Park and Robert Burns Birthplace Museum were the most popular paid attractions with 334,000 and 261,000 visitors respectively (Visit Scotland / Alba, 2021).

15.5.24 The visual assessment presented in **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report includes those receptors that are overlapped by the blade tip ZTV illustrated in **Figures 9.2, 9.4, 9.6,** and **9.7**.

15.5.25 Tourist destinations and visitor attractions included in this assessment, include those features that appear as prominent landmarks or landscape features and locations

associated with passive recreation such as walking and where there is a clear relationship between the feature / destination and the landscape[89].

15.5.26 There is one recreational and tourist destinations within 10km of the Proposed Development, which are overlapped by the blade tip ZTV, Knockshinnoch Lagoons Local Nature Reserve /

15.5.27 Three hill summits are within 10km, overlapped by blade tip ZTV: Cairnsmore of Carsphairn (Corbett); Blackcraig Hill, (Graham); and Windy Standard (Graham).

15.5.28 As detailed in **Chapter 10 – Historic Environment** of the EIA Report, 18 listed buildings within the 10km Study Area, nine of which are located within the Dalmellington Conservation Area (see **Figure 10.1**).

15.5.29 Three scheduled monuments, one Conservation Area (Dalmellington Conservation Area) and one designated Garden and Designed Landscape ('GDL') (Craigengillan Designed Landscape) are located between 5km and 10km of the Development Site (see **Figure 10.1**). Those identified below are considered to be of relevance to this chapter as they are considered to have a tourism or recreational appeal:

Scheduled Monuments

- Kyle Castle;
- Dalmellington Motte; and
- Dalnean Hill (farmstead and field system).

Gardens and Designed Landscape

- Craigengillan Designed Landscape.

15.5.30 The closest designated heritage assets to the Development Site are located within New Cumnock. These have settings which are defined by their immediate surroundings and to which **Chapter 10 – Historic Environment** of the EIA Report concludes that longer views make a minimal contribution. These include a number of Category C[90] and Category B[91] listed buildings. However, upon review, these assets are not considered to form part of a wider tourist or visitor attraction and therefore not considered further in this assessment. It is, however, acknowledged that the Category C Town Hall and Police Station (LB50128) and Category B Martyrs Parish Church (LB14246) and Old Church & Churchyard (LB14247) will attract tourists as a result of their ongoing land use.

15.5.31 Two non-designated heritage assets were identified during scoping (regarding the Historic Environment) as having sensitive settings. Their locations are illustrated on **Figure 10.1** and detailed in **Appendix 10B**. Similar to the above, upon review these assets were not considered to form part of a wider tourist or visitor attraction and therefore not considered further in this assessment.

[89] The assessment excludes other recreational / tourist destinations where the focus of activity is indoors, for example museums, libraries, and gift shops. The assessment also excludes locations for sports, such as quad biking and team sports, fishing and hunting / stalking activities, where the primary focus would be activity rather than the landscape.

[90] As defined by East Ayrshire Council, Category C buildings are of local importance, lesser examples of any period, style, or building type, as originally constructed or moderately altered; and simple traditional buildings which group well with others in categories A and B.

[91] As defined by East Ayrshire Council, Category B buildings are of regional or more than local importance, or major examples of some particular period, style or building type which may have been altered.

Recreational Routes and Paths

15.5.32 The majority of the Development Site is subject to the 'right to roam' under the Land Reform (Scotland) Act 2003 such that access for recreation (including walking and horse riding) is permitted over most of the Development Site. However, the Development Site does not include any publicly accessible footpaths (designated or non-designated) which could easily facilitate recreational activities.

15.5.33 The Tourism and Recreation Study Area consists of a wide range of designated and non-designated/informal routes used by both residents and visitors. The visual assessment presented in within **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report includes those receptors that are overlapped by the blade tip ZTV illustrated in **Figures 9.2, 9.4, 9.6,** and **9.7**.

15.5.34 Recreational routes within the Study Area are as illustrated in **Figures 9.17** and **9.18**. There are no Core Paths or other designated or non-designated walking routes within the Development Site boundary. The local recreational routes within 10km of the Proposed Development that are overlapped by the blade tip ZTV are listed as follows and included in the assessment:

- Core Paths and Rights of Way:
  - EAC Core Path No. C10: Coalfield Cycle Route;
  - EAC Core Path No. C11: Knockshinnoch Lagoons (part of Knockshinnoch Lagoons);
  - EAC Core Path No. C12: New Cumnock Circular;
  - DGC Core Path No. 183 / 667: Circular route within Carsphairn Forest;
  - DGC Core Path No. 594: Between Knockengorroch and Lamford.
  - Rights of Way d and e (numbered 'a-g' on **Figure 9.18**). Routes a, b, c and f are scoped out as described below; and
  - Additional Rights of Way around Lochside Hotel and north of New Cumnock.
- Heritage Paths and Scottish Hill Tracks:
  - Heritage Path and Scottish Hill Track 84: Afton Road (also part Core Path C10: Coalfield Cycle Route).

15.5.35 A number of routes on **Figure 9.18** have been excluded from the assessment as discussed in **Section 9.5** of **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report.

15.5.36 The Afton Road between New Cumnock and Burns Cairn has been included in the assessment of recreational routes as it is overlapped by Core Path C10: Coalfield Cycle Route, a Heritage Path and a Scottish Hill Track.

Wind Farm Literature

15.5.37 There have been a number of studies undertaken over the years to assess public attitudes to wind farms in relation to tourism and recreation. A selection of the studies undertaken are outlined below with some commentary provided on the key findings from these studies.

BIGGAR Economics (2021) Wind Farms & Tourism Trends in Scotland: Evidence from 44 Wind Farms

15.5.38 The report contains the analysis of 44 wind farms case studies in Scotland and found that there is no evidence to show that there is a link between wind farm development and trends in tourism employment.

15.5.39 Results from the BIGGAR Economics could not draw any conclusions on such a relationship. The large variation between the local authorities means that any relationship between growth in turbines and changes to tourism employment is likely to be very weak or non-existent.

15.5.40 It is of note that this analysis was undertaken as an update to the previous 2007 'Review of Evidence on the Impact of Wind Farms on Tourism and Recreation' (BIGGAR Economics, 2017) which also concluded that wind farms are not considered to have an impact on tourism trends.

Quantifying benefits of onshore wind to the UK

15.5.41 In 2019, Vivid Economics published a report seeking to quantify the benefits of onshore wind to the UK. Within this it stated that onshore wind is the cheapest low-carbon generation technology available, and that beyond supporting net zero ambitions it delivers a series of socio-economic benefits. It states that by deploying 35 GW of onshore wind by 2035, this could reduce UK electricity costs by 7%, support 31,000 direct and indirect jobs, lift productivity throughout the UK and enable a £360 million export industry. Of the 31,00 jobs, 2,300 direct jobs are anticipated to be in Scotland.

Summary of Receptor Sensitivity

15.5.42 As discussed in **Section 15.4 – Methodology**, the visitor attractiveness and tourism potential of each of the tourism and recreation receptor groupings could be affected by environmental or socio-economic changes (i.e., 'primary' effects) including likely effects from both the construction or operation of the Proposed Development (as assessed in other technical assessment chapters of this EIA Report).

15.5.43 For employment effects, the availability of labour and skills is critical in accommodating the demands, need and requirements of the Proposed Development and therefore the sensitivity reflects the available supply of these elements.

15.5.44 **Table 15.8** below summarises the sensitivity of socio-economic, tourism and recreation receptors likely to experience effects from the Proposed Development, and therefore require to be considered within the impact assessment presented within this chapter. Cognisance has been given to the sensitivity presented in **Table 9.17** of **Chapter 9 – Landscape and Visual Impact Assessment** and **Table 10.6** of **Chapter 10 – Historic Environment** of the EIA Report**.**

Table 15.8: Summary of Receptor Sensitivity

Receptor	Type of Effect	Sensitivity	Phase of Likely Effect(s)
	Labour Market		
Labour market	Changes in employment	Medium	Construction, Operation and Decommissioning
	Key Business Sectors		
Construction	Changes in sectoral activity and performance	Medium	Construction
Tourism and Recreation	Changes in sectoral activity and performance	Medium	Operation
	Tourism and Visitor Economy		
Recreational Routes			
EAC Core Path No. C10: Coalfield Cycle Route (partly overlaps with and Scottish Hill Track 84: Afton Road, part of the New Cumnock Path Network)	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Medium	Construction, Operation and Decommissioning
EAC Core Path No. C12: New Cumnock Circular	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Medium	Construction, Operation and Decommissioning
EAC Core Path No. C11: Knockshinnoch Lagoons	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Medium	Construction, Operation and Decommissioning
DGC Core Path No. 183 / 667: Circular route within Carsphairn Forest	Changes in landscape character, visual amenity or the setting which may lead to secondary	Medium	Construction, Operation and Decommissioning

Receptor	Type of Effect	Sensitivity	Phase of Likely Effect(s)
	socio-economic effects		
DGC Core Path No. 594: Between Knockengorroch and Lamford	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Medium	Construction, Operation and Decommissioning
Right of Way ‘d’	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Low	Construction, Operation and Decommissioning
Right of Way ‘e’	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Low	Construction, Operation and Decommissioning
Additional Rights of Way Lochside Hotel and north of New Cumnock	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Low	Construction, Operation and Decommissioning
Recreational and Tourist Destinations			
Knockshinnoch Lagoons Local Nature Reserve	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Low	Construction, Operation and Decommissioning
Cairnsmore of Carsphairn (Corbett)	Changes in landscape character, visual amenity or the setting which may lead to secondary	High	Construction, Operation and Decommissioning

Receptor	Type of Effect	Sensitivity	Phase of Likely Effect(s)
	socio-economic effects		
Blackcraig Hill (Graham)	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Medium	Construction, Operation and Decommissioning
Windy Standard (Graham)	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Medium	Construction, Operation and Decommissioning
Scheduled Monuments			
Kyle Castle	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Low	Construction, Operation and Decommissioning
Dalmellington Motte	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Low	Construction, Operation and Decommissioning
Dalnean Hill	Changes in landscape character, visual amenity or the setting which may lead to secondary socio-economic effects	Low	Construction, Operation and Decommissioning
Gardens and Designed Landscape			
Craigengillan Designed Landscape	Changes in landscape character, visual amenity or the setting which may	Medium	Construction, Operation and Decommissioning

Receptor	Type of Effect	Sensitivity	Phase of Likely Effect(s)
	lead to secondary socio-economic effects		

Future Baseline

15.5.45 A lifespan of approximately 37 years (including construction, operation and decommissioning)[92] has been considered for the purpose of the socio economic and tourism assessment of the Proposed Development.

15.5.46 There is no information available to suggest that there would be any specific changes to the existing socio-economic, tourism and recreation receptors identified in the baseline in the future. For the purposes of this assessment, it is assumed that they will continue to operate into the future as identified in the existing baseline.

15.5.47 Reasonably foreseeable changes to the future baseline, in respect of other wind energy development, is anticipated to demonstrate a gradual decline as a result of the existing time limited consents of other wind energy developments. This is discussed further in **Section 9.5** of **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report**.**

15.6 Environmental Measures Embedded into the Development Proposal

15.6.1 The design evolution for the Proposed Development is provided in **Chapter 2 – Site Selection and Design Evolution** of the EIA Report and a project description, including the associated infrastructure, is detailed in **Chapter 3 – Description of the Proposed Development** of the EIA Report.

15.6.2 Design features and embedded mitigation measures have been built-in into the design and construction of the Proposed Development to avoid, prevent or minimise significant adverse environmental effects and to enhance beneficial effects. Embedded mitigation measures of relevance are set out below:

- **Construction Method Statement ('CMS'):** The Applicant will engage a Contractor to construct the Proposed Development. The CMS will be supported by a number of documents to reduce or mitigate the environmental impact of the construction phase including Construction Environmental Management Plan ('CEMP'), Pollution Prevention Plan ('PPP'), and Site Waste Management Plan ('SWMP'). Emergency procedures will fall under the wider CMS. Of relevance to this assessment, the CEMP will include measures and procedures to manage public access and amenity effects during construction, including to existing residential development and open and community space.
- **Landscape Design Statement:** The Proposed Development has been designed to balance technical and project requirements with a need to safeguard the environment and satisfactorily accommodate the Proposed Development within its landscape setting. The design evolution has aimed to reduce landscape, visual and cumulative effects and to respect the landscape characteristics identified in the EALWCS and the DGWLCS. This is discussed further in **Chapter 9 – Landscape and Visual Impact**

[92] 37 years is based on: 18 months construction; 35 years operation; and 6 months decommissioning

Assessment of the EIA Report. However, it is of note that development of the wind farm draws upon the guidance set out in SNH guidance 'Good Practice during Wind Farm Construction' (2010).

15.7 Assessment of Likely Effects

15.7.1 **Chapter 3 – Description of the Proposed Development** of the EIA Report presents the description of the Proposed Development, the parameters of which have informed the assessment of likely effect presented below. The location and layout of the Proposed Development is shown in **Figure 1.1**, **Figure 3.1A and Figure 3.1B**

Construction Phase

Capital Expenditure

15.7.2 The construction of the Proposed Development is expected to require a total capital expenditure of £21 million. This information has been derived from the Applicant's estimates and also matches the BEIS report, Electricity Generation Costs 2020, which estimates that by 2025 construction costs for onshore wind will be around £1m per MW. This spend will give rise to employment and associated expenditure in the economy (direct, indirect and induced) as detailed below.

15.7.3 The construction phase of the Proposed Development will run over a programme of 18 months, based on 12 months for the wind farm elements and an additional 6 months for battery installation.

15.7.4 The economic impact assessment set out within the O'Herlihy report (2006) splits construction spend by turbine manufacturing and construction and installations costs. The O'Herlihy report (2006) identifies that approximately 65% of the total capital spend for a proposed wind farm relates to the cost of manufacturing wind turbines, with the remaining 35% related to onsite construction (balance of plant) and installation work. The RenewableUK Report (2015) supports this analysis as it calculates that turbine manufacturing accounts for 64.4% of total capital expenditure, balance of plant contracts accounts for 28.6% and grid connections account for 7.1%.

15.7.5 Using an expenditure distribution profile of 35% for onsite construction works, the Proposed Development could therefore generate capital expenditure of £7.4m.

Gross Construction Employment

15.7.6 To calculate gross construction employment can be estimated by dividing the construction spend estimate (£7.4 million) by the average annual turnover required to support an employee in the construction sector within the Study Area.

15.7.7 Analysis of the Annual Business Survey (ONS, 2019) and the Business Register and Employment Survey (ONS, 2019) suggests that a turnover of £103,889 per annum is required on average to support a single construction employee in East Ayrshire in 2019 (SABS, 2019).

15.7.8 Applying the GDP price deflator[93] to uprate this to 2023 prices[94] suggests that a turnover of £129,588 per annum is required on average to support a single construction employee in East Ayrshire in 2023.

[93] The GDP price deflator measures the changes in prices for all of the goods and services produced in an economy

[94] GDP deflator applied: 1.24736893

15.7.9 The construction of the Proposed Development is therefore estimated to support a total 57 gross temporary construction jobs over the 18-month construction programme across the Study Area.

Net Additional Employment

15.7.10 Due to mobility of labour, competition from externally located construction firms and supply chains, only a proportion of total construction employment would occur within the Study Area. Additionality assumptions detailed in **Table 15.9** below have been used to calculate the net construction employment.

Table 15.9: Construction Additionality Assumptions

Data	Study Area (East Ayrshire)	Commentary
Deadweight	0%	In absence of the Proposed Development, the Proposed Development Area would remain as land used for rural activities.
Leakage	35%	It is assumed that a proportion of employment opportunities will be realised by firms within the Study Area. The construction sector in the Study Area supports some 2,500 jobs representing 5.88% of total jobs in the Study Area. This is comparative to the national figure of 6.04% jobs in construction. Mobility of construction labour does however suggest that a proportion of the employment opportunities, such as that by skilled works, may be found outwith the Study Area.
Displacement	25%	Displacement is assumed to be relatively low (25%) within the Study Area, as there is sufficient supply of labour to complete the Proposed Development.
Substitution	0%	There are no known public sector incentives that would influence substitution activity at this time.
Multiplier	0.62	Sectoral Type II multipliers from Scottish Government Input-Output Tables have been applied and adjustment in line with the above leakage assumptions.

15.7.11 Based on the additionality assumptions, the 57 gross temporary construction jobs created by the Proposed Development are expected to support approximately 47 net temporary construction jobs across the 18-month construction period within the Study Area. This represents 1.88% of existing construction jobs (2,500 jobs) within the Study Area.

15.7.12 It should be noted that the number of construction workers employed would depend on the duration of the construction programme and may vary if the programme is altered. It is further acknowledged that the number of construction-related FTEs would vary

depending on project specific requirements and that construction phase employment would only be sustained for a temporary period of time.

15.7.13 **Chapter 3 – Description of the Proposed Development** of the EIA Report states that it is envisaged that the Proposed Development would be constructed employing several main contractors: one for the civil infrastructure works, one for the electrical works, one for the supply, erection and commissioning of the wind turbines, and a battery installation contractor - all of whom would be coordinated and overseen by a Project Manager.

15.7.14 In order to monitor the works a number of site representatives would be employed full time to ensure the quality and health and safety aspects of the construction, and to ensure the development is carried out in accordance with the CMS methodologies.

15.7.15 During the construction period, there be would also be construction operatives carrying out the works and competent operatives would be employed for handling and storing, and arranging for the disposal of, potentially polluting substances.

15.7.16 Further indirect local benefits are likely to include the hire of local equipment and plant, temporary employment of local work force and potential use of local subcontractors.

15.7.17 Construction of the Proposed Development is likely to increase occupancy of nearby hotels and other suitable short-term accommodation facilities, stemming from the construction jobs generation and mobility of the labour market. The increase in the localised presence of people through construction is also likely to increase trade in local hospitality establishments.

15.7.18 In accordance with the methodology detailed in **Section 15.3**, the net construction employment associated with the Proposed Development within the Study Area will result in a Low magnitude of change on the Labour Market receptor (a Medium sensitivity receptor as per **Table 15.8**), resulting in a Short -Term Minor Beneficial effect (**Not Significant)**.

Key Business Sector: Construction

15.7.19 The key sector likely to experience socio-economic effects from the Proposed Development during the construction phase is the construction sector.

15.7.20 GVA generated through the construction phase of the Proposed Development will act as a stimulus to the wider construction sector and induce multiplier effects. The Scottish Government publishes regular updates to the Type II Output, Income, Employment and GVA Multipliers. The most recent update was in 2019 reporting £43,057 per head for a construction worker in the Study Area. Applying the GDP price deflator[95] to uprate this to 2023 prices[96] suggests £53,708 per head.

15.7.21 According to these, the creation of 47 net temporary construction jobs within the Study Area is anticipated to generate some £2.5 million Net GVA over the 18-month construction period.

15.7.22 In accordance with the methodology detailed in **Section 15.3**, the net construction GVA associated with the Proposed Development within the Study Area will result in a Low magnitude of change on the Construction Sector (a Medium sensitivity receptor as per **Table 15.8**), resulting in a Short -Term Minor Beneficial effect **(Not Significant).**

[95] The GDP price deflator measures the changes in prices for all of the goods and services produced in an economy

[96] GDP deflator applied: 1.24736893

Other Local Economic Effects

15.7.23 In addition to generating employment (direct and indirect) and impacting key business sectors through the construction phase, the Proposed Development will adhere to the Scottish Government best practice guidelines in relation to community benefits.

15.7.24 The RUK (2015) report states that 12% of the total capital construction costs of an onshore wind farm are typically spent locally (within the local authority area). This would equate to around £2.5m to be spent within the East Ayrshire Council area. This is in addition to the aforementioned £2.5 million Net GVA over the 18-month construction period.

15.7.25 In accordance with the methodology detailed in **Section 15.3**, the other local economic benefits associated with the Proposed Development within the Study Area will result in a Low magnitude of change on the Labour Market (a Medium sensitivity receptor as per **Table 15.8**), resulting in a Short -Term Minor Beneficial effect **(Not Significant).**

Tourism and Recreation

Access Tracks and Recreational Routes

15.7.26 A total of approximately 8km of new and upgraded wind farm access tracks would be constructed for the Proposed development during construction - approximately 6km of upgraded tracks and 2km of new tracks. Temporary passing places are to be provided every 500m (as required). The tracks would feature local widening on corners and would be surfaced with coarse aggregate (see **Figure 3.3** for typical track cross sections). New sections of track across areas of peat deeper than 1m would be floated.

15.7.27 As discussed in **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report, due to the intervening landform and surrounding vegetation / forestry, the access tracks would not be visible from any of the viewpoints. This confirms minimal landscape and visual effects on the surrounding receptors.

15.7.28 Individual users of recreational routes within the Study Area (as discussed in **Section 15.5**) could experience temporary and localised disruption to footpath access during the construction period. To ensure safe construction practices and in accordance with the CDM Regulations 2015 and the Land Reform (Scotland) Act 2003 (as amended), it may be necessary to implement temporary diversions or managed crossing points in respect of these recreational routes, particularly during the undertaking of intensive construction activities.

15.7.29 As discussed in **Section 15.6**, the CMS for the Proposed Development includes a CTMP to be secured through a planning condition. The CTMP will seek to minimise the traffic and transport effect from the Proposed Development, through the construction phase, with consideration given towards matters such as peak traffic periods and signage. The CTMP will be developed via discussions between the local roads authority and the construction contractor.

15.7.30 Aside from temporarily halting of access within the vicinity of construction areas, the construction of the Proposed Development is not expected to generate any direct effects on specific recreational pursuits within the Development Site as there are no known recreational activities undertaken on site.

15.7.31 Post-construction the Development Site entrance and access tracks would be cleared of any construction signage and left in a tidy and co-ordinated condition with verges restored and field boundary fencing neatly tied into new gates / access details.

15.7.32 Overall, the construction of the Proposed Development is predicted to have a Low adverse magnitude of change on recreational users of the site at the local East Ayrshire Council level. Due to the recreational offer within the site being limited to open access/right to roam activities, the site is considered to be of Low sensitivity for recreational purposes. This would result in a Negligible effect **(Not Significant).**

Recreational and Tourist Destinations

15.7.33 The construction effects, although temporary, are likely to involve greater movement of machinery and visibility of contrasting construction activity, background noise and associated lighting. The Development Site area, however, is largely covered with mature coniferous forestry plantation, which **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report states would screen visibility of much of the lower-level activity associated with the construction phase. Higher level activity, during the erection of the turbines, would be more visible from certain viewpoints.

15.7.34 **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report, finds that there would be no significant visual effects on any recreational and tourist destinations. It also finds that there would be no significant effects on any of Scotland's Great Trails, Regional Trails or the Sustrans National Cycle Network. It does find that significant visual effects would affect views from parts of four Core Paths or Rights of Way.

15.7.35 **Chapter 7 – Noise** of the EIA Report, does not find any exceedances of noise limits on receptors during the construction phase.

15.7.36 Given the nature of these paths, it is not likely that the visual impacts would detract from the purpose of visits to such receptors. It is anticipated that the destinations will continue to provide the same recreational offering and therefore not detract from their existing value. The Proposed Development and implementation of a CMS will also ensure continuity of access to these receptors is maintained.

15.7.37 It is of note that existing literature on wind farms, as presented in **Section 15.5**, states that wind farms are not considered to have an impact on tourism trends.

15.7.38 Overall, the construction of the Proposed Development is predicted to have a Low magnitude of change on recreational users of the nearby Core Paths and Rights of Way. These receptors are considered to be of Low sensitivity for recreational purposes, so this would result in a Negligible effect **(Not Significant).**

Operational Phase

Labour Market Effects

15.7.39 Following construction of the Proposed Development, it would enter into a 35-year operational period. During this phase of the project's life cycle, the Operations and Maintenance (O&M) contracts would deliver the planned routine and scheduled maintenance of the wind turbines and battery storage, the statutory inspections and servicing.

15.7.40 The O&M work stream would result in direct spend in the local area per annum and creation of some direct full time skilled jobs for the local area. There would also be additional ancillary local spend and job creation through the use of the local supply chain.

15.7.41 During the operational phase, maintenance activities will be undertaken at regular intervals in accordance with manufacturer recommendations and industry best practice. Operations and maintenance activities would be likely to increase occupancy in nearby hotels and other short-term accommodation, as well as increasing trade in local hospitality

establishments, throughout the operational phase of the Proposed Development. However, owing to the predicted limited frequency and scale of O&M activities, it is not likely to result in an overwhelming influx of local accommodation or hospitality bookings at a single point in time.

15.7.42 The operational phase of the Proposed Development would be managed under the requirement of RWE's internal Environmental Management Systems and managed by a team of wind energy engineers whose duties will include compliance with statutory HSE requirements.

15.7.43 The Development Site is currently used for commercial forestry. The Proposed Developments design approach is to minimise loss of existing trees through locating turbines and site infrastructure within open areas in the forest structure. However, small areas of existing forestry may be removed where the turbines are 'keyholed' into the forest. Once operational, the Proposed Development will not affect future forestry activities within the Development Site.

15.7.44 Overall, the operation of the Proposed Development is predicted to have a Low beneficial magnitude of change on the economy and employment at the local East Ayrshire Council level. With the economy of the East Ayrshire Council area considered to be of Medium sensitivity, this would result in a Minor Beneficial effect **(Not Significant).**

Other Local Economic Effects

15.7.45 In addition to generating employment (direct and indirect) and impacting on the operation and maintenance sector, the location, scale and nature of the Proposed Development means there is also the potential for wider economic development effects in the local area.

15.7.46 The Proposed Development will adhere to the Scottish Government best practice guidelines in relation to community benefits.

15.7.47 In accordance with the methodology detailed in **Section 15.3**, the other local economic benefits associated with the Proposed Development within the Study Area will result in a Low magnitude of change on the Labour Market (a Medium sensitivity receptor as per **Table 15.8**), resulting in a Short -Term Minor Beneficial effect **(Not Significant).**

Tourism and Recreation

Access Tracks and Recreational Routes

15.7.48 During the operational phase of the Proposed Development, the public would, under the general 'right to roam' enshrined in the Land Reform (Scotland) Act 2003, have unrestricted access to the Development Site. Temporary public access restrictions would only apply if it were necessary to undertake intensive maintenance or upgrading to on-site infrastructure including turbines and access tracks, in accordance with the CDM Regulations 2015.

15.7.49 Subject to agreement with all landowners and tenants, the public would have access to the Development Site tracks during operations, thereby facilitating relatively easy public access to areas that would otherwise have been more challenging to access.

15.7.50 The detailed design of the Development Site entrance would be combined with a Landscape Plan setting out vegetation management which may require the establishment of new roadside vegetation to screen the access track from the Glen Afton Road.

15.7.51 As detailed in **Chapter 3 – Description of the Proposed Development** of the EIA Report, it is anticipated that the long-term land management practices in relation to the

forestry undertaken at the Development Site will continue unaffected by the Proposed Development, with normal practices within retained forestry continuing unimpeded after completion of construction.

15.7.52 Overall, the operation of the Proposed Development is predicted to have a Low beneficial magnitude of change on recreational users of the Development Site at the local East Ayrshire Council level. Due to the recreational offer within the site being limited to open access/right to roam activities, the Development Site is considered to be of Low sensitivity for recreational purposes, this would result in a Negligible beneficial effect **(Not Significant).**

Recreational and Tourist Destinations

15.7.53 **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report details that whilst the assessed levels of effects are likely to be at their greatest during the period of operation, the appearance of the Development Site would also recover a 'calmer' visual character with negligible levels of maintenance activity visible on the Development Site. It does, however, acknowledge that the long-term presence of the turbines would result in continued significant landscape effects through the operational period. It concludes that the geographical extent of the significant effects would be limited to the immediate areas of the proposed turbines, within the Development Site itself, due to the containment of coniferous forestry and landform. Significant landscape effects would also extend up to approximately 2km north and south of the Development Site due to topography and screening. The nature of all of these effects would be long-term (reversible) direct and negative.

15.7.54 It is of note that, within 10km of the Proposed Development, there are numerous existing and consented wind farms within the *East Ayrshire Council Southern Uplands with Forestry LCT,* and several others located close by that have a notable characterising influence.

15.7.55 **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report, concludes that there would be no significant visual effects on any recreational and tourist destinations. It also concludes that there would be no significant effects on any of Scotland's Great Trails, Regional Trails or the Sustrans National Cycle Network. It does find that significant visual effects would affect views from parts of four Core Paths or Rights of Way.

15.7.56 **Chapter 7 – Noise** of the EIA Report does not find any exceedances of noise limits on receptors during the construction phase.

15.7.57 Given the nature of these paths, it is not likely that the visual impacts would detract from the purpose of visits to such receptors. It is anticipated that the destinations will continue to provide the same recreational offering and therefore not detract from their existing value. The development and implementation of a CMS will also ensure continuity of access to these receptors is maintained.

15.7.58 It is of note that existing literature on wind farms as presented in **Section 15.5**, states that wind farms are not considered to have an impact on tourism trends.

15.7.59 Overall, the operation of the Proposed Development is predicted to have a Low magnitude of change on recreational users of the nearby Core Paths and Rights of Way. These receptors are considered to be of Low sensitivity for recreational purposes, so this would result in a Negligible effect **(Not Significant).** No impacts are predicted on any regional or national level recreational receptors.

Decommissioning Phase

15.7.60 For the purpose of the assessment, it is assumed that at the end of its operational life, the Proposed Development will undergo decommissioning. This will involve the removal of the wind turbines, kiosks, control building and substation compound, battery storage and re-instatement of the Development Site. The precise nature of the decommissioning works would be prescribed by a scheme that would need to be submitted to EAC in accordance with a planning condition, typically around one year before cessation of the turbine's operation. It has been assumed that decommissioning would take approximately 6 months.

15.7.61 The cost of decommissioning a wind farm in over 35 years' time is difficult to estimate at this point in time. It is anticipated that there would be further local spend at the stage that the Proposed Development is decommissioned, although these works are not as complex or expensive as construction activities. Once the blades and towers are lowered by specialists, the subsequent breaking up and removal of the towers, blades and other parts is likely to be undertaken by smaller contractors.

15.7.62 It is assumed that access tracks will be left in situ for use by the landowner as the environmental impacts of removal are considered to be greater than leaving in situ.

15.7.63 **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report details that as all visible above ground structures (turbines, battery storage containers and control building) would be removed upon decommissioning, it would thereby render the vast majority of the landscape and visual effects as reversible.

15.7.64 Any impacts on the economy or on recreational or tourism receptors are therefore expected to be lower than found at the construction phase. At worst, the decommissioning works would result in a Low magnitude of effect, on Low or Medium sensitivity receptors. This would result in Negligible to Minor effects **(Not Significant).**

15.8 Further Mitigation and Enhancement

15.8.1 No further mitigation or enhancement measures beyond those detailed previously in this chapter are considered necessary.

15.9 Residual Effects

15.9.1 The likely residual effects from construction, operation and decommissioning of the Proposed Development are identified in **Tables 15.10** and **15.11** below.

Table 15.10: Summary of Residual Effects - Construction

Potential Effects	Duration	Receptor Sensitivity	Residual Magnitude of Change	Assessment of Residual Effect	Residual EIA Significance
			Labour Market		
Net Construction Employment	Short-term	Medium	Low	Minor Beneficial	Not significant

Potential Effects	Duration	Receptor Sensitivity	Residual Magnitude of Change	Assessment of Residual Effect	Residual EIA Significance
Net Construction GVA	Short-term	Medium	Low	Minor Beneficial	Not significant
Other Local Economic Benefits	Short-term	Medium	Low	Minor Beneficial	Not significant
Tourism and Recreation					
Access Tracks and Recreational Routes	Short-term	Low	Low	Negligible Adverse	Not significant
Recreational and Tourist Destinations	Short-term	Low	Low	Negligible Adverse	Not significant

Table 15.11: Summary of Residual Effects - Operation

Potential Effects	Duration	Receptor Sensitivity	Residual Magnitude of Change	Assessment of Residual Effect	Residual EIA Significance
Labour Market					
Net Operational Employment	Permanent	Medium	Low	Minor Beneficial	Not significant
Net Operational GVA	Permanent	Medium	Low	Minor Beneficial	Not significant
Other Local Economic Benefits	Permanent	Medium	Low	Minor Beneficial	Not significant
Tourism and Recreation					
Access Tracks and Recreational Routes	Permanent	Low	Low	Negligible Beneficial	Not significant
Recreational and Tourist Destinations	Permanent	Low	Low	Negligible Adverse	Not significant

15.10 Monitoring

15.10.1 In the absence of any likely significant effects, it is considered that no monitoring is required. **Table 15.12** below, however, describes the environmental measures embedded within the Proposed Development that are considered to be of relevance to this socio-economic assessment and the means by which they would be implemented, i.e., they would be secured through planning conditions.

Table 15.12: Summary of Environmental Measures to be Implemented – Relating to Socio Economics

Environmental Measure	Responsibility for Implementation	Compliance Mechanism
Construction Traffic Management Plan	The Applicant	Planning Condition
Outdoor Access Management Plan	The Applicant	Planning Condition
Construction Management Strategy	The Applicant	Planning Condition

15.11 Cumulative Effects

15.11.1 This section assesses the cumulative likely significant residual effects in relation to Socio-economics, Tourism and Recreation. Cumulative effects are those which occur where the effects of more than one development of a similar type within a particular landscape combine to produce a greater level of effect.

15.11.2 Cumulative ZTV maps are also illustrated in **Figures 9.8** to **9.13**, indicating the extent of theoretical cumulative visibility in relation to the Proposed Development, other existing and consented wind farms, and other wind farm applications. All phases of these schemes are considered to have the potential to give rise to cumulative socio-economic effects due to their proximity to the Development Site, in particular the consented Enoch Hill Wind Farm which is adjacent to the Development Site.

15.11.3 Of the cumulative wind farms identified within 10km of the site (**Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report), the majority are existing operational sites and there is only one site which could see construction works (and the accompanying spend) in a similar timeframe to the construction phase of the Proposed Development. Therefore, whilst there would be cumulative beneficial effects on the economy, these are unlikely to be of a level which could be considered as significant. There will be a cumulative operational spend but given the small scale of spend associated with each wind farm and the use of central maintenance teams by many of the wind farm operators, this is not expected to be of a beneficial level that would be significant.

15.11.4 **Chapter 9 – Landscape and Visual Impact Assessment** of the EIA Report includes cumulative effects in its conclusions, and **Chapter 7 – Noise** of the EIA Report finds that there would be no cumulative operational noise issues at any of the receptors. Therefore, no cumulative impacts on users of tourism or recreational resources are identified.