

Intermodal Logistics Park North Ltd

INTERMODAL LOGISTICS PARK NORTH (ILPN)

Intermodal Logistics Park North (ILPN) Strategic Rail Freight Interchange (SRFI)

Project reference TR510001

Preliminary Environmental Information Report (PEIR)

Chapter 10: Landscape and visual effects

October 2025

Planning Act 2008

The Infrastructure Planning (Environmental Impact Assessment) Regulations 2017

This document forms a part of a Preliminary Environmental Information Report (PEIR) for the Intermodal Logistics Park North (ILPN) project.

A PEIR presents environmental information to assist consultees to form an informed view of the likely significant environmental effects of a proposed development and provide feedback.

This PEIR has been prepared by the project promoter, Intermodal Logistics Park North Ltd. The Proposed Development is described in Chapter 3 of the PEIR and is the subject of a public consultation.

Details of how to respond to the public consultation are provided at the end of Chapter 1 of the PEIR and on the project website:

<https://www.tritaxbigbox.co.uk/our-spaces/intermodal-logistics-park-north/>

This feedback will be taken into account by Intermodal Logistics Park North Ltd in the preparation of its application for a Development Consent Order for the project.

Chapter 10 ◆ Landscape and visual effects

INTRODUCTION

- 10.1 This section of the Preliminary Environmental Information Report (PEIR) reports the approach and findings of a Landscape and Visual Impact Assessment (LVIA) undertaken for the Proposed Development. Details of the Proposed Development are provided within PEIR Chapter 3.
- 10.2 The landscape assessment has considered the potential effects of the Proposed Development on the landscape as an environmental resource and the visual assessment has considered the potential effects on people's views, such as residents, users of publicly accessible routes, visitors to community facilities, road users and people working in the area.
- 10.3 Landscape and visual effects have been considered for the construction, operational and post-mitigation (i.e. effects once mitigation has reached maturity) phases of the Proposed Development. A decommissioning phase has not been scoped into the LVIA as the Proposed Development would be permanent.
- 10.4 The landscape and visual assessments have been undertaken in parallel, and have been informed by a combination of desk and site-based appraisal techniques and professional judgement.
- 10.5 This chapter is supported by the following Appendices in PEIR Volume 2:
 - Appendix 10.1: Assessment Methodology
 - Appendix 10.2: ZTV and Visualisation Methodology
 - Appendix 10.3: Landscape Character Assessment
 - Appendix 10.4: Effects at Viewpoints
 - Appendix 10.5: Effects on Visual Receptors
 - Appendix 10.6: Draft Public Rights of Way Strategy
- 10.6 This chapter is supported by the following Figures in PEIR Volume 3:
 - Figure 10.1 Site Location Plan
 - Figure 10.2 Landscape Context Plan
 - Figure 10.3.1 National Character Areas

- Figure 10.3.2 Local Landscape Character Areas
- Figure 10.4.1 ZTV of Proposed Buildings
- Figure 10.4.2 ZTV of Proposed Rail Gantries
- Figure 10.4.3 ZTV of Proposed Rail Spur
- Figure 10.5.1 Visual Receptors - Representative Viewpoints
- Figure 10.5.2 Visual Receptors – Public Rights of Way Receptors
- Figure 10.5.3 Visual Receptors - Residential, Community, Roads and Commercial Receptors
- Figure 10.6.1 to Figure 10.6.30 comprise the Viewpoint Plates, including photomontages for Viewpoints 4 (Figure 10.6.4), 6 (Figure 10.6.6), 7 (Figure 10.6.7), 8 (Figure 10.6.8), 9 (Figure 10.6.19), 19 (Figure 10.6.4) and 24 (Figure 10.6.24).

10.7 The following sections of this chapter include:

- a summary of planning law, policy and guidance relevant to the landscape and visual assessment;
- a summary of consultation with stakeholders in relation to landscape and visual matters;
- a summary description of the methodology for the assessment, including details of the study area and the approach to the assessment of effects;
- a summary of baseline (existing) conditions;
- details of embedded mitigation measures proposed as part of the Proposed Development to avoid or reduce environmental effects, including mitigation and design measures that form part of the Proposed Development;
- an assessment of the likely effects for the construction and operational phases of the Proposed Development, taking into account the mitigation measures proposed;
- identification of any further mitigation measures or monitoring required in relation to likely significant effects;
- a summary of residual landscape and visual effects;
- assessment of any cumulative effects with other proposed developments; and

10.8 The focus of this LVIA within the PEIR is on the Proposed Development which falls within the Main Site and Western Rail Chord of the DCO Site. There is a separate Highway Mitigation Options Report (Appendix 7.2) which presents an overview of the potential highways access and infrastructure options currently under consideration as part of the Proposed

Development and identifies the potential environmental effects associated with each option.

RELEVANT LAW, POLICY AND GUIDANCE

Introduction

- 10.9 The DCO application will be determined pursuant to the Planning Act 2008 and relevant regulations, the National Networks National Policy Statement ('NPSNN', adopted 2024) and the National Planning Policy Framework (NPPF) (December 2024, as amended February 2025). Local planning policy relevant to the LVIA are material considerations, and have been taken into account in developing the LVIA scope and approach.

Legislative Context

European Landscape Convention 2007

- 10.10 The UK Government is a signatory of the European Landscape Convention (ELC), which became binding in March 2007. The ELC is aimed at the protection, management and planning of all landscapes and raising awareness of the value of a living landscape. It relates chiefly to public bodies and to the policies, plans and programmes produced by these.
- 10.11 LVIA is a development specific process which accords with Article 6C of the ELC. This LVIA is informed by extant Landscape Character Assessment studies which more directly relate to the provisions of Article 6C.

National Planning Policy

- 10.12 National-level planning policies for NSIPs are set out in a series of National Policy Statements (NPSs). The NPS of relevance to the Proposed Development is the National Networks NPS (NPSNN) which was last updated in March 2024. The NPSNN is the primary statement of policy for NSIPs on the road and rail networks and forms the basis for decisions by the Secretary of State.
- 10.13 The National Planning Policy Framework (NPPF), and the accompanying online Planning Practice Guidance (PPG) are also important and relevant. Where there is any conflict, the NPSNN is the primary policy.
- 10.14 Relevant requirements of the NPSNN related to the LVIA are summarised below. Noting that the Proposed Development is not located within a nationally designated landscape (i.e. a National Park or National Landscape), references made to effects on designated landscapes within the NPSNN are not included.
- Construction and operational stages should be considered in the LVIA (NPSNN para 5.161). The LVIA therefore assesses both phases.
 - The provision of relevant local development plan policies will be considered. The extent of any conflict will be identified. It is a matter for the Planning Statement to address the weight that should be given to any such conflict (para 5.150). The LVIA identifies

compliance with relevant landscape policies.

- Consideration should be given to the impact of noise and light pollution effects, including on local amenity, dark skies, tranquillity, and nature conservation. The applicant should demonstrate how such effects would be minimised during construction and operational stages (para 5.162). The LVIA considers indirect landscape and visual effects arising from light, however this will be assessed in more detail prior to the submission of the DCO as the lighting design is developed further. Where relevant, reference is made to the influence of noise in relation to the perception of landscape character.
- It requires that projects should be designed carefully, taking account of the potential impact on the landscape. With regards to mitigation of effects, *“the project should be designed, and the scale minimised, to avoid or where unavoidable, mitigate the visual and landscape effects, during construction and operation, so far as is possible while maintaining the operational requirements of the scheme.”* (para 5.164). The LVIA assesses how the design of the Proposed Development has sought to avoid and minimise adverse effects.
- It states that *“adverse landscape and visual effects may be minimised through appropriate siting of infrastructure, design (including choice of materials), and topographical interventions (for example, creation of bunds or lowering of ground level). Also, landscaping schemes (including screening options and design elements that soften the built form such as green bridges), depending on the size and type of the proposed project. Materials and designs for infrastructure should always be given careful consideration in terms of environmental standards.”* (para 5.166). The LVIA reviews the effectiveness of proposed design and mitigation measures.
- Off-site landscape mitigation should be considered. For example, filling in gaps in tree and hedge lines to mitigate more distant views (para 5.167). The embedded mitigation measures have taken this into account and the LVIA assesses the potential need for and benefit of such measures.
- Applicants should consider how landscapes can be enhanced using landscape management plans (para 5.168). The LVIA reviews opportunities for enhancement through management. The Draft Outline Landscape and Ecological Management Plan (oLEMP) responds to this requirement.
- With regards to potential landscape effects of the project, consideration should be given to *“the existing character of the local landscape, its capacity to accommodate change and nature of the effect likely to occur.”* (para 5.169). The LVIA baseline includes an assessment of character and its susceptibility to change.
- In addition with regards design: *“Projects need to have regard to siting, orientation, height, operational and other relevant constraints. The aim should be to avoid or minimise harm to the landscape, where adverse impacts are unavoidable providing reasonable mitigation and deliver landscape enhancement measures where possible and appropriate.”* (para 5.169). The LVIA assesses how siting, scale and design respond

to the landscape baseline.

- Green infrastructure should be considered when designing the Proposed Development as it can prevent or reduce environmental impacts and enable developments to provide positive environmental, social and economic benefits. (para 5.179). The LVIA considers incorporation of green infrastructure measures.
- The re-use of previously developed land for new development should be considered. However it is acknowledged in the NPSNN that this may not be possible for some forms of infrastructure, including strategic rail freight interchanges (para 5.180). The LVIA recognises this policy context in relation to site selection, which is described in PEIR Chapter 4.
- It is acknowledged by the NPSNN that outside nationally designated landscapes, there are landscapes that may be valued locally and protected by local policy. With regards local landscape value it states: *“Where a local development plan in England has policies based on landscape character assessment, and has identified landscapes of local value, these should be given particular consideration. However, such areas should not be used in and of themselves as reasons to refuse consent, as this may unduly restrict acceptable development.”* (para 5.175). There are no local or national landscape designations within the study area, however the LVIA has given due regard to landscape value.
- A summary requirement with regards the Secretary of State’s decision is that they *“should consider whether the project has been designed carefully, taking account of environmental effects on the landscape and siting, operational and other relevant constraints, to avoid adverse effects on landscape or to minimise harm to the landscape, including by appropriate mitigation.”* (para 5.177). The LVIA sets out the design and mitigation measures adopted.
- Under section 104 of the Planning Act 2008 the Secretary of State must decide an application for a relevant NSIP in accordance with the NPSNN *inter alia* unless he/she is satisfied that to do so would result in adverse impacts of the development outweighing its benefits. With regards to weight attributed to the visual effects of a project, NPSNN paragraph 5.178 states: *“The Secretary of State will have to judge whether the visual effects on sensitive receptors, such as local residents, and other receptors, such as visitors to the local area, outweigh the benefits of the development.”* The LVIA provides an assessment of effects on visual receptors to inform decision-making.

Local Planning Policy

10.15 Local Planning Policy relevant to the LVIA is set out in the following documents:

- St. Helens Borough Local Plan up to 2037 (St Helens Borough Council, 2022);
- Wigan Local Plan: Core Strategy (Wigan Council, 2024);
- Places for Everyone Joint Development Plan for Bolton, Bury, Manchester, Oldham, Rochdale, Salford, Tameside, Trafford and Wigan to 2039; and

- Warrington Local Plan (Warrington Borough Council, 2023).

10.16 Relevant requirements of local policy related to the LVIA are summarised below:

- St Helens Policy LPA02 requires that development should contribute to a high quality built and natural environment by taking account of the Borough's landscape character and townscape and the distinctive roles and settings of different areas of the Borough, in the location and design of new development, with particular regard to protecting and enhancing the natural, built and historic environment.
- St Helens Policy LPA08 sets the strategy for Green Infrastructure (GI) throughout the Borough and highlights the contribution GI makes to landscape character, helping to provide a sense of place and distinctiveness.
- St Helens Policy LPC09 outlines the key proposals for new development in relation to Landscape Protection and Enhancement. It references the St. Helens Landscape Character Assessment and Merseyside Historic Character Study as key guidance to ensure conservation and enhancement of the local landscape. It makes reference to the need for appropriate mitigation measures where the landscape or visual character may be negatively impacted by the development.
- St Helens Policy LPC10 Requires new development to conserve, enhance, and / or manage existing trees, woodland and hedgerows.
- St Helens Policy LPD01 requires that development proposals should have regard to their scale, location, and nature, to meet or exceed requirements which include (amongst other factors): maintaining or enhancing the character and appearance of the local environment, for example with regard to the siting, layout, massing, scale, design and materials used in any building work, the building-to-plot ratio and landscaping; and respect any existing natural features of the site.
- St Helens Policy LPD06 refers to 'gateway corridors' which it describes as 'motorways, 'A' roads, waterways and railway lines that cross the borough. These include the M6 and M62 motorways. LPD06 requires that all proposals for new development that would be within or visible from one or more prominent gateway corridor(s) must, as appropriate, having regard to its scale and nature: a) be of high architectural quality, ensuring that the density, design, height, and layout of any building(s) respond positively to the site and its setting; and b) provide appropriate landscaping as an integral part of their design and layout.
- Wigan Policy CP2 refers to Open Space, Sport and Recreation and seeks to maintain and enhance walking and cycling routes through parks and open space where they provide appropriate links within the wider network of routes.
- Wigan Policy CP10 states that the council will improve the built environment of the borough and help make it a better place to live, visit and for businesses to locate and thrive by ensuring that, as appropriate, new development (amongst other factors): respects and acknowledges the character and identity of the borough and its locality, in

terms of the materials, siting, size, scale and details used; is integrated effectively with its surroundings and helps to create attractive places; and incorporates high quality landscaping.

- The Places for Everyone Joint Development Plan Policy JP-G1 outlines how new development should respond to the special qualities and sensitivities of the key landscape characteristics of its location, in relation to the Landscape Character Types identified. It requires that regard should be had to the Greater Manchester Landscape Character and Sensitivity Assessment (GMLCSA, 2018), in particular its guidance on future development and landscape management/enhancement within areas covered by each landscape character type.
- Greater Manchester Policy JP-G2 sets the strategy for the Green Infrastructure Network, including protection, management and enhancement. It outlines how development within and around the GI Network should be consistent with delivering major green infrastructure improvements within them.
- Greater Manchester Policy JP-G7 outlines the aims and objectives of the Greater Manchester Tree and Woodland Strategy, which is to significantly increase tree cover, protect and enhance woodland and to connect people to the trees and woodland around them.
- Greater Manchester Policy JP-G9 outlines the five purposes of the Green Belt, as set out in national policy. Particular focus is given to green infrastructure enhancement such as improved public access and habitat restoration.
- Greater Manchester Policy P1 supports Greater Manchester's aim to become one of the most liveable city regions in the world, consisting of a series of beautiful, healthy and varied places. It supports conservation and enhancement of the natural environment and development which acknowledges the character and identity of its locality. It requires that development should be: *"Visually stimulating, creating interesting and imaginative environments which raise the human spirit through the use of green space, public art and quality design."*
- Warrington Policy DC1 seeks to ensure that proposed development respects the unique attributes of spatial areas within Warrington. This policy will be taken into account with regards the potential visibility of the Proposed Development on areas which fall within Warrington.
- Warrington Policy DC6 advocates that good design should be at the core of all development proposals having regard to various principles, which include a requirement to respect, sustain and make a positive contribution to local character and distinctiveness within the surrounding area, and where appropriate the landscape setting, having regard to density, street layouts, scale, height and massing. Consideration will be given to landscape character within the Study Area, including Warrington landscape character areas.

CONSULTATION TO DATE

- 10.17 The Applicant submitted an EIA Scoping Report to the Planning Inspectorate in October 2024. This outlined the work undertaken to date and sought advice from the Inspectorate on the likely significant effects of the Proposed Development and the topics that needed to be assessed as part of the Environmental Impact Assessment (EIA). A Scoping Opinion was received in December 2024 and this will be used to inform the EIA process for the Proposed Development. A summary of the main comments received and how the Applicant has addressed these are set out subsequently in Table 10.1.

Table 10.1 Scoping and informal consultation summary

Consultee	Consultee comment	Response
EIA Scoping Consultation		
PINS, Scoping Opinion, December 2024	Effects on statutory designated landscapes to be scoped out as none occur within the study area. The Inspectorate agrees this can be scoped out.	This comment is noted.
PINS, Scoping Opinion, December 2024	The Inspectorate considers that provided the impact on local landscape character is assessed, and the term non-statutory designated landscapes is defined in the ES, that this matter can be scoped out of the assessment.	With reference to GLVIA3, the Applicant defines non-statutory designated landscapes as local landscape designations that are judged by a local authority to hold locally appreciated value. The non-statutory designation is incorporated into a local policy, typically within the Local Plan, which describes the features and qualities of the landscape that define the reasons for its designation. While non-statutory designations do not hold the same status as a statutory designation, such as a National Park or a National Landscape, they are afforded a higher level of protection from certain types of development than non-designated parts of the authority. This definition has been stated in the PEIR as requested. The Applicant can confirm that there are no non-statutory designated landscapes within the Study Area and it is noted that the Inspectorate confirms that non-statutory designated landscapes can be scoped out of the

Consultee	Consultee comment	Response
		LVIA.
PINS, Scoping Opinion, December 2024	Effects on National Character Areas to be scoped out on the basis that local level landscape character is a more appropriate scale for the assessment. The Inspectorate agrees that this can be scoped out. The Inspectorate notes that, National Character Areas should be considered as part of the baseline description.	This comment is noted.
PINS, Scoping Opinion, December 2024	The ES should demonstrate how receptors further afield (beyond the 5km study area) would be identified and assessed and the reasons for their selection.	The LVIA has not identified landscape and visual receptors outside the preliminary 5km study area which will be subject to significant effects in this PEIR assessment. However, if receptors are identified beyond 5km when the DCO application is submitted, the LVIA at that stage will explain the reasons for their selection.
Informal Consultation		
Mike Roberts, Countryside Development and Woodlands Officer, St Helens Borough Council	An initial video conference meeting was held with Mr Roberts in August 2024 in which the Applicant outlined the approach to be taken with regards the LVIA, including the subsequent scoping report. Email consultation was subsequently undertaken	The LVIA has included the viewpoint suggestions by St Helens Borough Council in the LVIA as Viewpoints 15, 16 and 17.

Consultee	Consultee comment	Response
	with Mr Roberts in November 2024 in which he provided three suggestions for additional viewpoints: <i>"A public foot path that runs from Willow Park out to Castle Hill on the north side of the M6. It looks out across the top end of the lake area at Willow Park towards the Parkside area [1]; The road / carpark area at Newton Le Willow Station [2]; and the railway bridge that crosses the line and may give views out towards the potential site, including the arm of the railway link into the Parkside (west) site [3]."</i> A further update was provided to Mr Roberts in March 2025 following winter photography. It was confirmed that the three locations that Mr Roberts suggested had been included to which he responded: <i>"Thanks for the updated information. The updated information looks fine."</i>	
Christopher Leather MLPM, Principal Environmental Planner, Wigan Council	Email correspondence with Mr Leather in November 2024 regarding viewpoint selection post-scoping. No additional locations suggested and Mr Leather was happy with the viewpoints. However: <i>"I would be happy to meet up to discuss further in the new year, particularly around your approach to visualisation types."</i>	This comment is noted.

Consultee	Consultee comment	Response
	A further update was provided to Mr Leather in March 2025 following winter photography. <i>"Many thanks for the update and keeping us in the loop. Happy to have a catch up with regards visualisation whenever suits."</i>	
Christopher Leather MLPM, Principal Environmental Planner, Wigan Council	In April 2025, a presentation was given by the Applicant to Wigan Council in relation to landscape and visual input to the Proposed Development, including the approach to the design of the public right of way network as part of the operational development. This was held as a video call and key notes from the meeting are: - Wigan Council were appreciative of the update on LVIA matters and receptive to the approach outlined on LVIA. - Outline information was presented with regards proposals to embed a recreational loop around the Main Site, within the Illustrative Landscape Masterplan, including along Winwick Lane. Mr Leather responded to confirm that improvements would be welcomed in relation to footpath provision beside Winwick Lane. - The PADSS document was introduced to Wigan and a requirement on their part to maintain a record of areas of disagreement in	The Applicant welcomes the engagement by Wigan Council to the LVIA consultation process and will maintain this through to the final submission of the DCO application. All points raised by the council have been taken into account in preparing this LVIA.

Consultee	Consultee comment	Response
	relation to the LVIA. - A commitment by the Applicant to maintain contact with the council on LVIA matters was reaffirmed.	
Warrington Borough Council	In April 2025, a presentation was given by the Applicant to Warrington Borough Council in relation to landscape and visual input to the Proposed Development, including the approach to the design of the public right of way network as part of the operational development. Landscape Architects from WSP attended on behalf of Warrington as landscape advisors. This was held as a video call and key notes from the meeting are: - Warrington Borough Council were appreciative of the update on LVIA matters and receptive to the approach outlined on LVIA. - Ensure national guidance on Green Infrastructure is considered. - With regards landscape character, ensure that the authority boundaries are disregarded and that character is considered at an appropriate scale, including consideration at a national	The Applicant welcomes the engagement by Warrington Borough Council to the LVIA consultation process and will maintain this through to the final submission of the DCO application. All points raised by the council have been taken into account in preparing this LVIA.

Consultee	Consultee comment	Response
	scale. - Careful design of earth bunds required as an artificial earthworks design which prohibits public access would not comprise good landscape design. - Ensure that the visual assessment focuses on 'people'. - Warrington raised queries on the extent to which the Order Limits enter the Warrington boundary. The Applicant confirmed that whilst we acknowledge that the Order Limits extend into a relatively limited extent of Warrington, however the visual effects of the proposed development on people within the Warrington authority is being considered fully within the emerging LVIA. - A commitment by the Applicant to maintain contact with the council on LVIA matters was reaffirmed.	
Mike Roberts, Countryside Development and Woodlands Officer, St Helens Borough Council	In May 2025, an online presentation was given by the Applicant to St Helens Borough Council in relation to landscape and visual input to the Proposed Development, including the approach to the design of the public right of way network as	The Applicant welcomes the engagement by St Helens Borough Council to the LVIA consultation process and will maintain this through to the final submission of the DCO application. All points raised by the council have been taken into

Consultee	Consultee comment	Response
	part of the operational development. Key notes from the meeting are: - The council were appreciative of the update on LVIA matters and receptive to the approach outlined on LVIA. - The applicant was informed that the Countryside Officer role (Mike Roberts) overlaps with a Highways Officer (Dave Kelly), as St Helens don't have a specific Public Rights of Way Officer. - The Applicant was asked about the railway design and slight concern over it being levels being raised, however the Applicant reassured that LVIA, and acoustics, are involved in the design. - A commitment by the Applicant to maintain contact with the council on LVIA matters was reaffirmed.	account in preparing this LVIA.

- 10.18 The design of the public rights of way (PRoW) has been embedded within the overall environmental design, as illustrated in the Illustrative Landscape Masterplan (PEIR Figure 3.4). Whilst the PRoW design has been developed collaboratively between different members of the Applicant's design team, including transport planning and ecology, the design has been primarily co-ordinated by the landscape design team. This ensures that the PRoW design forms a fundamental part of the landscape design within the DCO Site and that the public's experience is fully addressed. The public rights of way (PRoW) are defined on the Access and Rights of Way plan.
- 10.19 Meetings have been held with the local authorities on the PRoW design and these are summarised subsequently in Table 10.2.

Table 10.2 Consultation on Public Rights of Way

Consultee	Consultee comment	Response
Elizabeth Parry, Public Rights of Way Officer and Christopher Leather MLPM, Principal Environmental Planner, Wigan Council	In July 2025, an online presentation was given by the Applicant to Wigan Council in relation to the approach to the design of the public right of way network as part of the operational development. Key notes from the meeting are: - Elizabeth Parry is the Wigan Council PRoW officer and this formed the first discussion with Wigan Council around the PRoW strategy - A positive response on proposals beside Winwick Lane, i.e. the provision of a pedestrian and cycleway to the west of the road. - Queries were raised by Wigan Council over the adoption of the cycle route beside Winwick Lane and general long-term maintenance requirements. The Applicant committed to responding on this prior to the DCO Application. - Wigan Council raised a point regarding the Proposed Development including the stopping up of footpaths in Highfield Moss and it was discussed that the Moss is mostly within Common Land. Whilst Wigan Council	A specific change made to the design of the Proposed Development following this meeting, is the proposed retention of footpaths within Highfield Moss Site of Special Scientific Interest (SSSI), subject to further engagement with Lancashire Wildlife Trust on the matter combined with the inclusion of additional paths around the Moss to relive pressure on it. In a broader sense, the Applicant welcomes the engagement by Wigan Council to the PRoW consultation process and will maintain this through to the final submission of the DCO application. All points raised by the council have been taken into account in preparing the PRoW design.

Consultee	Consultee comment	Response
	acknowledged the reasons for this (i.e. a request from Lancashire Wildlife Trust to move paths out of the Moss to ensure habitat is protected), concerns were raised that this change may not receive local support.	
Mike Roberts, Countryside Development and Woodlands Officer and Dave Kelly, Highways Officer, St Helens Borough Council	In July 2025, an online presentation was given by the Applicant to St Helens Borough Council in relation to the approach to the design of the public right of way network as part of the operational development. Key notes from the meeting are: - This formed the first discussion with St Helens Borough Council around the PRow strategy. - It was explained by St Helens Borough Council that there is no PRow officer, however Mr Roberts and Mr Kelly share responsibility for management of the PRow network in St Helens. - A positive response on proposals within St Helens and specifically that, where routes have had to be stopped up as part of the Proposed Development, alternative routes have been included in the design.	The Applicant welcomes the engagement by St Helens Borough Council to the PRow consultation process and will maintain this through to the final submission of the DCO application. All points raised by the council have been taken into account in preparing the PRow design.

METHODOLOGY AND DATA SOURCES

Guidance

- 10.20 The methodology and criteria used for this assessment of landscape and visual effects has been developed based on the non-prescriptive Guidelines for Landscape and Visual Impact Assessment, Third Edition, 2013 (GLVIA3). The GLVIA3 sets out the principles that underpin landscape and visual assessment but does not provide a formulaic recipe for reaching judgements about significance. Such judgements instead rely on reasoned and experienced professional judgement.
- 10.21 The following additional guidance has also informed detailed aspects of the approach taken to the assessment of the Proposed Development:
- Natural England (2014) *An Approach to Landscape Character Assessment*.
 - The Landscape Institute (2016) *Technical Guidance Note 08/15: Landscape Character Assessment*.
 - The Landscape Institute (2017) *Technical Information Note 01/2017: Tranquillity – An Overview*.
 - The Landscape Institute (2019) *Technical Guidance Note 06/19: Visual Representation of Development Proposals*.
 - The Landscape Institute (2020) *Technical Guidance Note 04/2020: Infrastructure*.
 - The Landscape Institute (2021) *Technical Guidance Note 02/21: Assessing Landscape Value Outside National Designations*.
 - The Landscape Institute (2024) *LITGN-2024-01: Notes and Clarifications on Aspects of Guidelines for Landscape and Visual Impact Assessment Third edition*.
- 10.22 This methodology has also had regard to the assessment requirements set out in NPSNN paragraphs 5.161–5.162, and all such matters are addressed within this chapter.

Assessment Methodology

- 10.23 The methodology used for this assessment is based on the guidance referred to previously, with primary reference to GLVIA3. This approach has been applied to the assessment of landscape and visual effects on other DCO projects carried out by the lead assessor and it focuses on proportionality in the assessment and the identification of likely significant landscape and visual effects. The adopted assessment methodology has specifically focused on providing appropriate environmental information regarding the following potential landscape and visual impacts of the Proposed Development:
- The construction of the Proposed Development, including site clearance operations. As the Proposed Development would be constructed in a series of planned phases with

early phases of warehousing proposed to be delivered prior to the rail terminal becoming operational. All proposed environmental mitigation would be implemented by Year 0, on the opening of the first phase of operation; and

- The permanent landscape and visual effects of installing a rail freight terminal, warehouses and associated infrastructure within an area of predominantly open arable fields, set within existing large-scale road and rail infrastructure.

Structure of the LVIA

10.24 This LVIA comprises:

- identification of landscape and visual receptors and a description of current baseline conditions;
- an assessment of receptor susceptibility and receptor value, which are combined to report the sensitivity of the receptors;
- an assessment of the potential impacts associated with the Proposed Development, i.e. a description of how the introduction of the Proposed Development will alter the baseline landscape and visual conditions;
- an assessment of the magnitude of change to the receptors, comprising specific assessments of the: scale; extent; duration; and potential reversibility of the change.
- an assessment of the level and significance of the effect on the receptor, based on the six principal considerations of: susceptibility; value; scale of effect; extent; duration; and reversibility;
- identification of measures to mitigate adverse landscape and visual effects; and
- a report on the residual landscape effects once mitigation has been taken into account.

Approach to Assessment

Baseline studies

10.25 Baseline landscape and visual assessments are undertaken in parallel, and are informed by a combination of desk and field-based techniques.

10.26 Preliminary identification, description and evaluation of the existing landscape and visual context of the study area involved a desk-based review and interrogation of the following information sources:

- responses obtained through the scoping and consultation processes;
- Ordnance Survey mapping and aerial photography relating to existing landform, vegetation, settlement patterns, public rights of way and vantage points;
- plans containing information relating to landscape designations and landscape related

policies at the local, regional and national level;

- engineering data and schematic plans relating to the construction and operation of the Scheme;
- the Multi-Agency Geographical Information for the Countryside website; managed by Natural England (available at <http://www.magic.gov.uk>);
- national landscape character areas (NCAs) as defined by Natural England; and
- Local Landscape Character Assessments, as defined in 'Local Character Areas' in the subsequent 'Baseline Conditions' section

10.27 Field surveys have been undertaken during periods of clement weather from public highways, public rights of way and publicly accessible areas. Site work involved:

- a corroboration of the findings of the desktop review;
- gathering of additional information on landscape elements, character, views and localised screening; and
- taking photographs from proposed representative viewpoints.

10.28 The DCO Site has been visited on multiple occasions by landscape consultants responsible for undertaking this LVIA and the co-ordination of the design of the Scheme. However, key survey dates comprise:

- an initial site visit was undertaken in February 2024, prior to further site visits throughout 2024 and 2025 as the design of the Proposed Development evolved; and
- winter photography was undertaken in March 2024 and March 2025.

Receptors

10.29 The approach to assessment comprises desktop studies and walkover surveys. Its purpose is to establish the nature and extent of potential receptors, to identify the likely sensitivity of receptors, and to record the potential landscape and visual effects of the Proposed Development on the receptors.

10.30 The landscape receptor with potential to experience change as a result of the Proposed Development is landscape character. The description of the change to landscape elements (i.e. woodland, individual trees, hedgerow, landform, field pattern, etc) caused by the Proposed Development informs the overall assessment of the effects on landscape character.

10.31 The visual receptors with potential to experience change as a result of the Proposed Development include people in specific locations such as their homes, public areas or places of work with potential to experience views of the Proposed Development. An assessment of effects on representative viewpoints is presented in PEIR Appendix 10.4 and provides an illustration of typical views of the Proposed Development which informs the assessment of

visual effects on the visual receptors within the study area which is presented in PEIR Appendix 10.5.

Assessment Stages, Seasons and Planting Heights

10.32 The assessment of landscape and visual effects includes consideration of the following:

- seasonal differences with or without the Proposed Development including summer with foliage and winter without foliage;
- the change to, or loss of, existing landscape elements (e.g. loss of existing trees and hedgerow);
- temporary construction activity (e.g. presence of plant, temporary buildings, materials storage, and construction traffic parking and movements); and
- the introduction of the rail freight interchange needed to operate and maintain the Proposed Development.

10.33 The assessment considers the effects of the Proposed Development at the following points in time:

- Construction: the assessment of the Construction Phase of the Proposed Development assumes that construction is taking place across the whole Site during winter when visibility is greatest.
- Year 0 of operation: the assessment of the Operational Phase considers the opening year of the Proposed Development prior to the maturing of any mitigation planting. The visual assessment considers both winter and summer effects and the description of each effect includes reference to key differences in seasonal effects where applicable. However, the judgement with regards the level and significance of effect on each visual receptor refers to winter. Visual effects experienced during winter months are considered to be the 'worst-case' in assessment terms as trees are without leaf and visibility tends to be more open.
- Year 15 of operation: the assessment of the Operational Phase also considers the effects of the Proposed Development once planting has established and increased in maturity. Similar to the Year 0 assessment, reference has been made to visual effects during both summer and winter and the focus of this Year 15 assessment is the extent to which proposed mitigation planting would have established and the subsequent change in effects during both seasons, albeit with the level and significance of effect on each visual receptor assessed as a worst-case during winter.

10.34 The Illustrative Landscape Masterplan (PEIR Figure 3.4) has been developed to mitigate effects during both summer and winter, albeit it is acknowledged that this tends to be more effective during summer when trees are in leaf.

10.35 The landscape assessment does not take into account seasonality, however reference may be made to the seasons where seasonal changes over a calendar year form a distinct part of the

landscape character.

10.36 The assessment considers the following timescales:

- start of construction works – 2028;
- estimated duration of construction – 10 years; and
- opening year (Year 0) – this would be 2038.

10.37 All proposed landscape and visual mitigation measures would have been implemented by the year of opening (Year 0), with a mitigation design year of Year 15, which would be when proposed planting would have established to a point of relative maturity in contributing to mitigation objectives. For the purpose of assessment, mitigation planting growth and height assumptions have been defined in Table 10.3 subsequently. The figures set out in Table 10.3 are based on experience of the competent expert and colleagues, including previous DCO and public inquiry experience. They are reasonable estimates of growth rates which are subject to the variables of ground conditions, general climatic influences and individual species growth rates).

Table 10.3 Mitigation planting growth and height assumptions

Planting Type	Height at Year 0	Height at Year 15
Woodland	0.6 m Mostly comprising 1+1 transplanted bare root stock at 0.6 – 0.8m in height. Planted at 2m centres at Year 0 with tree guards.	8.0 m Represents c. 7.5 m growth over fifteen years at an average growth rate of 0.5 m per year. It is also assumed that the density will have thinned to 4m centres at year 15 to account for tree loss.
Hedgerow	0.6 m Mostly comprising 1+1 transplanted bare root stock at 0.6 – 0.8m in height. Planted at 5 plants per linear metre in a double staggered row, with tree guards.	3.0 m Assumed to be maintained at 3.0 m in height and this would approximately be achieved at Year 5.
Individual trees, largely planted in	2.0 m Typically Light Standards, 6 -8	8.0 m This assumes 6.0 m growth over

Planting Type	Height at Year 0	Height at Year 15
hedgerows	cm girth.	fifteen years at an average growth rate of 0.4 m per year. This is based on larger tree stock having a slower growth rate than the smaller woodland planting.
Larger individual trees	c. 4.5 m Typically Extra Heavy Standards, 14 -16 cm girth.	c. 9.0 m This assumes 4.5 m growth over fifteen years at an average growth rate of 0.3 m per year. This is based on larger tree stock having a slower growth rate than the smaller woodland planting.

Study Area

- 10.38 The study area for the Proposed Development has been established with reference to guidance in GLVIA3. A Zone of Theoretical Visibility (ZTV) has been established using computer modelling to help identify the potential extent from which the Proposed Development may be visible (refer to PEIR Figure 10.4.1 to 10.4.3 for the extent of the ZTV and PEIR Appendix 10.2 for the approach to ZTV modelling).
- 10.39 Initial ZTVs, produced at Scoping, extended to a radius of 5km from the initial Order Limits Boundary (PEIR Volume 3 Figure 5-3a) to ensure a large extent of coverage prior to the selection of a study area. The ZTV was also produced using both DTM (digital terrain model) and DSM (digital surface model) data. The DTM based ZTV presents a worst-case scenario in terms of theoretical visibility, while the DSM based ZTV presents a more realistic theoretical visual envelope as surface screening features are taken into account. Refer to PEIR Appendix 10.2 for further description of the approach taken to ZTV production.
- 10.40 The main ZTV produced (Figure 10.4.1) comprises visual analysis of the largest component of the Proposed Development, the main buildings, which would be a maximum of 30 m above proposed finished floor levels (typically referred to as 'Above Ground Level' or AGL). Additional ZTVs have been produced which illustrate the theoretical visibility of other tall elements of the Proposed Development, namely the rail gantries located at the main rail terminal (Figure 10.4.2), which would be a maximum of 24m AGL, and gantries on the Western Rail Chord, which would be a maximum of 7m AGL (Figure 10.4.3). These components of associated infrastructure would be less evident than the proposed buildings which have therefore had a greater influence on the overall study area.
- 10.41 The extent of potential visibility has then been reviewed and verified in the field to determine how visible the DCO Site is, and in turn, how visible the Proposed Development would be.
- 10.42 Taking account of the above, the study area for the LVIA extends to 5km from the Order Limits

Boundary relating to the Main Site and Western Rail Chord (i.e. excluding the remote Highways Works at this stage (see Appendix 7.2 - Highways Mitigation Options Report)). This distance is sufficient for the LVIA given that the ZTVs illustrate that the theoretical visibility of the Proposed Development is largely contained within a 5km radius.

10.43 The area within the draft Order Limits is hereafter referred to as ‘the DCO Site.’ The DCO Site encompasses various elements of remote highway alterations, BNG and soil re-use area which do not form the focus of this LVIA. The assessment focuses on the effects of the Proposed Development within two main areas of the DCO Site, which are:

- the Main Site: Land to the east of the Land to the east of the M6 motorway and to the east of the West Coast Mainline; and
- the Western Rail Chord: Land to the west of the M6 motorway, to the south of the Chat Moss Line and to the west of Winwick Lane incorporating the triangular parcel of land located to the west of Parkside Road and to the north of the Chat Moss Line.

Assessment Criteria

10.44 Refer to PEIR Appendix 10.1 for a detailed methodology which sets out the approach taken to the assessment of landscape and visual effects and how conclusions have been reached regarding the level and significance of effects. In summary, the assessment follows GLVIA3 and LI Technical Guidance Note, LITGN-2024-01, whereby:

- the sensitivity of each landscape or visual receptor is judged, combining its susceptibility to change and the value attached to it;
- the magnitude of effect is judged, primarily by the scale of change, with extent, duration and reversibility considered as modifiers; and
- sensitivity and magnitude are then combined through professional judgement to determine the level of effect and whether it is considered significant in EIA terms.

10.45 For the purposes of this Environmental Statement, references to whether an effect is significant or not significant are made within the meaning of the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017. Judgements are supported by clear evidence and reasoning, including how thresholds of significance have been determined. Greater than ‘moderate’ effects are more likely to be significant, though context may mean some ‘moderate’ or lower effects are significant, or some greater than ‘moderate’ effects are not.

10.46 The assessment of the level and significance of residual effects takes into consideration embedded mitigation measures implemented as part of the Proposed Development.

Assumptions and Limitations

10.47 Access to private properties within the study area has not been requested and therefore it has not been possible to exactly define the nature of views from all private locations. The site surveys were carried out from publicly accessible locations near to private properties, such as

roads and rights of way, and the assessment of visual effects therefore reflects the best estimate of those effects.

- 10.48 Photography was undertaken during winter months when weather and light conditions are less favourable than summer months. This is sometimes evident in photography at viewpoints. However, the advantage of surveying during winter months is that trees have shed their leaves, and this results in greater visibility across the landscape and a reasonable 'worst-case' appraisal of effects can be undertaken. Summer photography will be provided with the ES for the DCO Application, ensuring that views have been presented which provide a fair representation of year-round visual effects.
- 10.49 With regards the assessment of long-term landscape and visual effects at Year 15, several assumptions have been stated within the previous sub-section: 'Assessment Stages, Seasons and Planting Heights'.

BASELINE CONDITIONS

Introduction

- 10.50 A complete study of the baseline landscape and visual conditions is provided in PEIR Appendix 10.3, Appendix 10.4 and Appendix 10.5 and a summary of the most relevant baseline information is provided here.

General Context

- 10.51 The Rail Terminal is located on the eastern extent of Newton-le-Willows in a relatively flat, agricultural landscape. The DCO Site is located within the local authority areas of St Helens Borough Council, within the Liverpool City Region Combined Authority; Wigan Council, within the Greater Manchester Combined Authority; and Warrington Borough Council.
- 10.52 The Rail Terminal including all rail aspects and services within the SRFI is split broadly across two sections:
- the Main Site – land to the east of the M6 motorway, to the south of the Chat Moss Line and to the west of Winwick Lane; and
 - the Western Rail Chord – land to the west of the M6 motorway, which bisects the DCO Site in a northwest southeast orientation, and to the east of the West Coast Mainline.
- 10.53 The gross area for the draft Order Limits is 475.6 hectares (ha). The area of the Main Site and Western Rail Chord is 209.56 ha, with the remainder of the gross area attributable to remote highway works, the Northern Mitigation Area and the Soils Reuse Area.
- 10.54 The majority of the land contained within the Main Site is bound to the north by the Chat Moss Line (Liverpool-Manchester railway line), to the west by the M6 motorway and to the southeast by Winwick Lane (A579). The Highfield Moss Site of Special Scientific Interest (SSSI) is also adjacent to the north of the Main Site, which is described in more detail below. A number of other uses exist at the Main Site currently, including:

- Croft IGP / IPO Sports Dog Club, Winwick Lane;
- Dolly Bridge Stud, Winwick Lane;
- Golden Orb Solutions, Parkside Road;
- Highfield Farm farmhouse and associated buildings, Parkside Road;
- Parkside Farm farmhouse and associated buildings, The Stables and Barrowcliffe Cottage, Parkside Road;
- Procon Ltd, Parkside Road;
- Kenyon Hall Airfield, which is a small airfield used by the Lancashire Aero Club for recreational flying of small propeller planes;
- Warrington Model Flying Club, which is a model club for radio controlled model aircraft; and
- Highfield Farm, which is comprised of two agricultural/residential buildings set within a curtilage surrounded by agricultural fields.

10.55 The majority of the Main Site is comprised of agricultural fields used for arable crops, with some small patches of woodland in the east. There are also a number of residential properties, farmsteads and two commercial yards within the Main Site. Parkside Road (A573) runs through the Main Site to the south before passing over the M6 where it provides access to Parkside Link Road West.

10.56 There is a triangular parcel of land located to the north of the Chat Moss Line and to the east of Parkside Road which also forms part of the Main Site.

10.57 The Western Rail Chord is approximately 12 hectares in size and is bordered to the west by the West Coast Mainline railway, to the north by the Chat Moss Line and to the east by the Parkside West Development. The Western Rail Chord would comprise of mainly safeguarded land for the rail-turn head to enable trains to be serviced to and from the North and the East.

10.58 The Western Rail Chord area is comprised of scrub land and areas of woodland which are set within the context of an area of redevelopment with commercial uses proposed, which is known as Parkside West. One application as part of the first phase of development has been approved and a second phase is being promoted through the Town and Country Planning Act process.

Landscape Designations

10.59 With reference to GLVIA3, the Applicant defines non-statutory designated landscapes as local landscape designations that are judged by a local authority to hold locally appreciated value. The non-statutory designation is incorporated into a local policy, typically within the Local Plan, which describes the features and qualities of the landscape that define the reasons for its designation. While non-statutory designations do not hold the same status as a statutory

designation, such as a National Park or a National Landscape, they are afforded a higher level of protection from certain types of development than non-designated parts of the authority.

- 10.60 With regards landscape value, there are no statutory designations within the DCO Site and study area, nor are there any local, non-statutory, landscape designations.

Landscape Elements

- 10.61 Consideration has been given to the direct, physical loss of existing landscape elements as a result of the Proposed Development. Landscape elements within the DCO Site contribute to the landscape character of the wider area. The following provides a summary of the principal existing landscape elements within the Main Site.

Landform

- 10.62 The landform within the Main Site is broadly flat with minimal undulation, which is typical of a landscape which is largely used for large-scale arable farmland. There are minor, localised undulations within the DCO Site, such as the northern extent of the Main Site, where the railway is within cutting. However, overall there is relatively little undulation across a large expanse of land.

Ditches and Watercourses

- 10.63 There are no watercourses within the DCO Site, however there are small brooks and ditches, which are designed to drain farmland, some of which are present along the northern boundary of the Main Site, adjacent to Highfield Moss SSSI. An unnamed stream flows in a south-easterly direction to the south of the Main Site, beyond the A579. There are surface water drainage features within the DCO Site, such as attenuation features and swales associated with the Parkside Link Road, and small ponds in the north-east.

- 10.64 For a full description of the hydrological baseline conditions refer to PEIR Chapter 14.

Land cover

- 10.65 Land within the study area consists primarily of medium to large scale, irregular shaped fields which are planted with arable crop. The landcover therefore has a varying appearance over the year, with crop evident in summer, while in winter the fields are generally without vegetation cover and are bare, ploughed soil.
- 10.66 The condition and quality of the agricultural landscape is good and typical of the area. Its value associates with its contribution to the consistency in appearance of the character of the area. An agricultural soils assessment has been provided within PEIR Appendix 15.5 which provides detailed description of soils within the Main Site.

Trees and Hedgerows

- 10.67 An arboricultural survey in accordance with BS:5837 Trees in Relation to Design, Demolition and Construction has been undertaken and this has informed the landscape baseline.
- 10.68 The Main Site largely comprises open, large-scale arable farmland and there is a very low level

of tree and hedgerow cover. With regards woodland cover, there are small blocks or belts of tree cover within or directly adjacent to the Main Site and the following the notable tree groups:

- a hedgerow along Winwick Lane;
- a small area of trees, no greater than 1 ha in size, located towards the north-eastern extent of the Main Site;
- a belt of trees which crossed into the western extent of the Main Site, just to the west of Parkside Road;
- along the northern extent of the Main Site which comprises the railway line, there is tree cover beside the railway line; and
- within the Western Rail spur, which comprises part of the former Parkside Colliery, there is a reasonable level of tree cover, much of which appears to be self-seeded.

Landscape Character

National Landscape Character Areas

10.69 The majority of the Rail Terminal site lies within National Character Area (NCA) 60 Mersey Valley and which covers the southern and eastern extents of the Study Area. The DCO Site is located at the boundary between NCA 60 and NCA 56 Lancashire Coal Measures, which is located at the north-western extent of the DCO Site, in the vicinity of Highfield Farm, and which covers the northern and western extents of the Study Area. Refer to PEIR Figure 10.3.1 which illustrates the location of the NCAs.

10.70 These are broad-scale landscape character study and as such provide a high-level understanding of the landscape character of the study area, with the local (District and Borough) character assessments providing greater detail.

10.71 The key characteristics of NCA 60 are:

“The landscape is low-lying, focusing on the broad linear valley of the River Mersey; it is estuarine in the west and has extensive areas of reclaimed mossland in the east.

Underlain by Triassic sandstone, the surface geology is principally drift material: marine and river alluvium in the valley bottom, extensive areas of till, pockets of glacial sands and gravels, with peat in some drainage hollows.

The Mersey Estuary is a defining element in the landscape, with expansive intertidal mudflats/sand flats and low exposed cliffs.

The River Mersey flows from east to west, joined by associated tributaries, although the Mersey itself is often obscured from view.

Trees and woodland are mainly associated with settlements, occasional parkland and isolated woodland blocks; and in recent years new community woodlands have been planted.

Large-scale, open, predominantly flat, high-quality farmland occurs between developments, with primarily arable farming to the north of the valley and a mixture of arable and dairying to the south.

The field pattern is regular and large scale, often defined by hedgerows with isolated hedgerow trees; many hedgerows are intermittent and have been replaced by post-and-wire fencing, while field boundaries on the mosses are marked by ditches.

A range of important wetland habitats remain, including estuarine mudflats/sand flats and fringing salt marshes in the west, remnants of semi-natural mosslands and pockets of basin peats in the east, with the broad river valley in between.

The predominant building material is red brick though some sandstone construction remains, and some survival of earlier timber frame.

There are densely populated urban and suburban areas, with major towns particularly at the river crossings, including Runcorn, Widnes and Warrington.

There is large-scale, highly visible industrial development, with docks, chemical works and oil refineries.

The river valley has a dense communication network with motorways, roads, railways and canals running east–west, and power lines are also prominent.”

10.72 The key characteristics of NCA 56 are:

“Fragmented landscape created by a complex pattern of mining and industrial activity intermixed with housing; this is a densely populated area with a scattered settlement pattern.

Gentle hills and valleys run from the north-west to the south-east, creating a soft but varied topography.

The area is underlain by Coal Measures, which are buried under a patchy layer of glacial deposits, subsequently affected by a long history of mineral working.

Woodland cover is limited across most of the area (covering 9 per cent), except to the north-west of Wigan. Community woodlands have been established on many post-industrial sites, and bring multiple benefits, including for public access and nature conservation.

Some large tracts and isolated pockets of agricultural land remain within the urban fabric, principally used for permanent grassland or cereal production, although horse grazing and stabling are also common.

Field patterns are predominantly medium to large and rectangular, mostly resulting from 18th-century and later change, with field boundaries defined by poorly managed hedges or post-and-wire fencing.

Widespread ground subsidence, caused by coal mining activities, has resulted in the formation of subsidence flashes. These have created many areas of open water and wetlands, while scattered ponds and fragmented pockets of semi-natural habitat remain elsewhere.

The area has an increasingly recognised strong cultural and industrial heritage, associated with heavy industry and mineral extraction – particularly south of Wigan – while the majority of the pits, spoil heaps and open cast sites have now been reclaimed and landscaped.

The area is significantly influenced by transport and utilities infrastructure, with motorways, major roads and rail lines criss-crossing the landscape.”

Local Landscape Character Areas

10.73 The following landscape character areas (LCAs) have been scoped into the assessment of effects on landscape character and therefore are the ‘assessment LCAs.’ They comprise LCAs which have been identified in the following published landscape character studies:

- Landscape Character Assessment for St Helens (St Helens Borough Council, 2006).¹
- Wigan: A Landscape Character Assessment (Wigan Council, 2009).²
- Warrington: A Landscape Character Assessment (Warrington Borough Council, 2007).³

10.74 Additionally, the Wigan Character Assessment is referenced in a Greater Manchester Combined Authority document:

- Greater Manchester Landscape Character and Sensitivity Assessment (Greater Manchester Combined Authority, 2018)⁴.

10.75 The Greater Manchester study provides an update to the areas identified in the district level landscape character assessments and will therefore has been referenced in relation to Wigan landscape character areas within Appendix 10.3.

10.76 The local landscape character studies are of an appropriate level of detail that they will form the basis of the assessment of landscape effects of the Proposed Development and, ultimately contribute to a summary of effects on landscape character which disregards local authority

¹Landscape Character Assessment for St Helens, (St Helens Borough Council 2006) Available online at [https://www.omegawestdocuments.com/media/documents/4.%20Planning%20Application%20Documents%20\(Parkside%20Phase%201\)/4.134%20St%20Helens%20Landscape%20Character%20Assessment%20\(2%20Agricultural%20Moss%20&%20AM4%20Highfield%20Moss\).pdf](https://www.omegawestdocuments.com/media/documents/4.%20Planning%20Application%20Documents%20(Parkside%20Phase%201)/4.134%20St%20Helens%20Landscape%20Character%20Assessment%20(2%20Agricultural%20Moss%20&%20AM4%20Highfield%20Moss).pdf)

²Wigan: A Landscape Character Assessment (Wigan Council, 2009), Available online at <https://www.wigan.gov.uk/Docs/PDF/Resident/Planning-and-Building-Control/LandscapeCharacterAssessment.pdf>

³Warrington: A Landscape Character Assessment (Warrington Borough Council, 2006), Available online at https://www.warrington.gov.uk/sites/default/files/2019-08/landscape_character_assessment_2007.pdf

⁴Greater Manchester Landscape Character and Sensitivity Assessment (Greater Manchester Combined Authority, 2018), Available online at <https://www.greatermanchester-ca.gov.uk/media/1727/greater-manchester-landscape-character-and-sensitivity-report.pdf>

boundaries, focusing on how the Proposed Development will change landscape character within the study area.

10.77 The local character assessments describe character types and areas within the study area and while the effects of all such areas which would be subject to some visual influence of the Proposed Development will be considered in the landscape assessment, there will be focus on the direct change to the two host character areas, i.e. those which the Main Site and Western Rail Chord fall within:

- St Helens AM4: Highfield Moss SSSI (Agricultural Moss Character Type).
- Wigan 1A: East Lancashire Road Corridor Lowton Heath To Lately Common (Undulating Enclosed Farmland Type).

10.78 Additionally, small extents of the DCO Site fall within the following areas:

- Wigan 6A: Highfield Moss SSSI (Mossland Character Type).
- St Helens SS1: Newton Le Willows (Separate Settlement Character Type).
- Warrington Area 1C: Winwick, Culcheth, Glazebrook and Rixton (Undulating Enclosed Farmland Character Type).

10.79 Baseline descriptions of each of the LCAs scoped into the assessment are presented in PEIR Appendix 10.3. Each of the baseline landscape descriptions includes a summary of the key characteristics of landscape within the extents of the study area that have a bearing on the sensitivity of the LCA to the Proposed Development (i.e. the key characteristics and attributes that are likely to be indicators of the sensitivity of each LCA to the addition of a rail freight terminal, warehouses and associated infrastructure). Each description includes the identification of a sensitivity rating of the landscape area relative to the Proposed Development.

10.80 In addition to the five LCAs which form the focus of the assessment of effects on local landscape character areas, the following three LCAs have been identified as being subject to potential indirect landscape effects as the ZTV coverage illustrated on Figures 10.4.1, 10.4.2 and 10.4.3 demonstrates that there would be some theoretical visual influence due to the Proposed Development:

- St Helens WFE2: Haydock Park (Wooded Former Estate Type);
- St Helens RSH5: Lyme and Wood Pit (Raised Spoil Heap Type);
- Warrington 2B: Holcroft and Glazebrook Moss (Mossland Type).

10.81 Brief baseline descriptions of the additional LCAs are also presented in PEIR Appendix 10.3.

10.82 Subsequent Table 10.4 summarises the key characteristics and sensitivities of each assessment LCA.

Table 10.4 Assessment LCAs baseline summary

LCA Reference	LCA Summary Description
St Helens AM4: Highfield Moss SSSI	A generally flat and open landscape with an overriding horizontal composition enabling panoramic views across the surrounding landscape to immediate development horizons and the more distant hills. There is a large regular field pattern historically part of the Parkside and Newton Parks landscape bordered by small maintained hedgerows with isolated trees and small pockets of scrub woodland. An area of undeveloped moss exists, comprising an area of rough grassland and scrub woodland. Although the area is of generally rural character, large scale infrastructure is present such as the M6, railway lines and lines of pylons which cross the area. In addition, a number of urban elements, such as kerbs, street lighting and security fencing, are present and these together with the infrastructure elements contributes to a degraded rural character. This subdivision of the character area is further reinforced by the more degraded landscape character to the west associated with the significant landscape disturbance attributed to Parkside Colliery. There is minimal settlement within the area with only isolated scattered farmsteads. Small areas of woodland and shelterbelts are occasionally associated with these farmsteads. The presence of woodland increases to the west with wooded field boundaries to Newton Park Farm and along the incised Newton Brook.
Wigan 1A: Lowton Heath to Lately Common	This areas forms an agricultural landscape buffer to the densely developed residential areas of Golborne and Leigh to the north. The land is relatively flat and low-lying to the east with more strongly undulating ground to the west. The areas are typified by a medium to large-scale field pattern consisting of mainly arable land with poorly maintained remnant hedgerows with few hedgerow trees. Views within the area are limited due to the low-lying and relatively flat nature of the land and due to surrounding development and high hedgerows, particularly to the East Lancashire Road (A580). The East Lancashire Road is visually dominant throughout much of the area, particularly where it runs on embankments. Small deciduous woodlands form backdrops to views within the landscape, mainly to the south at Haydock Park and along the course of Newton Brook.
Wigan 6A: Highfield Moss SSSI	The mossland landscape constitutes a distinctive character comprised of almost flat land divided geometrically into a series of rectilinear small to medium sized fields and moss woodlands separated by deep open drainage ditches. These areas often fill with low lying mists and fogs on cooler nights. Hedgerows are notably

LCA Reference	LCA Summary Description
	absent from the core areas. Highfield Moss SSSI is a small mossland located in the southern extent of Wigan Borough. It is a triangular area surrounded by agricultural land and crossed to the north by the Liverpool–Manchester railway line. The land adjacent is slightly higher and peat moss is found in a natural basin. It is surrounded by open ditches. This mossland has not been reclaimed or farmed, although farming takes place close to its edges. The construction of the railway line to the north has removed part of the moss, but has in part protected the remaining areas from reclamation.
St Helens SS1: Newton-le-Willows	The settlement is located on a raised area in the fork of two river valleys: the Sankey Brook, including the Sankey Canal, which borders to the southwest; and Newton Brook to the east and south. The settlement is divided into two broad areas: Newton to the east contains a medieval centre retaining a strong historic street pattern centring on High Street and associated architecture, punctuated at the eastern end the prominent tower and building of St Peters Church; and Earlestown to the west was established during the construction of viaduct over Sankey canal where extensive works and housing was provided for the construction workers in brick terraces that are common throughout the Borough. The striking line of terraces in and around Haydock Street respond to a former railway line, now dismantled, but the street orientation and adjacent grid pattern at Viaduct Street contrast markedly with more recent crescent development. Although more contemporary housing developments exist on the edge of the settlement, modern development within the town centre and medieval core has been less pronounced and still retains a strong character. This is supported by intact pockets of historic industrial terraced housing which creates a localised sense of place and adds to the diversity of the settlement. The Town contains the historic industrial Vulcan works and associated ‘village’ to the south of the settlement. The village has a strong identity and intimate scale which is reinforced by the dramatic scale and proximity of the adjacent buildings to the Vulcan Works.
Warrington 1C: Winwick, Culcheth,	This area typifies undulating enclosed farmland with a medium to large-scale field pattern. The area stretches in an arc from the River

LCA Reference	LCA Summary Description
Glazebrook and Rixton	Mersey in the south, through Glazebrook to Culcheth in the north and finally wrapping around Winwick in the west. The agriculture predominantly consists of arable fields, intensely cropped, with poorly maintained remnant hedgerows with few hedgerow trees. Small deciduous woodlands form backdrops to some views within the landscape. The area contains three significant knolls, one of which is located Wood Head Farm, just west of the Parkside Road crossing of the M6. Immediately north of Rixton Clay Pits and abutting Risley Moss to the west is Rixton Landfill Site. This is a domestic refuse facility, which is visually prominent in the landscape, particularly from Rixton Moss to the west, with views from the south screened by Rixton Clay Pits. North of Southworth Hall is a large sand quarry, screened by mounding and planting, which adjoins an old colliery tip to the north and to the west, part of which (adjacent to the M6) has been reclaimed.
St Helens WFE2: Haydock Park	The topography of this area is of a generally flat open landscape with strong horizontal composition, subtly rising in elevation from the course of the Newton Brook to the south east at 25m AOD up to 50 metres at the urban edge with Ashton-in-Makerfield. It is a park landscape which covers an extensive area at the very eastern extent of St Helens Borough, although highly fragmented and divided by the location of the M6 running north to south and the A580 running east to west often at elevation. The predominant land use of the area is arable farmland cultivated within a largescale geometric regular field system. Hedged field boundaries vary in condition and where neglected they emphasise the sense of openness and scale of the landscape. Mature woodland blocks, shelterbelts and plantations interrupt the field pattern to create an interesting spatial sequence and partially enclose several of the fields. To the north the character area is defined by layout of the Haydock Race Course, for which the grassed white-fenced course sits relatively unobtrusively within the large scale open park landscape. Within the mature landscape structure a number of small dams and lakes /ponds and associated riparian woodland are found along the narrow valley to Newton Brook and tributaries which flows southwards and is dammed at intervals to form the Dean Dam and Newton Lake. There are remnants of former estate structures such as walls and ornamental gate features. The large grade separated elevated road junction of the M6 and A580 separate and divide the character area, dominating the experience of the landscape and detracting from the rural qualities of the area. Within the area there is minimal settlement with buildings related to the functions of Haydock Park or a scatter of farm steading. The proximity and visual prominence of the

LCA Reference	LCA Summary Description
	surrounding settled edges imposes an urban character on the landscape.
St Helens RSH5: Lyme and Wood Pit	This is a former spoil heap that sits adjacent to residential as well as agricultural areas. The spoil heap is under restoration and thus the landscape is in a state of flux and retains a character of industry and reclamation. The spoil head is relatively elevated in high in comparison to the scale of dwellings in the surrounding residential areas and provides an unnatural dark-grey profile and visual horizon in many views. It physically and visually separates the settlement areas of Haydock to the north and Newton le Willows to the south. There are some minimal areas of scrub and woodland planting as well as some areas of new woodland planting, which until the planting starts to mature and thicken, retains a raw character to the woodland.
Warrington 2B: Holcroft and Glazebrook Moss	Holcroft and Glazebrook Moss form a continuous area of mossland separated from Risley and Rixton Mosses to the south-west by a narrow causeway known as Old Hall Lane, situated on slightly higher land between Milverton Farm and New Hall Farm. Their landscape character is similar to that of the adjacent Rixton Moss, although field sizes become larger from south to north with fewer dividing ditches. Arable crops appear more extensive and less varied. The impression of 'isolation' within the area is less marked with views tending more towards the east and the Pennines. The edges of this mossland are indistinct, visually feathering into bordering areas. The landfill site at Silver Lane is a dominant and alien feature in an otherwise flat landscape. The Main Site is currently active, although completed sections are now 'over soiled' and planted with mainly native woodland species.

Visual Baseline

Zone of Theoretical Visibility

- 10.83 Refer to PEIR Figures 10.3.1 to 10.3.3 for the extent of ZTV of the main warehouse buildings, rail gantries and Western Rail Chord.
- 10.84 The ZTV in Figure 10.3.1 has been modelled based on a height of 30m from the proposed ground level to reflect the maximum height above ground of the buildings. The Parameters Plan (PEIR Figure 3.1) provides accurate maximum AOD heights for key components of the Proposed Development, including the warehouses, which are the tallest proposed elements.
- 10.85 As shown on PEIR Figure 10.4.1, the Main Site is located within a relatively flat plain with only

relatively localised undulations in topography, albeit which are effective in screening some views when combined with the screening effects of built form and vegetation cover. The Main Site demonstrates relatively limited topographic variation and the extent of each Zone of Theoretical Visibility (ZTV) of the Proposed Development is primarily influenced by: very subtle topographical variations within a broadly flat context; occasional blocks or belts of tree cover; and dense built form within the further reaches of the Study Area. Given the relatively low amount of built form within the immediate area surrounding the Main Site, this has less of an influence on the ZTV, however there is some localised screening afforded by built form and associated garden tree and hedge cover within the smaller settlements throughout the Study Area.

10.86 Notable elements which influence the extent of intervisibility across the landscape are:

- a gentle rise in the landform to the north of the Main Site, up to a low ridge in the vicinity of Newton Road, which, combined with trees and hedgerow, restricts views further north;
- tree cover and localised undulations directly to the west of the main Site and the M6 motorway, in the Parkside West area;
- scattered woodland blocks to the east of the main Site, in the vicinity of Kenyon, New Lane End and Croft; and
- other localised built form, trees and hedgerow throughout the study area.

10.87 The following are initial observations regarding the ZTV for the main buildings and site observations:

- The main zone of theoretical visibility would be due to proposed structures within the Main Site. Parts of the Proposed Development which would be located to the west of the M6 (the Western Rail Chord) would be largely contained by the proposed Parkside West development and therefore would have much less visual influence on the study area.
- The relatively flat nature of the study area suggests that there would be theoretical visibility of the Proposed Development from the majority of the study area, which is supported by the DTM based ZTV. However, the ZTV which is based on DSM data, illustrates that the actual visual influence of the Proposed Development would be much more limited and site surveys have confirmed this.
- The main zone of visibility would comprise an area within a radius of approximately 2km to the east and 1.5km to the north of the DCO Site boundary. The area to the east includes open farmland and the small villages of Kenyon and Croft. The area to the north comprises the very southern extent of Golborne, along Newton Road, and specifically an east-west ridge which affords slightly elevated views over parts of the DCO Site.
- Views from the west would be more restricted, predominantly due to the screening provided by tree cover beside the M6 motorway. However, there would be potential visibility of the Main Site from areas to the west, including the eastern edge of Winwick,

with potential views across flat, open farmland.

- There is an area of the ZTV to the west, south-west of the DCO Site between 2 and 4km from the DCO Site boundary within which there is ZTV coverage. Site surveys have confirmed that tree cover in the intervening landscape would limit views of the Proposed Development from here, however it will be considered fully in the LVIA.
- Similarly there are small areas of high ground within the wider study area which have been identified in the ZTV: Skylark Hill, Haydock, which is 3km west, north-west of the DCO Site; and Culcheth Heights, which is 4km east of the DCO Site.

Representative viewpoints

10.88 30 representative viewpoint locations have been selected to assist in understanding the appearance and visual effects of the Proposed Development. Representative viewpoints have been discussed and agreed with the LPAs and their locations are shown on PEIR Figure 10.5.1.

10.89 Viewpoints are 'representative' and as such, whilst taken from a fixed point, are intended to reflect the range of visual aspects experienced by the receptors they represent. The interpretation of the significance of visual effects on individual representative viewpoints should therefore be recognised as more widely informing the assessment of effects on the visual receptors identified in this assessment.

10.90 The following table lists the representative viewpoints, identifying the key receptors that each represents.

Table 10.5 Representative viewpoints baseline summary

Viewpoint reference	Location	Reason for selection
1	Track close to the Huskisson Memorial Located within the boundary of St Helens Borough Council	Recreational users of the track (track not shown on the definitive map).
2	Footpath beside Highfield Moss SSSI Located within the boundary of St Helens Borough Council	Nearby residential receptor (Highfield Farm) and recreational users of the footpath. This right of way is St Helens 665, leading to Wigan route no. 91.
3	Footpath close to Kenyon	Recreational users of the footpath which connects into the DCO Site from the vicinity of Kenyon Hall

Viewpoint reference	Location	Reason for selection
	Hall Farm Located within the boundary of Wigan Council	Farm (café). This right of way is Wigan route no. 101.
4	Croft Located within the boundary of Warrington Borough Council	Residential receptors in Croft and recreational users of footpaths. This right of way is Warrington route no. 24.
5	Winwick Interchange Located within the boundary of Warrington Borough Council	Position on a pavement beside the southern extent of the DCO Site.
6	Golborne Road, Winwick Located within the boundary of Warrington Borough Council	Residential receptors in Winwick and recreational users of footpaths. The viewpoint position is located on a pavement beside the road leading north out of Winwick.
7	Newton Road (West) Located within the boundary of Wigan Council	Residential receptors in Lowton and recreational users of footpaths.
8	Newton Road (East) Located within the boundary of Wigan Council	Residential receptors in Lowton and recreational users of footpaths.
9	Kenyon Located within the boundary of Warrington	Residential receptors in Kenyon and recreational users of paths beside road. This right of way is Warrington route no. 102.

Viewpoint reference	Location	Reason for selection
	Borough Council	
10	Culcheth Heights Located within the boundary of Warrington Borough Council	Long range view from publicly accessible area of high ground.
11	Path beside M62 Located within the boundary of Warrington Borough Council	Long range view from footpath network just north of the M62 motorway. This right of way is Warrington route no. 2.
12	Burtonwood Located within the boundary of Warrington Borough Council	Recreational receptors just to the east of Burtonwood. This right of way is Warrington route no. 34.
13	Skylark Hill, Haydock Located within the boundary of St Helens Borough Council	Long range view from publicly accessible area of high ground.
14	Golborne Located within the boundary of Wigan Council	Residential receptors in Golborne and recreational users of paths beside road. The viewpoint is located on a pavement beside the East Lancashire Road (A580).
15	A49, Mill Lane Railway Bridge, Newton-Le-Willows Located within the boundary of St Helens Borough Council	Requested by St Helens Borough Council in Dec 2024 Close range view towards the western part of the Main Site from railway bridge on A49 Mill Lane.

Viewpoint reference	Location	Reason for selection
16	Newton-Le-Willows station Located within the boundary of St Helens Borough Council	Requested by St Helens Borough Council in Dec 2024 Potential long range views towards the Main Site from Newton-Le-Willows railway station.
17	Footpath connecting Willow Park, Newton-Le-Willows with Castle Hill Located within the boundary of St Helens Borough Council	Requested by St Helens Borough Council in Dec 2024 Long range view towards the Main Site from the footpath network connecting Willow Park in Newton-Le-Willows with Castle Hill, close to the M6 motorway
18	Parkside Road at The Mosslands Located within the boundary of St Helens Borough Council	Representative of residential receptors at the northern extent of Parkside Road.
19	Highfield Farm footpath Located within the boundary of Wigan Council	Close Range view from Footpath 006/92/10.
20	Highfield Moss SSSI Footpath Located within the boundary of Wigan Council	Representative of a close-range view from Footpath 006/90/10 and of recreational users of Highfield Moss SSSI.
21	Morris Farm Located within the boundary of Warrington Borough Council	Representative of residential receptors at on Main Lane, close to the Main Site.

Viewpoint reference	Location	Reason for selection
22	Little Town Footpath Located within the boundary of Warrington Borough Council	Representative of a long-range view from Footpath 00097/10/1.
23	Footpath Leading to Southworth Hall Farm Located within the boundary of Warrington Borough Council	Representative of a long-range view from Footpath 00097/1a/1.
24	Hermitage Green Footpath Located within the boundary of Warrington Borough Council	Representative of the view from Footpath 00322/1n/1.
25	Vulcan Park Way Located within the boundary of St Helens Borough Council	Representative of residential receptors at Vulcan Park Way, Newton-Le-Willows.
26	Sankey Valley Trail, Public Right of Way Located within the boundary of Warrington Borough Council	Representative of a long-range view from the Sankey Valley Trail.
27	Kenyon Footpath Located within the boundary of Warrington Borough Council	Representative of footpath users on Warrington Footpath 13.

Viewpoint reference	Location	Reason for selection
28	Moss Lane Footpath Located within the boundary of Wigan Council	Representative of residential receptors at Highfield Farm and footpath users.
29	Footpath to the South of New Lane End Located within the boundary of Warrington Borough Council	Representative of footpath users and residential receptors at the nearby detached properties.
30	Rock House, Sandy Brow Lane Located within the boundary of Warrington Borough Council	Representative of the view experienced by cyclists, pedestrians and vehicle on Sandy Brow Lane.

10.91 A description of the existing view at each viewpoint location is provided in PEIR Appendix 10.4. Baseline photographs of the view from each representative viewpoint location are presented in PEIR Figures 10.6.1 to 10.6.30.

Visual Receptors

10.92 The locations of visual receptors are identified on PEIR Figures 10.5.2 and 10.5.3. Visual receptors typically associate with the following outlooks:

- views experienced by people living in residential areas and individual properties;
- views from people on PRow;
- views from people using community facilities;
- views from employment sites, i.e. people at their places of work; and
- views from people in vehicles when travelling along roads.

10.93 A thorough selection of viewpoints forms the basis of the visual assessment, as is set out in PEIR Appendix 10.4 which includes a description of the existing view and the likely visual effects of the Proposed Development. To ensure there is a documented list of individual receptors throughout the Study Area, PEIR Appendix 10.5 provides a schedule of visual

receptors with a cross reference to the relevant viewpoint assessment provided in PEIR Appendix 10.4.

- 10.94 A summary of the type and location of the main visual receptor groups is provided below. For each group of receptors, a standardised judgement on susceptibility to change has not been applied. For example, receptors using PRoW typically vary in their levels of susceptibility, dependent on the characteristics of the view they currently experience. Refer to PEIR Appendix 10.4 which defines the levels of susceptibility, value and overall sensitivity for each representative viewpoint.

People in Residential Properties

- 10.95 Whilst the Main Site and its immediate surroundings predominantly comprise open fields, the wider 5km study area comprises a large proportion of densely developed built form, located mainly in the settlements of: Newton-le-Willows, adjacent to the western boundary of the main DCO Site; Golborne, located 1km north of the main DCO Site; Winwick, located 1.1km south-west of the main DCO Site; Culcheth, located 2.7km east of the main DCO Site; Warrington, located 2.7km south of the main DCO Site; and Haydock, located 4.3km north-west of the Main Site.

- 10.96 Receptors within these main settlements are unlikely to be subject to visual effects given the lack of available views of the Proposed Development. Therefore, and with reference to the ZTVs shown on PEIR Figures 10.5.1 to 10.5.3, the residential receptors which could experience visual effects due to the Proposed Development are:

- properties, typically farmhouses, located on Winwick Lane directly to the east of the Main Site;
- individual and small groups of properties located within 2km to the east of the Main Site on small lanes and local roads. This includes properties on the edge of small settlements such as Croft, New Lane End and Kenyon;
- properties on Kenyon Lane, Lane Head, within 1km to the north-east of the Main Site;
- properties located on, and just to the south of, Newton Road, within 1km to the north of the Main Site;
- properties on Parkside Road, directly to the west of the Main Site in the Lowton area;
- properties on the eastern edge of Newton-le-Willows, just to the west of the Western Rail Chord Site; and
- properties in the Hermitage Green area and north of Winwick, within 1km of the south-western extent of the Site.

- 10.97 People's views from residential properties associate with their sense of identity and place and people tend to spend longer durations of time within their homes than in other locations, such as recreational locations or their workplace. The susceptibility of such views to change is therefore typically considered to be higher, subject to the influence of what is present in

the existing view. It therefore follows that the visibility of existing infrastructure, such as large buildings, transport infrastructure or electricity pylons, may reduce susceptibility where similar features are proposed.

Users of Public Rights of Way

10.98 Various PRoW (e.g. footpaths and bridleways) coincide with the extent of the study area, which are shown on PEIR Figures 10.5.1 to 10.5.3. Some PRoW are enclosed by built form, subtle landform undulations and tree cover. PEIR Appendix 10.5 identifies visual receptors, however the following is a high-level summary of groups of routes which are most relevant to the assessment of effects of the Proposed Development:

- Wigan Footpaths 006/91/10, 006/90/10 and 006/93/10 are located within Highfield Moss SSSI, at the northern extent of the Main Site;
- Wigan Footpaths 006/85/10, 006/86/10, 006/87/10, 006/92/10, 006/95/10, 00697/10 and 006/98/10 are located directly to the north of the Main Site, just south of Newton Road in Lowton;
- Warrington Footpaths 00097/29/1 and 00097/100/1 are located in fields close to the north-eastern extent of the Main Site, close to Winwick Lane;
- Warrington Footpath 00097/4/1 is located in fields close to New Lane End and Croft, to the east of the Main Site;
- Warrington Footpaths 00322/1n/1, 00322/30/1, 00322/29/2, 00322/3a/1 and 00322/3c/1 are all located to the west of the M6 motorway, to the south of the Main Site, just north of Winwick; and
- there are also two tracks within the DCO Site which appear to indicate recent usage by members of the public, however they are not shown on the definitive map. They are located at the northern extent of the DCO Site: the first route connects Parkside Road in the west to the footpath network beside Highfield Moss SSSI in the east; and the second is a small spur off to Highfield Farm. These routes are identified on Figure 1 with blue circles. Despite not being recorded on the Definitive Map as a legal Public Right of Way, it is understood that they are used by the public.

10.99 There are other PRoW within the wider study area which will be referred to where necessary in the subsequent assessment of effects.

10.100 Roads which have pavements and either connect into the footpath network within the DCO Site directly, or just outside it and therefore connect indirectly, are:

- Within the eastern boundary, the very southern extent of Winwick Lane. This section has been upgraded as part of the Parkside Link Road and has a pavement located on its western side. However, the majority of Winwick Lane has no designated footpath provision beside it, with hedgerow abutting the road in the most part.
- Parkside Link Road crosses the central extent of the DCO Site and has pavement

provision beside it.

- Parkside Road (A573) provides access into the main part of the DCO Site from Winwick and Hermitage Green, and has pavement provision beside it.

10.101 The susceptibility of views from recreational receptors varies depending on the nature of the recreational activity and therefore how much attention is given to the view. Where the activity is focussed, such as an organised sport, or has some active engagement such as allotments, or is within an area attributed to function, such as around large-scale agricultural buildings, then the surrounding view is less important than where the purpose of the recreation is specific to the enjoyment of the setting.

10.102 The susceptibility of views to change is therefore variable and is further influenced by what is present in the existing view such that the visibility of existing infrastructure, such as roads, pylons or buildings, may reduce susceptibility where similar features are proposed.

Users of Community Facilities

10.103 Three community areas have been identified as being sufficiently valued within the study area, such that they have been considered in the visual assessment: Culcheth Linear Park; Jubilee Wood Community Woodland; and Culcheth Heights.

10.104 No other community facilities, such as churches and parish halls, were identified at which there would be the potential for notable visual effects.

People Using Roads

10.105 Views of the Proposed Development would be experienced by road users of various roads within the Study Area. These tend to be single lane roads which connect settlements and isolated properties and comprise:

- users of Winwick Lane, located along the eastern boundary of the main DCO Site;
- users of the newly opened Parkside Link Road, which crosses the central extent of the DCO Site;
- users of Parkside Road (A573) provides access into the main part of the DCO Site from Winwick and Hermitage Green;
- users of Newton Road to the north;
- users of small, rural roads to the east, namely Main Lane and Sandy Brow Lane; and
- the M6 is located at the western extent of the main DCO Site, albeit road users typically pass at high speed and the focus of their views would be on the road.

10.106 The susceptibility of views from road receptors would typically be limited where the focus of the view would not be fixed on a particular outlook or visual relationship. As the receptor outlook is inherently that of the road along which they are travelling, the susceptibility of views is typically low.

People at Employment Sites

10.107 Views of the Proposed Development would be experienced by people working at occasional employment sites throughout the Study Area. These tend to be agricultural related businesses such:

- Morris Farm, located 0.1km east of the DCO Site, beside Main Lane;
- Kenyon Hall Farm, located directly to the east of the Main Site;
- Bibby Commercials, located directly to the east of the main DCO Site, close to the Parkside Link Road;
- Woodhead Farm, located 0.2km east of the Main Site, on the opposite side of the M6 motorway;
- Sand Up Farm, located 0.4km north of the Main Site, just off Newton Road; and
- Highfield Farm, located 0.3km north of the Main Site.

10.108 These receptors have either been considered already as residential receptors (Morris Farm, Woodhead Farm, Sand Up Farm and Highfield Farm) and therefore not considered again as receptors of lower sensitivity in Appendix 10.5, or they have been assessed on site as being unlikely to be subject to significant visual effects and so not considered further in this LVIA.

10.109 Receptors which have been considered in Appendix 10.5 are:

- Kenyon Hall Farm Shop, Winwick Lane, located directly to the east of the Main Site;
- Newbank Garden Centre, Southworth Road, located 0.1km to the north-west of the Main Site; and
- High Peak Nursing Home, Main Lane, Kenyon, located 0.7km east of eastern boundary.

10.110 The susceptibility of views from employees would typically be limited as the focus of the view would be internal to the employment site and as people would be focused on their job, as opposed to the wider views. The susceptibility of views to change is therefore low.

EMBEDDED MITIGATION MEASURES

Site Selection

10.111 With regards site selection, refer to PEIR Chapter 4 which describes the process undertaken by the Applicant. In summary, the Applicant has reviewed a range of Site, development, road and environmental mitigation options with a view to arriving at a proposal that fulfils the requirements of the NPSNN, respects neighbouring communities, responds to the local environmental context and fulfils the operational requirements of freight and logistics operators.

10.112 Prior to the submission of its DCO application, the Applicant will continue to review the emerging findings of the EIA for the ILPN SRFI and feedback from stakeholder consultations.

Construction Phase

10.113 Embedded mitigation during construction would be secured by the adoption of a Construction Environmental Management Plan (CEMP). An outline Construction Environmental Management Plan (oCEMP) has been provided with specific measures that include:

- Sensitive colouring of welfare facilities and temporary office units within site compounds.
- Keeping a tidy and organised site.
- Materials delivered on an ‘as needed’ basis to prevent unnecessary stockpiles.
- Protection of retained vegetation in accordance with British Standard (BS) 5837:2012. Hedgerow and trees located in proximity to the working areas will be protected from disruption and if necessary, protection fences will be erected to ensure that roots remain undisturbed.

10.114 If the DCO is granted, the oCEMP will be developed into a detailed CEMP once a contractor is appointed. The CEMP will be in substantial accordance with this oCEMP and will be a requirement of the DCO for submission and approval by the Local Planning Authorities (LPA) prior to construction.

Operational Phase and Landscape Design Principles

10.115 The Illustrative Landscape Masterplan accompanying this PEIR is provided on PEIR Figure 3.4 and illustrates the likely proposed landscape and visual mitigation of the Proposed Development. The outline Landscape and Ecological Environmental Management Plan (oLEMP) will comprise the delivery mechanism through which the mitigation will be delivered, and which must therefore be in substantial accordance with the Illustrative Landscape Masterplan (PEIR Figure 3.4). A final version of the LEMP will be secured by the provisions of the DCO and will be prepared in substantial accordance with the oLEMP and approved by the relevant local planning authorities (LPAs) prior to commencement of construction.

10.116 The Illustrative Landscape Masterplan (PEIR Figure 3.4) is annotated to set out the purpose of the landscape proposals to meet the design objectives and mitigate for the impacts of the Proposed Development, these include:

- modification of the public rights of way network across the Main Site, including the provision of new routes which would provide improved connectivity, such as between Winwick Lane and Newton Road, via the Main Site;
- sensitive design of landscape treatment alongside public rights of way on the well-used network of routes within the area to the north of the Main Site;
- where the stopping up of routes is unavoidable (i.e. Wigan 006/1010/10, St Helens 608

and St Helens 621) replacement routes would be provided which retain functionality and enhance where possible.

- closure of two level crossings on the Liverpool-Manchester railway line and provision of a pedestrian bridge to enable continued safe enjoyment of the existing and proposed PRow network north and south of the railway. In addition, improved pedestrian access will be provided on existing bridges at Parkside Road and Winwick Lane.
- incorporation of earth bunds in key locations, such as on the eastern boundary of the Main Site, beside Winwick Lane, where bunds will be created that are up to 3m above proposed ground levels, and a maximum of 6m above existing ground levels, within the Main Site. The bunds will provide localised screening of lower level activity, such as truck movements on internal roads;
- provision of woodland belts on the western and eastern boundaries of the Site, screening lower level activity within the Proposed Development, such as truck movements. This includes the creation of a 'green corridor' on the eastern boundary of the Main Site where footpaths would be up to 50m in width and bounded by hedgerows and woodland blocks for visual screening, landscape integration and habitat connectivity purposes;
- creation of species-diverse grassland meadows, localised mounding, new footpath routes and scrub planting as a buffer between the Proposed Development and the boundary of Highfield Moss SSSI to provide ecological mitigation and to relieve recreational pressure within the moss;
- inclusion of screen planting within the area of BNG mitigation to the north of the Liverpool-Manchester railway line, which is within LCA 1A. This responds to the visual change experienced by residents on Newton Lane in particular and will, in time, screen much of the Proposed Development given the proximity of the woodland belts to the receptors. This planting will also screen some views from the footpath network in this location, albeit the design has aimed to retain some openness in this location and the variety of habitats proposed as part of the BNG design requires that much of this area will comprise grassland and other open habitat types; and
- implementation of mitigation planting within LCA 1C, specifically the Soils Reuse Area, including new native woodland belts along field boundaries to the east of Winwick Lane and to the west of Croft, Lane End and Kenyon. This will strengthen the existing field pattern, enhance landscape character, and support biodiversity through the retention and reinforcement of hedgerows and the reintroduction of hedgerow trees. The proposals accord with the recommended Management and Landscape Objectives for Area 1C, which emphasise the importance of better hedgerow management and encourage the careful extension of woodland to integrate development sensitively into the surrounding landscape.

10.117 The design process has also embedded improvements in the scale, position and appearance of the built form within the Main Site, such as: reduction in the height of buildings from 35m at Scoping stage, to a maximum of 30m in this PEIR; adjustments to the layout of buildings on

the western boundary of the Main Site, beside the M6, to enclose truck movements within the Main Site; adjustment in the layout of buildings, roads and parking on the eastern boundary of the Main Site, to ensure that a minimum of 50m is achieved in the 'green corridor' beside Winwick Lane; building design/colours/roofline/etc.

10.118 With reference to the Illustrative Landscape Masterplan (PEIR Figure 3.4), the following approximate quantities of key landscape elements would be implemented as part of the Proposed Development:

- 26 ha of native species woodland;
- 9 km of native species hedgerow; and
- 1,500 individual trees (i.e. trees outside the woodland areas).

10.119 PEIR Chapter 11: Ecology and Biodiversity provides detail on other new landscape elements to be introduced, comprising grassland and scrub areas for example.

10.120 The management and maintenance of the Proposed Development's proposed landscaping and green infrastructure would be secured by the requirements of the oLEMP. This would ensure the proposed landscaping is successful in establishing and can be relied on as embedded mitigation for the Landscape and Visual impact Assessment.

10.121 The Illustrative Landscape Masterplan will continue to evolve in advance of submission of the application for development consent. Whilst the detailed layout of specific landscape elements may be subject to changes, the principle of the proposals as shown on the illustrative masterplan will eventually be secured by the provisions of the DCO and the oLEMP.

Enhancement

10.122 The Illustrative Landscape Masterplan (PEIR Figure 3.4) provides for a Proposed Development intended to not only avoid, reduce and mitigate for landscape and visual effects, but to take opportunities for enhancement, particularly in relation to the existing PRow network. The enhanced PRow network will substantively improve the functionality of the landscape surrounding the Proposed Development such that it has greater utility to the local community as a place to take recreation and appreciate the countryside. This network will also facilitate more sustainable commuting and active travel more generally.

10.123 The design of proposed woodland belts, areas of scrub, grassland, hedgerows and trees, as shown on the Illustrative Landscape Masterplan, is intended to restore and reinforce existing landscape characteristics (e.g. through reinstatement of field boundary hedges), provide for a greater quantity and variety of wildlife habitats, , and provide enhanced recreational opportunities through features such as the 'green corridors.'

POTENTIAL EFFECTS PRIOR TO ADDITIONAL MITIGATION

Introduction

10.124 This section assesses the level and significance of the landscape and visual effects of the Proposed Development during the construction and operational phases. The assessments follow the iterative design development process and incorporation of the mitigation and enhancement measures set out in the Illustrative Landscape Masterplan (PEIR Figure 3.4) and oLEMP (PEIR Volume 2 Appendix 2-2). The assessment of operational effects is separated out into Year 0, or the 'opening year' of the Proposed Development and Year 15, when proposed mitigation planting would have reached a reasonable level of maturity, and which may be referred to as the 'Design Year' specifically in relation to this LVIA.

10.125 There is a separate Highway Mitigation Options Report which presents an overview of the potential highways access and infrastructure options currently under consideration as part of the Proposed Development and identifies the potential environmental effects associated with each option.

Construction Phase Landscape Assessment: Main Site and Western Rail Chord

10.126 Construction would result in temporary disruption within the DCO Site and Study Area. This would include a limited amount of vegetation clearance and localised earthworks, particularly in relation to the presence of site compounds and construction plant, vehicles and machinery.

Effects on Landscape Elements

10.127 The presence of construction plant, materials, machinery, and construction compounds would have an adverse effect on the composition of local landscape elements. Construction operations would be temporary and the residual effect on landscape character due to relatively minor vegetation loss, is factored into the assessment of operational phase effects.

10.128 The Main Site largely comprises open, large-scale arable farmland and there is a very low level of tree and hedgerow cover within the baseline situation. With regards loss of landscape elements to facilitate development woodland cover, the following are the most notable:

- a hedgerow along Winwick Lane;
- a small area of trees, no greater than 1 ha in size, located towards the north-eastern extent of the Main Site;
- a belt of trees which crossed into the western extent of the Main Site, just to the west of Parkside Road; and
- within the Western Rail spur, which comprises part of the former Parkside Colliery, there is a reasonable level of tree cover, much of which appears to be self-seeded, which will be removed to facilitate development.

10.129 There would be change to the underlying landform during construction to create the level development platforms upon which the proposed buildings will be located, to create the

railway line into the Main Site and in the provision of drainage retention basins and access tracks.

10.130 As was stated in the previous section, and with reference to the Illustrative Landscape Masterplan (PEIR Figure 3.4), the Proposed Development design embeds the following approximate quantities of key landscape elements to be implemented:

- 26 ha of native species woodland;
- 9 km of native species hedgerow; and
- 1,500 individual trees (i.e. trees outside the woodland areas).

Effects on Landscape Character

10.131 The detailed assessment of construction stage effects on landscape character is set out in PEIR Appendix 10.3. Referring to Appendix 10.3, the landscape effects during construction on each of the character areas which have been scoped into the assessment, are stated in Table 10.6.

Table 10.6 Construction effects on landscape character areas

LCA	Level of Effect and Significance
St Helens AM4: Highfield Moss SSSI	Major Adverse (Significant)
Wigan 1A: Lowton Heath to Lately Common	Moderate to Major Adverse (Significant)
Wigan 6A: Highfield Moss SSSI	Moderate to Major Adverse (Significant)
St Helens SS1: Newton-le-Willows	Negligible (Not Significant)
Warrington 1C: Winwick, Culcheth, Glazebrook and Rixton	Moderate to Major Adverse (Significant)
St Helens WFE2: Haydock Park	Negligible (Not Significant)
St Helens RSH5: Lyme and Wood Pit	Negligible (Not Significant)
Warrington 2B: Holcroft and Glazebrook Moss	Negligible (Not Significant)

10.132 The landscape character of the Main Site and its immediate setting would be affected to the greatest degree within the host character areas: AM4 LCA; LCA 1A; and LCA 6A. In addition, LCA 1C, which is located directly to the east, south and south-west of the Proposed Development, would be subject to a significant effect during construction. The primary impacts which would cause these adverse effects would be:

- site clearance operations and earthworks;
- construction of the rail infrastructure; and
- construction of the buildings.

10.133 These aspects of the Proposed Development would vary perceptions of activity and movement in the landscape locally within the Study Area due to the presence and motion of plant and equipment and associated noise which would be more intensive than is currently experienced as a result of agricultural practices on the Site.

10.134 With respect to the individual character areas:

- LCA AM4: Highfield Moss SSSI, the effect is assessed as Major Adverse due to the scale and visibility of construction activity within a large proportion of the character area. Direct works within LCA AM4 include: site preparation and earthworks; road realignment; and the construction of infrastructure including the rail terminal and warehouse buildings. These works would fundamentally alter the character of an area which consists of large-scale arable fields and introduce significant movement, noise, and visual intrusion over a ten-year period, resulting in a substantial change to the area's rural character.
- Similarly, in LCA 1A: Lowton Heath to Lately Common, construction would give rise to a Moderate to Major Adverse effect that would primarily affect a discreet area to the south of the Liverpool – Manchester railway. Construction activity would be confined to this southern part of the LCA, where change would be fundamental from open fields to intensive construction activity. However the construction of large-scale warehouses, the rail terminal and associated activity would also be locally prominent from the parts of LCA 1A to the north, indirectly altering character by alteration of views south and introducing more urban influences and activity to the existing rural setting.
- In LCA 6A: Highfield Moss SSSI, a small mossland character type which is also designated as a Site of Special Scientific Interest (SSSI), there would be no direct physical change due to protection measures. However, visible construction activity adjacent to the LCA would result in indirect changes to character and a Moderate to Major Adverse effect, primarily through a perceptible change in the context from open fields to a more enclosed situation and due to visual intrusion from machinery and plant operations.
- The screening provided by buildings within LCA SS1: Newton-le-Willows, and the relatively flat landform, reduces the likelihood of landscape change as the construction activity would only be glimpsed from a small number of locations. As a result, construction would not give rise to a significant effect on the character of this LCA, with

effects assessed as Negligible.

- In LCA 1C: Winwick, Culcheth, Glazebrook and Rixton, although no construction would occur directly within the LCA, its open and gently undulating topography would mean that indirect changes to character would occur as a result of the visual influence of the construction activity and emerging physical structures. Construction would give rise to a Moderate to Major Adverse effect, through the influence of large-scale construction works and the accompanying noise and activity. Effects would be most acute at the western edge of the LCA and diminish with distance moving eastwards.

10.135 Whilst this is a large-scale development which would fundamentally change character within and adjacent to the Site, its visual envelope would be relatively contained, avoiding influence on character beyond approximately 2km radius from the Main Site. It is therefore the case that the change to landscape character due to the Proposed Development would remain relatively localised, avoiding the potential for wider influence on landscapes further from the site and beyond the adjacent urban areas.

10.136 The presence of construction plant & machinery, earthworks, stockpiles of materials, hoardings, construction compounds and construction lighting, in addition to the removal of a small amount existing vegetation would have effects ranging from Moderate to Major to Major Adverse (Significant) effect on the host and immediately neighbouring LCAs during construction. Despite the generally flat open nature of the landscape and the large-scale of the construction activity associated with the Proposed Development, its influence would be contained by the presence of built form, minor landform undulations and intermittent tree and hedgerow cover.

Construction Phase Visual Assessment: Main Site and Western Rail Chord

Visual Effects at Viewpoints

10.137 The detailed assessment of construction phase effects on representative viewpoints is set out in PEIR Appendix 10.4. Referring to Appendix 10.4, the visual effects during construction, on each of the representative viewpoints which have been scoped into the assessment, are stated in Table 10.7 subsequently and those receptors which have been identified as being subject to a significant visual effect during construction are shaded grey.

Table 10.7 Representative viewpoints baseline summary

Viewpoint reference	Location	Level of Effect and Significance
1	Track close to the Huskisson Memorial Located within the boundary of St Helens Borough Council	Moderate to Major Adverse (Significant)

Viewpoint reference	Location	Level of Effect and Significance
2	Footpath beside Highfield Moss SSSI Located within the boundary of St Helens Borough Council	Major Adverse (Significant)
3	Footpath close to Kenyon Hall Farm Located within the boundary of Wigan Council	Moderate to Major Adverse (Significant)
4	Croft Located within the boundary of Warrington Borough Council	Moderate to Major Adverse (Significant)
5	Winwick Interchange Located within the boundary of Warrington Borough Council	Minor to Moderate Adverse (Not Significant)
6	Golborne Road, Winwick Located within the boundary of Warrington Borough Council	Moderate Adverse (Not Significant)
7	Newton Road (West) Located within the boundary of Wigan Council	Moderate to Major Adverse (Significant)
8	Newton Road (East) Located within the boundary of Wigan Council	Major Adverse (Significant)
9	Kenyon Located within the boundary of Warrington Borough Council	Moderate to Major Adverse (Significant)

Viewpoint reference	Location	Level of Effect and Significance
10	Culcheth Heights Located within the boundary of Warrington Borough Council	Minor Adverse (Not Significant)
11	Path beside M62 Located within the boundary of Warrington Borough Council	Minor Adverse (Not Significant)
12	Burtonwood Located within the boundary of Warrington Borough Council	Minor Adverse (Not Significant)
13	Skylark Hill, Haydock Located within the boundary of St Helens Borough Council	Negligible (Not Significant)
14	Golborne Located within the boundary of Wigan Council	Minor Adverse (Not Significant)
15	A49, Mill Lane Railway Bridge, Newton-Le-Willows Located within the boundary of St Helens Borough Council	Minor to Moderate Adverse (Not Significant)
16	Newton-Le-Willows station Located within the boundary of St Helens Borough Council	No Change
17	Footpath connecting Willow Park, Newton-Le-Willows with Castle Hill Located within the boundary of St Helens	Negligible (Not Significant)

Viewpoint reference	Location	Level of Effect and Significance
	Borough Council	
18	Parkside Road at The Mosslands Located within the boundary of St Helens Borough Council	Major Adverse (Significant)
19	Highfield Farm footpath Located within the boundary of Wigan Council	Major Adverse (Significant)
20	Highfield Moss SSSI Footpath Located within the boundary of Wigan Council	Major Adverse (Significant)
21	Morris Farm Located within the boundary of Warrington Borough Council	Major Adverse (Significant)
22	Little Town Footpath Located within the boundary of Warrington Borough Council	Moderate to Major Adverse (Significant)
23	Footpath Leading to Southworth Hall Farm Located within the boundary of Warrington Borough Council	Moderate Adverse (Not Significant)
24	Hermitage Green Footpath Located within the boundary of Warrington Borough Council	Moderate to Major Adverse (Significant)
25	Vulcan Park Way Located within the boundary of St Helens Borough Council	No Change

Viewpoint reference	Location	Level of Effect and Significance
26	Sankey Valley Trail, Public Right of Way Located within the boundary of Warrington Borough Council	Minor Adverse (Not Significant)
27	Kenyon Footpath	Moderate to Major Adverse (Significant)
28	Moss Lane Footpath	Major Adverse (Significant)
29	Footpath to the south of New Lane End	Moderate to Major Adverse (Significant)
30	Rock House, Sandy Brow Lane	Moderate to Major Adverse (Significant)

10.138 Of the 30 viewpoints, 17 have been assessed as likely experiencing significant visual effects during construction. The largest construction effects on representative viewpoints would be associated with those locations in closest proximity to the Proposed Development, particularly residential receptors and users of footpaths, with the following significant visual effects noted:

- Viewpoints 7 and 8 are representative of views from residential receptors located on Newton Road to the north of the Main Site. These viewpoints are assessed as being subject to significant visual effects given their clear views south towards construction activity.
- Viewpoints 2, 19, 20 and 28 are representative of views from users of PRow located directly to the north of the Main Site, including on the edge of Highfield Moss SSSI (Viewpoint 20). These viewpoints are assessed as being subject to significant visual effects given their clear views south towards construction activity.
- Viewpoint 18 is representative of residential receptors close to the north-western

extent of the Main Site, on Parkside Road. Viewpoint 18 is assessed as being subject to a significant visual effect given the clear views east and south-east towards construction activity.

- Viewpoints 3 and 5 are representative of views from residential receptors, mainly comprising individual properties, located beside Winwick Lane, directly to the east of the Main Site. Viewpoint 3 is assessed as being subject to a significant visual effect given the clear views west towards construction activity.
- Viewpoints 4, 9, 21, 27, 29 and 30 are representative of views from residential receptors, included some individual properties, and users of PRow located on Newton Road to the east of the Main Site, in the vicinity of Croft, New Lane End and Kenyon. These viewpoints are assessed as being subject to significant visual effects given their clear views south towards construction activity.
- Viewpoints 6 and 24 represent views from residential receptors located close to the northern edge of Winwick, just south-west of the M6 motorway and the south-western boundary of the Main Site. Viewpoint 24 is assessed as being subject to a significant visual effect given the clear views south towards construction activity, albeit lower level activity would be screened by minor landform undulations and tree cover in the intervening landscape.

10.139 Viewpoints 10, 11, 12, 13 and 14 represent longer range views within the 5km study area and whilst potential glimpses of the higher level construction activity, such as crane usage, may be evident from these viewpoints, there would be screening of lower level activity and therefore visual effects during construction would not be significant.

Visual Effects on Receptors

10.140 The effects on visual receptors within the study area are reported in PEIR Appendix 10.4 (Effects at Viewpoints) and PEIR Appendix 5.5 (Effects on Visual Receptors), based on the detailed assessment of visual effects on the 30 representative viewpoints, as summarised in the previous section. The following provides a general overview of the effects during construction on each receptor type based on the detailed appendices:

Visual Effects on People in Residential Properties

10.141 Despite the relatively high number of residential properties within the 5km study area, a relatively small number of residential receptors have been identified as experiencing significant visual effects during construction. All residential receptors identified as experiencing significant visual effects during construction are either individual properties or small groups of properties which are located in relatively close proximity to the Order Limits Boundary. No significant visual effects have been identified outside a radius of 2km from the Main Site.

10.142 The residential receptors that would be subject to a significant visual effect during construction are as follows:

- R1: Hilbre, Hillcrest, Hollow Dene on Winwick Lane, directly to the east of the Main Site;

- R2: Sherbrooke on Winwick Lane, directly to the east of the Main Site;
- R3: Oven Back Farm on Winwick Lane, directly to the east of the Main Site;
- R4: Oven Back Cottage on Winwick Lane, directly to the east of the Main Site;
- R6: Morris's Farm and adjacent bungalow on Winwick Lane, directly to the east of the Main Site;
- R10: 345 Newton Road, close to the northern boundary of the Main Site;
- R11: 356-368 Newton Road, close to the northern boundary of the Main Site;
- R12: 367-383 Newton Road, close to the northern boundary of the Main Site;
- R13: The Old Stables, Newton Road, close to the northern boundary of the Main Site;
- R14: Highfield Farm, Highfield Lane, close to the northern boundary of the Main Site;
- R16: 430-450 Newton Road, close to the northern boundary of the Main Site;
- R17: 455-473 Newton Road, close to the northern boundary of the Main Site;
- R18: Banks Farm, 473 Newton Road, close to the northern boundary of the Main Site;
- R20: 524-562 Newton Road, close to the northern boundary of the Main Site;
- R25: Woodhead Farm, Sycamore Lodge, close to the western boundary of the Main Site;
- R32: 52 Smithy Brow, 1.4km south-east of the southern boundary of the Main Site;
- R34: 2-32 Smithy Brow, 1.6km south-east of the southern boundary of the Main Site;
- R35: 11-21 Heath Lane, Orchard Court, 1.7km south-east of the southern boundary of the Main Site;
- R36: 29 Heath Lane, 1.6km east of the eastern boundary of the Main Site;
- R37: 43-45 Heath Lane, 1.5km east of the eastern boundary of the Main Site;
- R38: 44 Heath Lane and 64-70 Heath Lane, 1.5km east of the eastern boundary of the Main Site;
- R40: New Lane End, 1km east of the eastern boundary of the Main Site;
- R42: 108-112 Kenyon Lane, 0.8km east of eastern boundary of the Main Site;
- R43: Main Lane Kenyon, 0.7km east of eastern boundary of the Main Site;
- R45: Johnsons Farm and properties adjacent on Kenyon Lane, 0.6km north-east of

north-eastern boundary of the Main Site; and

- R47: The Orchard and adjacent properties, Parkside Road, close to the northern boundary of the Main Site.

Visual Effects on Users of Public Rights of Way

10.143 The rights of way receptors that would be subject to a significant visual effect during construction are as follows:

- P1: Wigan 006/85/10, P2: Wigan 006/86/10, P3: Wigan 006/87/10, P4: Wigan 006/92/10, P5: Wigan 006/97/10, P6: Wigan 006/98/10, P7: Wigan 006/95/10, P8: Wigan 006/88/10, P9: Wigan 006/90/10; P10: Wigan 006/91/10; P12: Wigan 006/93/10; and P13: Wigan 006/99/10, all of which are located adjacent to the northern boundary of the Main Site;
- P14: Warrington 00097/100/1, located close to the east of the eastern boundary of the Main Site;
- P15: Warrington 00097/103/1, located 0.6km to the east of the eastern boundary of the Main Site;
- P16: Warrington 00097/4/1, located 0.8km to the east of the eastern boundary of the Main Site;
- P25: Warrington 00097/102/1, located 0.6km to the east of the eastern boundary of the Main Site;
- P26: Warrington 00097/106/1, located 1.3km to the east of the eastern boundary of the Main Site;
- P27: Warrington 00097/106/1, located 0.9km to the east of the eastern boundary of the Main Site; and
- P31: Warrington 00097/24/2, located 1.2km to the east of eastern boundary of the Main Site.

10.144 Similar to the assessment of effects on residential receptors, all right of way receptors identified as likely experiencing significant visual effects due to the construction of the Proposed Development are located in close proximity to the DCO Site. There are a relatively high number of rights of way identified as being subject to significant visual effects during construction as there is a relatively dense network of rights of way within the Study Area which traditionally provided connections between farm, villages and former colliery sites.

Visual Effects on Users of Community Facilities

10.145 No community receptors have been identified as experiencing a significant visual effect during the temporary construction works.

People Using Roads

10.146 No road receptors have been identified as experiencing a significant visual effect during the temporary construction works.

People at Employment Sites

10.147 No receptors at their place of work have been identified as experiencing a significant visual effect during the temporary construction works.

Operational Phase Landscape Effects: Main Site and Western Rail Chord

10.148 The following section considers the landscape and visual effects of the Proposed Development during operation. As is defined in the methodology, the operational assessment is in two stages: in the year of opening (Year 0); and fifteen years following opening (Year 15). As was also stated in the methodology, the assessment of visual effects has adopted a worst-case approach with regards seasonal change throughout the year, with a worst-case of winter effects assumed throughout.

Landscape Assessment

Effects on Landscape Elements

10.149 At Year 0 of operation the following would be evident with respect to landscape elements:

- There would be minimal loss of vegetation due to the Proposed Development. The main areas of vegetation loss would be: A hedgerow along Winwick Lane; a small area of trees, no greater than 1 ha in size, located towards the north-eastern extent of the Main Site; a belt of trees which crossed into the western extent of the Main Site, just to the west of Parkside Road; within the Western Rail spur, which comprises part of the former Parkside Colliery, where there is a reasonable level of (likely self-seeded) tree cover.
- Earthworks to create: flat development platforms upon which the proposed warehouses would be located; cutting for the rail corridor, between the Western Rail Chord and the rail freight terminal; and earth bunds, most notably a bund along the eastern boundary of the Main Site, along Winwick Lane, which would be 3m above proposed levels on the Main Site. Whilst this would create localised changes, overall the Main Site will remain broadly flat.
- Extensive tree, hedgerow and shrub planting throughout the site, as set out in the previous 'Embedded Mitigation Measures' section of this chapter and the Illustrative Landscape Masterplan (PEIR Figure 3.4).

10.150 As stated in the baseline and construction assessment sections, this is largely a flat arable landscape which has a low level of tree and hedgerow cover. Whilst the Proposed Development would involve some vegetation loss, as was set out in the construction assessment, in the context of the large-scale of the Main Site, this would be relatively limited.

10.151 At year 15 of operation the establishment of woodland, scrub, grassland, individual trees and hedgerows that are proposed as part of the Proposed Development would be making a notable contribution to local landscape character, both through the reinforcement and

reinstatement of existing character elements and through the creation of new areas of landscape, such as in the corridor running parallel to Winwick Lane. In combination with proposed access improvements this provision of landscape elements will contribute to a landscape surrounding the Proposed Development which achieves a greater degree of functionality for the benefit of local communities than currently exists, enabling improved and better connected access to the countryside. Whilst these measures would not fully screen the Proposed Development within the landscape character context, given their large scale and extent, it is considered that there would be an overall long-term enhancement in the landscape elements around the Main Site.

Effects on Landscape Character

10.152 The detailed assessment of operational effects on landscape character is set out in PEIR Appendix 10.3. Referring to Appendix 10.3, the landscape effects during construction, on each of the character areas which have been scoped into the assessment, are stated in Table 10.8 subsequently.

Table 10.8 Operational effects on landscape character areas

LCA Reference	Level of Effect and Significance
Host LCAs	
St Helens AM4: Highfield Moss SSSI	Year 0: Major Adverse (Significant) Year 15: Major Adverse (Significant)
Wigan 1A: Lowton Heath to Lately Common	Year 0: Moderate to Major Adverse (Significant) Year 15: Moderate Adverse (Not Significant)
Wigan 6A: Highfield Moss SSSI	Year 0: Moderate to Major Adverse (Significant) Year 15: Moderate to Major Adverse (Significant)
St Helens SS1: Newton-le-Willows	Year 0: Negligible (Not Significant) Year 15: Negligible (Not Significant)
Other LCAs	
Warrington 1C: Winwick, Culcheth,	Year 0: Moderate to Major Adverse

LCA Reference	Level of Effect and Significance
Glazebrook and Rixton	(Significant) Year 15: Moderate Adverse (Not Significant)
St Helens WFE2: Haydock Park	Year 0: Negligible (Not Significant) Year 15: Negligible (Not Significant)
St Helens RSH5: Lyme and Wood Pit	Year 0: Negligible (Not Significant) Year 15: Negligible (Not Significant)
Warrington 2B: Holcroft and Glazebrook Moss	Year 0: Negligible (Not Significant) Year 15: Negligible (Not Significant)

10.153 Effects on landscape character during the operational phase would be significant but relatively localised. There would be direct effects on the two 'host' character areas, St Helens AM4 and Wigan 1A, as a result of the profound and permanent change that will result from introducing large scale infrastructure and buildings. It should be noted that the effects extend to the two character areas by virtue of the site being located at the boundary of two local authority areas and the landscape thus being covered by two separate landscape character assessments, and site surveys identified that the part of 1A which falls within the Main Site associates with AM4 in many respects. Indirect effects would extend to adjacent areas of landscape character by virtue of the introduction of the influence that large built form would have on those areas.

10.154 Indirect effects would be experienced within Wigan LCA 6A (Highfield Moss SSSI) which would become flanked by development to its south-western and south-eastern sides; by the part of Wigan LCA 1A to the north of the Liverpool – Manchester railway line into which tall development components would be added into the southern backdrop; and the western part of Warrington LCA 1C, from which views to the west would now include tall built forms on the horizon. These indirect effects would be mitigated to varying degrees. With regards Wigan LCA 6A, effects would be reduced by the inclusion of a buffer zone around it within which there would be mounding and planting, however the proposed mitigation here would ameliorate and soften rather than screen views such that the influence of large buildings on the skyline of 6A would be permanent. From Wigan LCA 1A and Warrington LCA 1C, proposals on land remote from the Main Site to introduce woodland belts and hedgerows are such that the indirect effects on character will diminish over time. With regards LCA 1A, the landscape effect at Year 15 would be Moderate Adverse and Not Significant. Whilst the southern extent of 1A would fundamentally change in character, i.e. the part of 1A which falls within the Main

Site, change would be limited on the majority of 1A due to the effectiveness of woodland planting to the north of the Liverpool-Manchester railway line. Similarly, with regards LCA 1C, the landscape effect at Year 15 would be Moderate Adverse and Not Significant. Linear belts of woodland planting would enhance the LCA in compliance with the recommendations of the published character description, and limit influence of the Proposed Development on LCA 1C, thereby reducing the long-term landscape effect.

10.155 There are differences in the existing character of local character areas, mainly between the landcover of the mosslands (6A) and the arable fields (AM4, 1C and the part of 1A which falls within the Main Site), however the broad similarities are in the openness, the wider containment by built form within adjacent character areas and the localised, direct influence of major infrastructure, i.e. the Liverpool-Manchester railway line, the M6, the M62 and lines of pylons, all of which cut across the open landscape. With reference to Figure 10.3.2, which illustrates the location of local character areas, and Figure 10.4.1, which illustrates the ZTV of proposed warehouse buildings, it is evident that the influence of the Proposed Development on landscape character would be primarily contained within the more open, flat landscape which is bound by built form, minor landform undulations and intermittent tree and hedgerow cover. Whilst this a large-scale development which would fundamentally change character within and adjacent to the Site, the visual envelope would be relatively contained, avoiding influence on character beyond an approximate 2km radius from the Main Site. The change to landscape character due to the Proposed Development will remain relatively localised, avoiding the potential for much wider influence on and beyond the adjacent urban areas.

Operational Phase Visual Effects: Main Site and Western Rail Chord

Visual Effects on Representative Viewpoints

10.156 The detailed assessment of operational phase effects on representative viewpoints is set out in PEIR Appendix 10.4. Referring to Appendix 10.4, the visual effects during construction, on each of the representative viewpoints which have been scoped into the assessment, are stated in Table 10.9 subsequently and those receptors which have been identified as being subject to a significant visual effect during both Year 0 and Year 15 of operational are shaded grey (with a lighter shade of grey when effects are significant at Year 0 but not at Year 15).

Table 10.9 Effects on representative viewpoints during operational

Viewpoint reference	Location	Level of Effect and Significance
1	Track close to the Huskisson Memorial Located within the boundary of St Helens Borough Council	Year 0: Moderate to Major Adverse (Significant) Year 15: Moderate to Major Adverse (Significant)

Viewpoint reference	Location	Level of Effect and Significance
2	Footpath beside Highfield Moss SSSI Located within the boundary of St Helens Borough Council	Year 0: Major Adverse (Significant) Year 15: Major Adverse (Significant)
3	Footpath close to Kenyon Hall Farm Located within the boundary of Wigan Council	Year 0: Moderate to Major Adverse (Significant) Year 15: Moderate Adverse (Not Significant)
4	Croft Located within the boundary of Warrington Borough Council	Year 0: Moderate to Major Adverse (Significant) Year 15: Minor Adverse (Not Significant)
5	Winwick Interchange Located within the boundary of Warrington Borough Council	Year 0: Moderate Adverse (Not Significant) Year 15: Minor to Moderate Adverse (Not Significant)
6	Golborne Road, Winwick Located within the boundary of Warrington Borough Council	Year 0: Moderate Adverse (Not Significant) Year 15: Moderate Adverse (Not Significant)
7	Newton Road (West) Located within the boundary of Wigan Council	Year 0: Moderate to Major Adverse (Significant) Year 15: Minor to Moderate Adverse (Not Significant)
8	Newton Road (East) Located within the boundary of Wigan Council	Year 0: Major Adverse (Significant) Year 15: Minor to Moderate

Viewpoint reference	Location	Level of Effect and Significance
		Adverse (Not Significant)
9	Kenyon Located within the boundary of Warrington Borough Council	Year 0: Moderate to Major Adverse (Significant) Year 15: Minor Adverse (Not Significant)
10	Culcheth Heights Located within the boundary of Warrington Borough Council	Year 0: Minor Adverse (Not Significant) Year 15: Minor Adverse (Not Significant)
11	Path beside M62 Located within the boundary of Warrington Borough Council	Year 0: Minor Adverse (Not Significant) Year 15: Minor Adverse (Not Significant)
12	Burtonwood Located within the boundary of Warrington Borough Council	Year 0: Minor Adverse (Not Significant) Year 15: Minor Adverse (Not Significant)
13	Skylark Hill, Haydock Located within the boundary of St Helens Borough Council	Year 0: Negligible (Not Significant) Year 15: Negligible (Not Significant)
14	Golborne Located within the boundary of Wigan Council	Year 0: Minor Adverse (Not Significant) Year 15: Minor Adverse (Not Significant)
15	A49, Mill Lane Railway Bridge, Newton-	Year 0: Minor to Moderate

Viewpoint reference	Location	Level of Effect and Significance
	Le-Willows Located within the boundary of St Helens Borough Council	Adverse (Not Significant) Year 15: Minor to Moderate (Not Significant)
16	Newton-Le-Willows station Located within the boundary of St Helens Borough Council	No Change
17	Footpath connecting Willow Park, Newton-Le-Willows with Castle Hill Located within the boundary of St Helens Borough Council	Year 0: Negligible (Not Significant) Year 15: Negligible (Not Significant)
18	Parkside Road at The Mosslands Located within the boundary of St Helens Borough Council	Year 0: Moderate to Major Adverse (Significant) Year 15: Minor (Not Significant)
19	Highfield Farm footpath Located within the boundary of Wigan Council	Year 0: Major Adverse (Significant) Year 15: Minor to Moderate Adverse (Not Significant)
20	Highfield Moss SSSI Footpath Located within the boundary of Wigan Council	Year 0: Major Adverse (Significant) Year 15: Major Adverse (Significant)
21	Morris Farm Located within the boundary of Warrington Borough Council	Year 0: Major Adverse (Significant) Year 15: Moderate (Not Significant)
22	Little Town Footpath	Year 0: Moderate to Major

Viewpoint reference	Location	Level of Effect and Significance
	Located within the boundary of Warrington Borough Council	Adverse (Significant) Year 15: Moderate Adverse (Not Significant)
23	Footpath Leading to Southworth Hall Farm Located within the boundary of Warrington Borough Council	Year 0: Moderate Adverse (Not Significant) Year 15: Moderate Adverse (Not Significant)
24	Hermitage Green Footpath Located within the boundary of Warrington Borough Council	Year 0: Moderate to Major Adverse (Significant) Year 15: Moderate to Major Adverse (Significant)
25	Vulcan Park Way Located within the boundary of St Helens Borough Council	No Change
26	Sankey Valley Trail, Public Right of Way Located within the boundary of Warrington Borough Council	Year 0: Minor Adverse (Not Significant) Year 15: Minor Adverse (Not Significant)
27	Kenyon Footpath	Year 0: Moderate to Major Adverse (Significant) Year 15: Minor to Moderate Adverse (Not Significant)
28	Moss Lane Footpath	Year 0: Major Adverse (Significant) Year 15: Moderate to Major Adverse (Significant)

Viewpoint reference	Location	Level of Effect and Significance
29	Footpath to the south of New Lane End	Year 0: Moderate to Major Adverse (Significant) Year 15: Moderate to Major Adverse (Significant)
30	Rock House, Sandy Brow Lane	Year 0: Moderate to Major Adverse (Significant) Year 15: Moderate to Major Adverse (Significant)

10.157 Of the 30 viewpoints, 18 have been assessed as likely experiencing significant visual effects at Year 0 and this reduces to 7 viewpoints at Year 15. The largest effects on representative viewpoints would be associated with those locations in closest proximity to the Proposed Development, particularly residential receptors and users of footpaths, with the following significant visual effects noted:

- Viewpoints 7 and 8 are representative of views from residential receptors located Newton Road to the north of the Main Site. These viewpoints are assessed as being subject to significant visual effects given their clear views south towards the Proposed Development. The effect assessed at Viewpoints 7 and 8 reduce to Minor to Moderate Adverse (Not Significant) at Year 15, following the establishment of proposed belts of woodland planting in fields located to the south of Newton Road.
- Viewpoints 2, 19, 20 and 28 are representative of views from users of PRow located directly to the north of the Main Site, including on the edge of Highfield Moss SSSI (Viewpoint 20). These viewpoints are assessed as being subject to significant visual effects at Year 0 given their clear views south towards the Proposed Development. Significant effects remain at Year 15 on Viewpoints 2 and 28, which reflects that, whilst proposed belts of woodland planting in the vicinity of this footpath network would reduce visual effects on users of these footpaths, as represented by Viewpoints 19 and 20, there would remain clear views of the Proposed Development from much of this footpath network. Mitigation planting in this area would reduce long-term visual effects on users of the footpaths and residents on Newton Road, however the Illustrative Landscape Masterplan has sought to achieve a balance in this area, between screening some views of the Proposed Development, whilst also retaining a sense of openness from much of the public right of way network.
- Viewpoint 18 is representative of residential receptors close to the north-western extent of the Main Site, on Parkside Road. Viewpoint 18 is assessed as being subject to a significant visual effect at Year 0 given the clear views east and south-east towards the Proposed Development. However, this reduces to being Not Significant at Year 15 due

to mitigation planting directly opposite the properties which would screen much of the Proposed Development, with slightly greater visibility during winter months when trees aren't in leaf.

- Viewpoint 3 is representative of views from residential receptors, mainly comprising individual properties, located beside Winwick Lane, directly to the east of the Main Site. Viewpoint 3 is assessed as being subject to a significant visual effect at Year 0 given the clear views west towards the Proposed Development. However, this reduces to being Not Significant at Year 15 due to mitigation planting within the eastern 'green corridor' beside Winwick Lane.
- Viewpoints 4, 9, 21, 23, 27, 29 and 30 are representative of views from residential receptors, included some individual properties, and users of PRow located to the east of the Main Site, in the vicinity of Croft, New Lane End and Kenyon. These viewpoints are assessed as being subject to significant visual effects at Year 0 given their clear views west towards the upper parts of the warehouses within the Proposed Development. However, extensive belts of trees and understorey planting proposed on fields boundaries to the east of the Main Site, would reduce visual effects throughout this area such that effects on Viewpoints 4, 9, 21, 23 and 27 have been assessed as Not Significant at Year 15, following the establishment of the planting.
- Viewpoints 6 and 24 represent views from residential receptors located close to the northern edge of Winwick, just south-west of the M6 motorway and the south-western boundary of the Main Site. Viewpoint 24 is assessed as being subject to a significant visual effect given the clear views south towards the Proposed Development, albeit lower level activity, such as truck movements, would be screened by minor landform undulations and tree cover in the intervening landscape.
- Viewpoints 10, 11, 12, 13 and 14 represent longer range views within the 5km study area and whilst potential glimpses of the top of proposed warehouse buildings may be evident from these viewpoints, there would be screening of lower level activity and visual effects during operational would not be significant.

10.158 Residually significant effects at Year 15 remain on the following viewpoints:

- Viewpoint 1, which represents a specific view from the track (not shown on the definitive map) close to the Huskisson Memorial.
- Viewpoint 2, which represents a specific view from a footpath beside Highfield Moss SSSI.
- Viewpoint 20, which represents a specific view from a footpath beside Highfield Moss SSSI.
- Viewpoint 24, which represents a specific view from a footpath beside Hermitage Green.
- Viewpoint 28, which represents a specific view from Moss Lane.

- Viewpoint 29, which represents a specific view from a footpath to the south of New Lane End.
- Viewpoint 30, which represents a specific view from beside Rock House, Sandy Brow Lane.

10.159 These viewpoints represent specific views and not the whole residential area or the entire right of way upon which they are located. Overall, they represent residual significant effects from residential receptors and PRow which are located in very close proximity to the Main Site.

Visual Effects on Receptors

10.160 The effects on visual receptors within the study area are reported in PEIR Appendix 10.4 and PEIR Appendix 10.5, based on the detailed assessment of visual effects on the 30 representative viewpoints, as summarised in the previous section.

10.161 In relation to the assessment of operational visual effects at Year 0, it is of note that, whilst the Proposed Development would require some localised change to the underlying landform, and the removal of a relatively small extent of tree cover, the majority of visual effects at Year 0 would arise due to the introduction of new elements, i.e. buildings, rail infrastructure and associated elements, such as train and truck movements.

10.162 The following provides a general overview of the effects on each receptor type based on the detailed appendices (PEIR Volume 2 Appendix 5-4 and Appendix 5-5).

Visual Effects on People in Residential Properties

10.163 Despite the relatively high number of residential properties within the 5km study area, a relatively low number of residential receptors have been identified as experiencing significant visual effects during the opening year of operational (Year 0). All residential receptors identified as experiencing significant visual effects at the opening year are either individual properties or small groups of properties which are located in relatively close proximity to the Order Limits Boundary. No significant visual effects have been identified outside a radius of 2km from the Main Site.

10.164 The residential receptors that would be subject to a significant visual effect at Year 0 during operational are as follows:

- R1: Hilbre, Hillcrest, Hollow Dene on Winwick Lane, directly to the east of the Main Site;
- R2: Sherbrooke on Winwick Lane, directly to the east of the Main Site;
- R3: Oven Back Farm on Winwick Lane, directly to the east of the Main Site;
- R4: Oven Back Cottage on Winwick Lane, directly to the east of the Main Site;
- R6: Morris's Farm and adjacent bungalow on Winwick Lane, directly to the east of the Main Site;

- R10: 345 Newton Road, close to the northern boundary of the Main Site;
- R11: 356-368 Newton Road, close to the northern boundary of the Main Site;
- R12: 367-383 Newton Road, close to the northern boundary of the Main Site;
- R13: The Old Stables, Newton Road, close to the northern boundary of the Main Site;
- R14: Highfield Farm, Highfield Lane, close to the northern boundary of the Main Site;
- R16: 430-450 Newton Road, close to the northern boundary of the Main Site;
- R17: 455-473 Newton Road, close to the northern boundary of the Main Site;
- R18: Banks Farm, 473 Newton Road, close to the northern boundary of the Main Site;
- R20: 524-562 Newton Road, close to the northern boundary of the Main Site;
- R25: Woodhead Farm, Sycamore Lodge, close to the western boundary of the Main Site;
- R32: 52 Smithy Brow, 1.4km south-east of the southern boundary of the Main Site;
- R34: 2-32 Smithy Brow, 1.6km south-east of the southern boundary of the Main Site;
- R35: 11-21 Heath Lane, Orchard Court, 1.7km south-east of the southern boundary of the Main Site;
- R36: 29 Heath Lane, 1.6km east of the eastern boundary of the Main Site;
- R37: 43-45 Heath Lane, 1.5km east of the eastern boundary of the Main Site;
- R38: 44 Heath Lane and 64-70 Heath Lane, 1.5km east of the eastern boundary of the Main Site;
- R40: New Lane End, 1km east of the eastern boundary of the Main Site;
- R42: 108-112 Kenyon Lane, 0.8km east of eastern boundary of the Main Site;
- R43: Main Lane Kenyon, 0.7km east of eastern boundary of the Main Site;
- R45: Johnsons Farm and properties adjacent on Kenyon Lane, 0.6km north-east of north-eastern boundary of the Main Site; and
- R47: The Orchard and adjacent properties, Parkside Road, close to the northern boundary of the Main Site.

10.165 These residential receptors are broadly spread throughout the Study Area and in all cases comprise individual properties, or small groups of properties, which are located in relatively close proximity to the Order Limits Boundary. Aside from properties on Newton Road, which is located just to the south of Golborne, no significant visual effects have been identified on

properties directly within the main settlements located throughout the Study Area, such as Newton-le-Willows, Golborne, Culcheth, Winwick or Warrington. The main areas in which significant effects have been identified are:

- Properties, typically farmhouses, located on Winwick Lane directly to the east of the Main Site (R1, R2, R3, R4, R6);
- Properties located on, adjacent to, and just to the south of, Newton Road, within 1km to the north of the Main Site (R10, R11, R12, R13, , R14, R16, R17, R18, R20);
- Properties in the Hermitage Green area and north of Winwick, within 1km of the south-western extent of the Site (R25);
- Individual and small groups of properties located within 2km to the east of the Main Site on small lanes and local roads. This includes properties on the edge of small settlements such as Croft, New Lane End and Kenyon (R32, R34, R35, R36, R37, R38, R40, R42, R43);
- Properties on Kenyon Lane, Lane Head, within 1km to the north-east of the Main Site (R45); and
- Properties on Parkside Road, directly to the west of the Main Site in the Lowton area (R47).

10.166 At Year 15, the mitigation proposed, shown on the Illustrative Landscape Masterplan (PEIR Figure 3.4), would have established to a reasonable level of maturity such that the Proposed Development would be more suitably integrated into the view from the majority of visual receptors, including residential properties. The mitigation has been designed to enhance and strengthen the perimeter of the Main Site through the additional planting of native trees, which would assist in screening the proposed buildings, rail infrastructure and associated elements, such as vehicles on internal roads.

10.167 The establishment of mitigation would give rise to a reduction in the level of effect from visual receptors, with some residential receptors experiencing a reduction in the change such that the residual effect at Year 15 is Not Significant, despite being Significant at Year 0. The proposed mitigation, in particular bands of tree planting on the adjacent to the northern, eastern and western extents of the Main Site, would be effective in screening the proposed buildings and would integrate it into the view.

10.168 The residential receptors that would be subject to a residually significant visual effect at Year 15 during the operational phase, following the establishment of mitigation planting, are as follows:

- R1: Hilbre, Hillcrest, Hollow Dene on Winwick Lane, directly to the east of the Main Site;
- R2: Sherbrooke on Winwick Lane, directly to the east of the Main Site;
- R3: Oven Back Farm on Winwick Lane, directly to the east of the Main Site;

- R4: Oven Back Cottage on Winwick Lane, directly to the east of the Main Site;
- R25: Woodhead Farm, Sycamore Lodge, close to the western boundary of the Main Site; and
- R45: Johnsons Farm and properties adjacent on Kenyon Lane, 0.6km north-east of north-eastern boundary of the Main Site.

Visual Effects on Users of Public Rights of Way

10.169 The groups of rights of way receptors that would be subject to a significant visual effect during Year 0 of the operational phase are as follows:

- P1: Wigan 006/85/10, P2: Wigan 006/86/10, P3: Wigan 006/87/10, P4: Wigan 006/92/10, P5: Wigan 006/97/10, P6: Wigan 006/98/10, P7: Wigan 006/95/10, P8: Wigan 006/88/10, P9: Wigan 006/90/10; P10: Wigan 006/91/10, P12: Wigan 006/93/10 and P13: Wigan 006/99/10, all of which are located adjacent to the northern boundary of the Main Site;
- P14: Warrington 00097/100/1, located close to the east of the eastern boundary of the Main Site;
- P15: Warrington 00097/103/1, located 0.6km to the east of the eastern boundary of the Main Site;
- P16: Warrington 00097/4/1, located 0.8km to the east of the eastern boundary of the Main Site;
- P18: Warrington 00322/1n/1, located 0.3km west of western boundary of the Main Site;
- P25: Warrington 00097/102/1, located 0.6km to the east of the eastern boundary of the Main Site;
- P26: Warrington 00097/106/1, located 1.3km to the east of the eastern boundary of the Main Site;
- P27: Warrington 00097/105/1, located 0.9km to the east of the eastern boundary of the Main Site; and
- P31: Warrington 00097/24/2, located 1.2km to the east of eastern boundary of the Main Site.

10.170 Similar to the assessment of effects on residential receptors, all right of way receptors identified as likely experiencing significant visual effects at Year 0 of the Proposed Development are located in close proximity to the DCO Site. There are a relatively high number of rights of way identified as being subject to significant visual effects during construction as there is a relatively dense network of rights of way within the Study Area which traditionally provided connections between farm, villages and former colliery sites.

10.171 The visual enclosure provided by built form within the wider study area, specifically within Newton-le-Willows, Golborne, Leigh, Culcheth, Warrington and Winwick, would limit views from footpaths within the wider area.

10.172 At Year 15, the mitigation proposed, shown on the Illustrative Landscape Masterplan (PEIR Figure 3.4), would have established to a reasonable level of maturity such that the Proposed Development would be more suitably integrated into the view from the majority of visual receptors, including rights of way users. With regards the design of the Illustrative Landscape Masterplan, careful consideration has been given to potential views of the Proposed Development from rights of way located in close proximity to the Order Limits Boundary.

10.173 Some significant visual effects on users of rights of way within the Study Area would remain at Year 15, following the establishment of mitigation. Whilst the Illustrative Landscape Masterplan illustrates the proposed enhancements in the level of planting on the site, including tree and hedgerow planting, there would be a residual change to the level of openness in views, particularly from rights of way directly adjacent to the Main Site, and as such some significant visual effects would remain. However, in many cases the level of effect reduces to being Not Significant at Year 15 as the mitigation planting would have established and would integrate the Proposed Development into the view, or screen it entirely, which is illustrated by the reduction in effects identified on PRoW receptors.

10.174 The following are rights of way receptors which have been identified as experiencing a residually significant visual effect at Year 15:

- P4: Wigan 006/92/10, P5: Wigan 006/97/10, P6: Wigan 006/98/10, P7: Wigan 006/95/10, P8: Wigan 006/88/10, P9: Wigan 006/90/10, P10: Wigan 006/91/10, P12: Wigan 006/93/10 and P13: Wigan 006/99/10, all of which are located adjacent to the northern boundary of the Main Site;
- P14: Warrington 00097/100/1, located close to the east of eastern boundary of the Main Site;
- P16: Warrington 00097/4/1, located 0.8km to the east of eastern boundary of the Main Site; and
- P18: Warrington 00322/1n/1, located 0.3km west of western boundary of the Main Site;

10.175 In each of these cases, a residually significant effect remains at Year 15 due to the visual influence of the proposed warehouse buildings and rail terminal infrastructure, which would alter views. The most notable reduction in the level of effect on footpaths would be within the area to the north of the Proposed Development, where proposed belts of planting would screen some close-range views of the Proposed Development. However, the aim of the mitigation planting in that location is not to entirely cover the area with woodland planting and, as such, there would remain views of the Proposed Development from more open areas, including from areas which are to form ecological mitigation areas and comprise more open areas of grassland habitat.

Users of Community Facilities

10.176 No community receptors have been identified as experiencing a significant visual effect during the operation of the Proposed Development.

People Using Roads

10.177 No road receptors have been identified as experiencing a significant visual effect during the operation of the Proposed Development.

People at Employment Sites

10.178 No receptors at their place of work have been identified as experiencing a significant visual effect during the operation of the Proposed Development.

PROPOSED ADDITIONAL MITIGATION MEASURES

Main Site and Western Rail Chord

10.179 The Proposed Development design has undergone a series of design iterations to embed mitigation measures into the design, as detailed in the earlier Embedded Mitigation Measures section of this chapter and, given that all mitigation is embedded in the Proposed Development design, no additional mitigation measures are proposed.

10.180 With regards monitoring of mitigation measures, an oCEMP and oLEMP have been prepared which include outline measures to protect retained vegetation. The monitoring requirements include an arboricultural survey to be conducted in line with BS5837:2012 pre-construction to consider trees that may be affected by construction.

10.181 The oLEMP would be approved prior to implementation in accordance with requirements of the DCO. The oLEMP includes a five-year establishment aftercare period during which landscape and ecological mitigation would be managed and monitored to ensure the successful establishment of the proposed planting. Additionally, a post-construction monitoring programme would require walkover surveys of the Order Limits Boundary at set intervals post construction.

10.182 No further monitoring is required.

RESIDUAL ENVIRONMENTAL EFFECTS

10.183 This section summarises the residual significant effects of the Proposed Development on landscape and visual receptors following the implementation of mitigation, i.e. long-term effects from Year 15 of operational of the Proposed Development. Significant residual effects are defined as those which are deemed to be Significant in EIA terms. This section applies to the Main Site, Western Rail Chord and remote Highway Works.

Residual Landscape Effects

10.184 As there are no mitigation measures proposed in addition to those which are embedded

within the Proposed Development design, including the Illustrative Landscape Masterplan (PEIR Figure 3.4), the residual landscape effects remain as reported in the previous section 'Potential Effects Prior to Additional Mitigation'. The residual construction effects are as reported, and the residual operational effects comprise the Year 15 assessment.

Residual Visual Effects

10.185 As there are no mitigation measures proposed in addition to those which are embedded within the Proposed Development design, including the Illustrative Landscape Masterplan (PEIR Figure 3.4), the residual visual effects remain as reported in Section 5.8. The residual construction effects are as reported, and the residual operational effects comprise the Year 15 assessment.

CUMULATIVE AND IN-COMBINATION EFFECTS

10.186 With consideration to Chapter 20: Cumulative, In-Combination and Transboundary Effects, there are fifteen developments within the Study Area which are considered to have potential to result in cumulative landscape and visual effects based on active planning applications and local plan allocations. These developments, and any others which arise prior to the DCO submission, will be assessed within the LVIA chapter of the ES.

IMPLICATIONS OF CLIMATE CHANGE

10.187 The PEIR should include a description and assessment (where relevant) of the likely significant effects the Proposed Development has on climate (for example having regard to the nature and magnitude of greenhouse gas emissions) and the vulnerability of the project to climate change. Where relevant, the PEIR should describe and assess the adaptive capacity that has been incorporated into the design of the Proposed Development. These considerations will be more relevant to some chapters (e.g. transport, air quality, flood risk, ecology and landscape) than others. The PEIR and ES will have a standalone chapter considering greenhouse gases and climate change, so this section should be focused specifically on the effects in relation to the thematic topic.

10.188 Whilst changes to the receiving environment may occur due to climate change, these are not anticipated to materially alter the sensitivity of landscape or visual receptors. However, the LVIA will include an assessment of climate change and the final Landscape Masterplan and LEMP will take climate change into consideration through the inclusion of planting which is resilient to climate change, including the potential use of drought tolerant species.

SUMMARY AND CONCLUSIONS

10.189 The LVIA chapter comprises a description of the existing environment and identification of the potential effects of the Proposed Development on landscape and visual receptors within the Study Area.

10.190 As is described in the Embedded Mitigation section of this chapter, the Proposed Development has been through an iterative design process from an early stage such that the final design of the Proposed Development, including the Illustrative Landscape Masterplan (PEIR Figure 3.4), includes embedded landscape and visual mitigation which would reduce landscape and visual effects. This includes:

- Provision of woodland belts on the western and eastern boundaries of the Site, screening lower level activity within the Proposed Development, such as truck movements. This includes the creation of a 'green corridor' on the eastern boundary of the Main Site where footpaths are set within a 50m wide corridor bounded by hedgerows and woodland blocks for visual screening, landscape integration and habitat connectivity purposes;
- Incorporation of earth bunds in key locations, such as on the eastern boundary of the Main Site, beside Winwick Lane, where bunds will be created that are up to 3m above proposed ground levels within the Main Site. The bunds will provide localised screening of lower level activity, such as truck movements on internal roads;
- Sensitive design of landscape treatment alongside public rights of way on the well-used network of routes within the area to the north of the Main Site;
- Creation of species-diverse grassland meadows, localised mounding, new footpath routes and scrub planting as a buffer between the Proposed Development and the boundary of Highfield Moss SSSI to provide ecological mitigation and to relieve recreational pressure within the moss;
- Improvements in the design of the built form within the Main Site, such as: reduction in the height of buildings from 35m at Scoping stage, to a maximum of 30m in this PEIR; adjustments to the layout of buildings on the western boundary of the Main Site, beside the M6, to enclose truck movements within the Main Site; adjustment in the layout of buildings, roads and parking on the eastern boundary of the Main Site, to ensure that a minimum of 50m is achieved in the 'green corridor' beside Winwick Lane....
- Inclusion of screen planting within the area of BNG mitigation to the north of the Liverpool-Manchester railway line. This responds to the visual change experienced by residents on Newton Lane in particular and will, in time, screen much of the Proposed Development given the proximity of the woodland belts to the receptors. This planting will also screen some views from the footpath network in this location, albeit the design has aimed to retain some openness in this location and the variety of habitats proposed as part of the BNG design requires that much of this area will comprise grassland and other open habitat types.
- Implementation of mitigation planting within LCA 1C, specifically the Soils Reuse Area, including new native woodland belts along field boundaries to the east of Winwick Lane and to the west of Croft, Lane End and Kenyon. This will strengthen the existing field pattern, enhance landscape character, and support biodiversity through the retention and reinforcement of hedgerows and the reintroduction of hedgerow trees. The proposals accord with the recommended Management and Landscape Objectives for

Area 1C, which emphasise the importance of better hedgerow management and encourage the careful extension of woodland to integrate development sensitively into the surrounding landscape.

- Provision of a continuous, high-quality recreational loop that enhances local connectivity by integrating new linkages with existing footpath networks. This principle supports health, wellbeing, and inclusive access to the countryside. It will also establish sustainable active travel links between local communities, emerging employment at ILPN, and key public transport nodes at the existing Newton-le-Willows Railway Station and the future Golborne rail station. Key elements include: a green corridor with segregated walking and cycling provision along Winwick Lane; access provision within a more open ecological buffer around Highfield Moss SSSI to manage recreational pressure and protect sensitive habitats within the Moss; provision of safer pedestrian crossings along the Liverpool-Manchester railway line via new and existing bridges at three points (Parkside Road, north-west of Highfield Moss SSSI and Winwick Lane); and high-specification active travel infrastructure along the Parkside Link Road.

10.191 These design considerations are taken into account in the assessment of both Year 0 and Year 15 landscape and visual effects. At Year 15 of the operational phase, the proposed planting embedded within the Proposed Development design would have reached a reasonable level of maturity such that it would further reduce the long-term effects of the Proposed Development on landscape and visual receptors through integration of the Proposed Development into the existing landscape and provision of screening.

10.192 There are no statutory or non-statutory designated landscapes within the Site and Study Area.

10.193 With regards direct change to landscape elements within the DCO Site, the Proposed Development would require earthworks to create cutting for the rail infrastructure to connect to the existing rail network and the creation of large-scale, flat development platforms, upon which the warehouses and rail terminal would be located. However, this would comprise relatively localised change which would be contained by the Proposed Development and, in the case of the Western Rail Chord, the proposed Parkside West development. With regards the removal of vegetation, despite the large-scale of the Proposed Development, there would be relatively little vegetation removal, due mainly to the baseline comprising mainly open, arable fields which are largely devoid of hedgerow and tree cover.

10.194 During construction, the landscape character of the Main Site and its immediate setting would be affected to the greatest degree within the following local landscape character areas, which would be subject to significant effects: St Helens AM4: Highfield Moss SSSI; Wigan 1A: Lowton Heath to Lately Common; Wigan 6A: Highfield Moss SSSI; and Warrington 1C: Winwick, Culcheth, Glazebrook and Rixton.

10.195 With regards visual effects during construction, the assessment of visual effects on 30 representative viewpoints and consideration of visual receptors within the Study Area has identified that significant effects during construction would primarily be experienced by residents and footpath users. However, despite the relatively high number of residential properties within the 5km study area, a relatively small number of residential receptors have been identified as experiencing significant visual effects during construction. All residential

receptors identified as experiencing significant visual effects during construction are either individual properties or small groups of properties which are located in relatively close proximity to the Order Limits Boundary. No significant visual effects have been identified outside a radius of 2km from the Main Site.

- 10.196 The primary impacts which would cause adverse effects would be: site clearance operations and earthworks; construction of the rail infrastructure; and construction of the buildings. These aspects of the Proposed Development would vary perceptions of activity and movement in the landscape locally within the Study Area due to the movement and possible noise created by construction activity. However, perceived variations of activity and movement would be limited by the temporary nature of construction works.
- 10.197 During the operational phase, the effects on landscape character would be significant but relatively localised. The most pronounced effects would occur within the two host character areas: St Helens AM4 (Highfield Moss SSSI) and the part of Wigan 1A (Lowton Heath to Lately Common) that falls within the Main Site. In both cases, the introduction of large-scale infrastructure and buildings would result in a profound and permanent change to character.
- 10.198 Indirect effects would extend into adjacent character areas. Wigan 6A (Highfield Moss SSSI) would become flanked by development to its south-western and south-eastern sides, and the skyline of this mossland would be altered by the presence of tall built form. Proposed mounding and planting in various locations throughout the Order Limits would soften and ameliorate landscape change but would not remove the influence of large buildings, meaning the effect here would remain permanent. In the northern part of 1A and the western part of Warrington 1C (Winwick, Culcheth, Glazebrook and Rixton), tall built elements would feature in views, however the introduction of woodland belts and hedgerow planting on land remote from the Main Site would, over time, reduce the level of change. By Year 15, residual effects in these areas would be assessed as Moderate Adverse and Not Significant, with the new planting both limiting the influence of the Proposed Development and reinforcing the existing field pattern in line with published landscape objectives.
- 10.199 Although there are differences between the arable landscapes of AM4, 1A and 1C and the mossland of 6A, there are also common characteristics of localised openness, containment by nearby built form, and the existing influence of major infrastructure such as the M6, M62, Liverpool–Manchester railway and pylons. Within this context, the Proposed Development would introduce fundamental change at a local level, however its influence on landscape character would be contained within approximately 2 km of the Site, avoiding significant effects on the wider landscape beyond adjacent urban areas.
- 10.200 With regards effects on visual receptors during the operational phase, the assessment of 30 representative viewpoints and associated receptor groups has identified that significant visual effects at Year 0 (the opening year) would primarily be experienced by residential receptors and users of public rights of way located in close proximity to the Main Site. Out of the 30 viewpoints assessed, 18 would experience significant effects at Year 0. Despite the relatively high number of properties within the 5 km study area, the significant effects identified are limited to a small proportion of receptors, all of which are either individual properties or small clusters located close to the Main Site. No significant visual effects are identified beyond 2 km from the Main Site.

10.201 The receptors subject to significant effects at Year 0 include:

- properties on Winwick Lane directly to the east of the Main Site (R1, R2, R3, R4, R6);
- properties on and adjacent to Newton Road within 1 km to the north (R10, R11, R12, R13, R14, R16, R17, R18, R20);
- footpath users directly north of the Site, including those in the vicinity of Highfield Moss SSSI and south of Newton Road;
- properties in Hermitage Green and north of Winwick (R25);
- individual and small groups of properties and PRoW users to the east, on small lanes and roads in the vicinity of Croft, New Lane End and Kenyon (R32, R34, R35, R36, R37, R38, R40, R42, R43);
- properties on Kenyon Lane at Lane Head, north-east of the Main Site (R45); and
- properties on Parkside Road to the west, within the Lowton area (R47).

10.202 At Year 15, the proposed mitigation shown on the Illustrative Landscape Masterplan would have reached a level of maturity sufficient to reduce effects for the majority of receptors. Planting belts on the northern, eastern and western boundaries would strengthen the Site's perimeter and screen built form, rail infrastructure and vehicle movements, reducing visual intrusion and integrating the Proposed Development more effectively. Out of the 30 viewpoints, the number experiencing significant effects reduces to 7 by Year 15.

10.203 Residual significant effects remain concentrated among receptors in closest proximity, notably:

- properties on Winwick Lane (R1–R4), where proximity ensures continuing visibility;
- properties at Hermitage Green (R25) and Kenyon Lane (R45), where the large-scale warehouses would remain apparent on the skyline; and
- footpath users to the north of the Site in the vicinity of Highfield Moss SSSI, and a limited number of viewpoints to the east and south-east (including Moss Lane and New Lane End), where the openness of the landscape and ecological mitigation areas limit the potential for full screening.

10.204 Overall, the Proposed Development is large-scale in both floor area and height and would form a prominent and incongruous element on the local skyline. This would give rise to notable visual change for nearby receptors. However, the landscape scheme is effective in reducing the extent and severity of these effects over time, particularly for Newton Road and eastern receptor groups where belts of planting would establish between the Site and residential properties. The assessment concludes that, despite the scale of the Proposed Development, a relatively low number of significant residual effects are identified. Beyond 2 km, no significant effects are recorded, with the visual envelope contained by surrounding built form, occasional landform undulations and intermittent tree cover, such that only

glimpsed views would be possible from sporadic areas of higher ground..

10.205 In relation to policy relevant to this chapter, the Applicant has addressed the key requirements of the NPSNN and local landscape and visual related policies in St Helens, Wigan and Warrington authorities. The Proposed Development has embedded landscape considerations in the design process and would mitigate landscape and visual effects where possible, whilst delivering long-term landscape, biodiversity and recreational benefits.

10.206 At a national level, the Proposed Development addresses key NPSNN requirements for careful landscape integration, mitigation and enhancement. The design of the Proposed Development, including the Illustrative Landscape Masterplan (PEIR Figure 3.4), provides a clear response to the requirement to mitigate significant effects through considered siting of buildings, reduction in building heights, use of native planting, earth bunds and connected green corridors. These design interventions, alongside proposed enhancements to the PRoW network and habitat creation, are consistent with national policy requirements to minimise harm, respect landscape character and embed green infrastructure in the design.

10.207 At a local level, the Proposed Development aligns with the following key policies:

- St Helens policies LPA02, LPA08, LPC09 and LPC10, by conserving and enhancing landscape character, reinforcing green infrastructure, restoring field boundaries and integrating native woodland planting.
- Wigan policies CP2 and CP10, by inclusion of new walking and cycling infrastructure, sensitive building siting and landscape proposals which respect the borough's landscape identity.
- Warrington policies DC1 and DC6, as the design respects local character, delivers green infrastructure enhancements and contributes to visual quality in key corridors.
- Greater Manchester Places for Everyone Plan policies JP-G1, JP-G2 and JP-G7, which seek enhanced Green Infrastructure networks, strengthened landscape character and increased woodland cover.

10.208 Overall, this assessment concludes that the Proposed Development would result in some significant landscape and visual effects, including: fundamental change to landscape character within the Main Site and within an approximate 2km distance from the Main Site; and change to the views experienced by people in residential properties and users of public rights of way within an approximate 2km radius from the Main Site. However, proposed mitigation would further integrate the Proposed Development into the existing landscape and visual setting by year 15 of the operational phase, with less residual significant landscape and visual effects identified.

10.209 Further work which will be undertaken in advance of submission of the application for development consent includes:

- Photography at selected viewpoint locations during summer months, i.e. before the end of September 2025.

- Further refinement of the Landscape and Visual Assessment based on the further work identified here and consultation responses received.
- A summary of the potential for night-time visual effects due to lighting within the Proposed Development. This will be based on technical analysis within a separate Lighting Assessment, which will be produced by a Lighting Engineer on behalf of the Applicant.
- Further refinement of the outline Landscape and Ecological Management Plan (oLEMP) based on consultation responses received.

Table 10.10 Summary of effects

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Main Site and Western Rail Chord						
Construction Phase						
St Helens AM4: Highfield Moss SSSI	Low to Medium	Large	Major Adverse	N/A	Major Adverse	Significant
Wigan 1A: Lowton Heath to Lately Common	Low to Medium	Large	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Wigan 6A: Highfield Moss SSSI	Medium to High	Medium	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
St Helens SS1: Newton-le-Willows	Low	Negligible	Negligible	N/A	Negligible	Not Significant

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Warrington 1C: Winwick, Culcheth, Glazebrook and Rixton	Medium	Medium to Large	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
St Helens WFE2: Haydock Park	Medium	Negligible	Negligible	N/A	Negligible	Not Significant
St Helens RSH5: Lyme and Wood Pit	Low to Medium	Negligible	Negligible	N/A	Negligible	Not Significant
Warrington 2B: Holcroft and Glazebrook Moss	Low to Medium	Negligible	Negligible	N/A	Negligible	Not Significant
Viewpoint 1: Track close to the Huskisson Memorial	Medium	Large	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Viewpoint 2: Footpath beside	Medium	Large	Major Adverse	N/A	Major Adverse	Significant

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Highfield Moss SSSI						
Viewpoint 3: Footpath close to Kenyon Hall Farm	Medium	Large	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Viewpoint 4: Croft	Medium to High	Medium to Large	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Viewpoint 5: Winwick Interchange	Low	Medium	Minor to Moderate Adverse	N/A	Minor to Moderate Adverse	Not Significant
Viewpoint 6: Golborne Road, Winwick	Low	Medium to Large	Moderate Adverse	N/A	Moderate Adverse	Not Significant
Viewpoint 7: Newton Road (West)	High	Medium to Large	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Viewpoint 8:	High	Large	Major Adverse	N/A	Major Adverse	Significant

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Newton Road (East)						
Viewpoint 9: Kenyon	Medium to High	Medium to Large	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Viewpoint 10: Culcheth Heights	Medium	Small	Minor Adverse	N/A	Minor Adverse	Not Significant
Viewpoint 11: Path beside M62	Medium	Small	Minor Adverse	N/A	Minor Adverse	Not Significant
Viewpoint 12: Skylark Hill, Haydock	Medium	Small	Minor Adverse	N/A	Minor Adverse	Not Significant
Viewpoint 13: Skylark Hill, Haydock	Medium	Negligible	Negligible	N/A	Negligible	Not Significant
Viewpoint 14: Golborne	Low	Small	Minor Adverse	N/A	Minor Adverse	Not Significant

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Viewpoint 15: A49, Mill Lane Railway Bridge, Newton-Le-Willows	Low	Medium	Minor to Moderate Adverse	N/A	Minor to Moderate Adverse	Not Significant
Viewpoint 16: Newton-Le-Willows station	Low	No Change	No Change	N/A	No Change	
Viewpoint 17: Footpath connecting Willow Park, Newton-Le-Willows with Castle Hill	Low to Medium	Negligible	Negligible	N/A	Negligible	Not Significant
Viewpoint 18: Parkside Road at The Mosslands	High	Large	Major Adverse	N/A	Major Adverse	Not Significant
Viewpoint 19: Highfield Farm	High	Large	Major Adverse	N/A	Major Adverse	Significant

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
footpath						
Viewpoint 20: Highfield Moss SSSI Footpath	Medium	Medium	Major Adverse	N/A	Major Adverse	Significant
Viewpoint 21: Morris Farm	High	Medium to Large	Major Adverse	N/A	Major Adverse	Significant
Viewpoint 22: Little Town Footpath	Medium to High	Medium	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Viewpoint 23: Footpath Leading to Southworth Hall Farm	Medium	Medium	Moderate to Major Adverse	N/A	Moderate Adverse	Not Significant
Viewpoint 24: Hermitage Green Footpath	Medium	Medium	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Viewpoint 25: Vulcan Park Way	High	No Change	No Change	N/A	No Change	Not Significant

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Viewpoint 26: Sankey Valley Trail, Public Right of Way	Medium	Small	Minor Adverse	N/A	Minor Adverse	Not Significant
Viewpoint 27: Kenyon Footpath	Medium to High	Medium	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Viewpoint 28: Moss Lane Footpath	Medium to High	Large	Major Adverse	N/A	Major Adverse	Significant
Viewpoint 29: Footpath to the south of New Lane End	Medium to High	Medium to Large	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Viewpoint 30: Rock House, Sandy Brow Lane	Medium	Medium to Large	Moderate to Major Adverse	N/A	Moderate to Major Adverse	Significant
Operational Phase						

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
St Helens AM4: Highfield Moss SSSI	Low to Medium	Large at Year 0 Large at Year 15	Major Adverse at Year 0	Mitigation planting proposed on the perimeter of the Main Site and beside the Western Rail Chord would have established by Year 15 and integrated the peripheral areas of the DCO Site into LCA AM4.	Major Adverse at Year 15	Significant at Year 0 Significant at Year 15
Wigan 1A: Lowton Heath to Lately Common	Low to Medium	Large at Year 0 Medium at Year 15	Moderate to Major Adverse at Year 0	Mitigation planting proposed on the perimeter of the Main Site, in particular within the area to the north of the Liverpool – Manchester railway line and along the eastern boundary of the Main Site beside Winwick Lane, would have established by Year 15 and integrated the peripheral areas of the DCO Site into LCA 1A.	Moderate Adverse at Year 15	Significant at Year 0 Not Significant at Year 15
Wigan 6A: Highfield Moss SSSI	Medium to High	Medium to Large at Year 0 Medium to Large at Year 15	Moderate to Major Adverse at Year 0	A substantial buffer would be created around 6A which would primarily comprise biodiversity mitigation.	Moderate to Major Adverse at Year 15	Significant at Year 0 Significant at Year 15

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
St Helens SS1: Newton-le-Willows	Low	Negligible at Year 0 Negligible at Year 15	Negligible at Year 0	No specific mitigation proposed in relation to this receptor.	Negligible at Year 15	Not Significant at Year 0 Not Significant at Year 15
Warrington 1C: Winwick, Culcheth, Glazebrook and Rixton	Medium	Medium to Large at Year 0 Medium at Year 15	Moderate to Major Adverse at Year 0	Mitigation planting proposed on the perimeter of the Main Site, in particular along the eastern boundary of the Main Site beside Winwick Lane, would have established by Year 15. In addition, mitigation planting has been proposed within LCA 1C on field boundaries to the east of Winwick Lane, and to the west of Croft, Lane End and Kenyon.	Moderate Adverse at Year 15	Significant at Year 0 Not Significant at Year 15
St Helens WFE2: Haydock Park	Medium	Negligible at Year 0 Negligible at Year 15	Negligible at Year 0	No specific mitigation proposed in relation to this receptor.	Negligible at Year 15	Not Significant at Year 0 Not Significant

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
						at Year 15
St Helens RSH5: Lyme and Wood Pit	Low to Medium	Negligible at Year 0 Negligible at Year 15	Negligible at Year 0	No specific mitigation proposed in relation to this receptor.	Negligible at Year 15	Not Significant at Year 0 Not Significant at Year 15
Warrington 2B: Holcroft and Glazebrook Moss	Low to Medium	Negligible at Year 0 Negligible at Year 15	Negligible at Year 0	No specific mitigation proposed in relation to this receptor.	Negligible at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 1: Track close to the Huskisson Memorial	Medium	Large at Year 0 Large at Year 15	Moderate to Major Adverse at Year 0	This track would become a footpath and provide a key connection into the wider footpath network within and adjacent to the Site, to the east. Functional fence treatment would be required for security and as such there would be limited space	Moderate to Major Adverse at Year 15	Significant at Year 0 Significant at Year 15

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
				for screen planting.		
Viewpoint 2: Footpath beside Highfield Moss SSSI	Medium	Large at Year 0 Large at Year 15	Major Adverse at Year 0	The area directly to the south of this viewpoint comprises a 'green corridor' which will primarily provide ecological mitigation, and specifically a protective buffer area to Highfield Moss SSSI. Whilst it will remain relatively open, some planting is proposed along the southern boundary of the buffer zone, which will provide partial screening of lower level activity within the rail freight terminal.	Major Adverse at Year 15	Significant at Year 0 Significant at Year 15
Viewpoint 3: Footpath close to Kenyon Hall Farm	Medium	Large at Year 0 Medium at Year 15	Moderate to Major Adverse at Year 0	This viewpoint location would partly benefit from the screening provided by tree planting located within the proposed publicly accessible corridor along Winwick Lane.	Moderate Adverse at Year 15	Significant at Year 0 Not Significant at Year 15
Viewpoint 4: Croft	Medium to High	Medium to Large at Year	Moderate to Major Adverse at Year 0	This viewpoint location would partly benefit from the screening	Minor Adverse at	Significant at Year 0

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
		0 Small at Year 15		provided by tree planting located within the proposed publicly accessible corridor along Winwick Lane. In relatively close proximity to the viewpoint, a linear belt of woodland and understorey planting is proposed to the west of Croft which would contribute to screening from the village and from this viewpoint.	Year 15	Not Significant at Year 15
Viewpoint 5: Winwick Interchange	Low	Medium at Year 0 Medium at Year 15	Minor to Moderate Adverse at Year 0	This viewpoint location would partly benefit from the screening provided by tree planting located within the proposed publicly accessible corridor along Winwick Lane.	Minor to Moderate Adverse at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 6: Golborne Road, Winwick	Low	Medium to Large at Year 0 Medium to Large at Year 15	Moderate Adverse at Year 0	This viewpoint location would benefit from the screening provided by tree planting located on the western boundary of the Main Site, adjacent to the M6.	Moderate Adverse at Year 15	Not Significant at Year 0 Not Significant at Year 15

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Viewpoint 7: Newton Road (West)	High	Medium to Large at Year 0 Small to Medium at Year 15	Moderate to Major Adverse at Year 0	Proposed woodland planting in fields located directly to the south of the Site would provide effective screening of the view of the Proposed Development.	Minor to Moderate Adverse	Significant at Year 0 Not Significant at Year 15
Viewpoint 8: Newton Road (East)	High	Large at Year 0 Small to Medium at Year 15	Major Adverse at Year 0	Proposed woodland planting in fields located directly to the south of the Site would provide effective screening of the view of the Proposed Development.	Minor to Moderate Adverse at Year 15	Significant at Year 0 Not Significant at Year 15
Viewpoint 9: Kenyon	Medium to High	Medium to Large at Year 0 Small at Year 15	Moderate to Major Adverse at Year 0	This viewpoint location would benefit from the screening provided by woodland and understorey planting located on field boundaries to the west of Kenyon which would contribute to screening from the village and from this viewpoint.	Minor Adverse at Year 15	Significant at Year 0 Not Significant at Year 15

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Viewpoint 10: Culcheth Heights	Medium	Small at Year 0 Small at Year 15	Minor Adverse at Year 0	No mitigation proposed for this view.	Minor Adverse at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 11: Path beside M62	Medium	Small at Year 0 Small at Year 15	Minor Adverse at Year 0	No mitigation proposed for this view.	Minor Adverse at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 12: Skylark Hill, Haydock	Medium	Small at Year 0 Small at Year 15	Minor Adverse at Year 0	No mitigation proposed for this view.	Minor Adverse at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 13: Skylark Hill,	Medium	Negligible at	Negligible at Year 0	No mitigation proposed for this	Negligible at	Not Significant

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Haydock		Year 0 Negligible at Year 15		view.	Year 15	at Year 0 Not Significant at Year 15
Viewpoint 14: Golborne	Low	Small at Year 0 Small at Year 15	Minor Adverse at Year 0	No mitigation proposed for this view.	Minor Adverse at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 15: A49, Mill Lane Railway Bridge, Newton-Le-Willows	Low	Medium at Year 0 Medium at Year 15	Minor to Moderate Adverse at Year 0	Narrow belt of tree and shrub planting between the West Coast Mainline and the proposed Western Rail Chord.	Minor to Moderate Adverse at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 16: Newton-Le-Willows station	Low	No Change at Year 0 No Change at	No Change at Year 0	No mitigation proposed for this view.	No Change at Year 15	Not Significant at Year 0

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
		Year 15				Not Significant at Year 15
Viewpoint 17: Footpath connecting Willow Park, Newton-Le-Willows with Castle Hill	Low to Medium	Negligible at Year 0 Negligible at Year 15	Negligible at Year 0	No mitigation proposed for this view.	Negligible at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 18: Parkside Road at The Mosslands	High	Large at Year 0 Small at Year 15	Moderate to Major Adverse at Year 0	This receptor would benefit from the screening provided by tree planting located within the proposed 'community land' located opposite.	Minor Adverse at Year 15	Significant at Year 0 Not Significant at Year 15
Viewpoint 19: Highfield Farm footpath	High	Large at Year 0 Small to Medium at Year 15	Major Adverse at Year 0	Proposed woodland planting in fields located directly to the south of the Site would provide screening of the some of the view of the Proposed Development.	Minor to Moderate Adverse at Year 15	Significant at Year 0 Not Significant at Year 15

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Viewpoint 20: Highfield Moss SSSI Footpath	Medium	High at Year 0 Large at Year 15	Major Adverse at Year 0	No visual mitigation is proposed beside this footpath.	Major Adverse at Year 15	Significant at Year 0 Significant at Year 15
Viewpoint 21: Morris Farm	High	Large at Year 0 Medium at Year 15	Major Adverse at Year 0	Proposed planting on a field boundary to the west of this viewpoint would provide an effective screen to views once established. This viewpoint location would also partly benefit from the screening provided by tree planting located within the proposed publicly accessible corridor along Winwick Lane.	Moderate Adverse at Year 15	Significant at Year 0 Not Significant at Year 15
Viewpoint 22: Little Town Footpath	Medium to High	Medium at Year 0 Small to Medium at Year 15	Moderate to Major Adverse at Year 0	This viewpoint location would partly benefit from the screening provided by tree planting located within the proposed publicly accessible corridor along Winwick Lane and on the western extents of New Lane End and Croft.	Moderate Adverse at Year 15	Significant at Year 0 Not Significant at Year 15

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Viewpoint 23: Footpath Leading to Southworth Hall Farm	Medium to High	Medium at Year 0 Medium at Year 15	Moderate Adverse at Year 0	This viewpoint location would partly benefit from the screening provided by tree planting located within the proposed publicly accessible corridor along Winwick Lane.	Moderate Adverse at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 24: Hermitage Green Footpath	Medium	High at Year 0 Large at Year 15	Moderate to Major Adverse at Year 0	No mitigation proposed for this view.	Moderate to Major Adverse at Year 15	Significant at Year 0 Significant at Year 15
Viewpoint 25: Vulcan Park Way	High	No Change at Year 0 No Change at Year 15	No Change at Year 0	No mitigation proposed for this view.	No Change at Year 15	Not Significant at Year 0 Not Significant at Year 15
Viewpoint 26: Sankey Valley Trail, Public Right	Medium	Small at Year 0 Small at Year	Minor Adverse at Year 0	No mitigation proposed for this view.	Minor Adverse at Year 0	Not Significant at Year 0

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
of Way		15			Minor Adverse at Year 15	Not Significant at Year 15
Viewpoint 27: Kenyon Footpath	Medium to High	Medium at Year 0 Small at Year 15	Moderate to Major Adverse at Year 0	This viewpoint location would partly benefit from the screening provided by tree planting located within the proposed publicly accessible corridor along Winwick Lane and on the western extents of New Lane End and Kenyon.	Minor to Moderate Adverse at Year 15	Significant at Year 0 Not Significant at Year 15
Viewpoint 28: Moss Lane Footpath	Medium to High	Large at Year 0 Medium at Year 15	Major Adverse at Year 0	Proposed woodland planting in fields located directly to the east of this viewpoint would provide screening of the some of the view of the Proposed Development.	Moderate to Major Adverse at Year 15	Significant at Year 0 Significant at Year 15
Viewpoint 29: Footpath to the south of New Lane End	Medium to High	Medium to Large at Year 0 Medium to Large at Year 15	Moderate to Major Adverse at Year 0	This viewpoint location would partly benefit from the screening provided by tree planting located within the proposed publicly accessible corridor along Winwick Lane.	Moderate to Major Adverse at Year 15	Significant at Year 0 Significant at Year 15

Receptor	Receptor sensitivity	Magnitude of impact	Description of potential effect	Proposed mitigation	Residual effect	Significant / not significant
Viewpoint 30: Rock House, Sandy Brow Lane	Medium	Medium to Large at Year 0 Medium to Large at Year 15	Moderate to Major Adverse at Year 0	This viewpoint location would partly benefit from the screening provided by tree planting located within the proposed publicly accessible corridor along Winwick Lane.	Moderate to Major Adverse at Year 15	Significant at Year 0 Significant at Year 15