

# Gate Burton Energy Park

Preliminary Environmental Information Report

Volume 3, Appendix 10-C: Landscape Baseline

June 2022

Gate Burton Energy Park Limited

## Quality information

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# 1. Landscape Baseline

## 1.1 Introduction

- 1.1.1 This appendix sets out the relevant extracts from published landscape character assessments and associated studies across the study area, which have been used to inform the assessment of landscape effects. This information should be read in combination with **PEI Report Volume 2: Figures 10-4 to 10-8**.
- 1.1.2 The Guidelines for Landscape and Visual Impact Assessment, 3<sup>rd</sup> edition (GLVIA3) Ref 10-1 (paras 5.12-5.18) indicates that broad-scale character assessments, such as those produced at the national and regional level, can be used to set the scene and indicate the key characteristics that may be apparent in the study area. It suggests that local authority assessments provide more detail and that these can be mapped to show how the Scheme relates to them. GLVIA3 acknowledges that it is likely that it will be necessary to carry out specific and more detailed surveys of the site and its immediate setting or surroundings and that it is proportionate to the assessment of the Scheme. This LVIA takes that approach, by identifying 12 Local Landscape character Areas (LLCA), which have been defined by the Applicant via desk-based review and fieldwork, to provide an additional and more proportionate level of analysis for the assessment of the Scheme and to inform the design.
- 1.1.3 An assessment of sensitivity is provided for each of the district level character areas and LLCAs, based upon the methodology stated in **PEI Report Volume 3: Appendix 10-B**.

## 1.2 National Level

- 1.2.1 National Character Areas (NCA) have been defined and described by Natural England. These are broad scale and provide context to more detailed studies of local landscape character and effects on these NCA will not therefore be assessed in the LVIA.
- 1.2.2 The NCA within the study area are shown on **PEI Report Volume 2: Figure 10-4**  
National Character Area 48: Trent and Belvoir Vales (2013) Ref 10-2
- 1.2.3 NCA 48 covers the entire study area and is summarised below.
- 1.2.4 The key characteristics of NCA 48 are:
- *“A gently undulating and low-lying landform in the main, with low ridges dividing shallow, broad river valleys, vales and flood plains. The mature, powerful River Trent flows north through the full length of the area, meandering across its broad flood plain and continuing to influence the physical and human geography of the area as it has done for thousands of years;*
  - *The bedrock geology of Triassic and Jurassic mudstones has given rise to fertile clayey soils across much of the area, while extensive deposits of alluvium and sand and gravel have given rise to a wider variety of soils, especially in the flood plains and over much of the eastern part of the NCA;*

- *Agriculture is the dominant land use, with most farmland being used for growing cereals, oilseeds and other arable crops. While much pasture has been converted to arable use over the years, grazing is still significant in places, such as along the Trent and around settlements;*
- *A regular pattern of medium to large fields enclosed by hawthorn hedgerows, and ditches in low-lying areas, dominates the landscape;*
- *Very little semi-natural habitat remains across the area; however, areas of flood plain grazing marsh are still found in places along the Trent;*
- *Extraction of sand and gravel deposits continues within the Trent flood plain and the area to the west of Lincoln. Many former sites of extraction have been flooded, introducing new waterbodies and new wetland habitats to the landscape;*
- *Extensive use of red bricks and pantiles in the 19th century has contributed to the consistent character of traditional architecture within villages and farmsteads across the area. Stone hewn from harder courses within the mudstones, along with stone from neighbouring areas, also feature as building materials, especially in the churches;*
- *A predominantly rural and sparsely settled area with small villages and dispersed farms linked by quiet lanes, contrasting with the busy market towns of Newark and Grantham, the cities of Nottingham and Lincoln, the major roads connecting them and the cross-country dual carriageways of the A1 and A46; and*
- *Immense coal-fired power stations in the north exert a visual influence over a wide area, not just because of their structures but also the plumes that rise from them and the pylons and power lines that are linked to them. The same applies to the gas-fired power station and sugar beet factory near Newark, albeit on a slightly smaller scale."*

1.2.5 Statements of Environmental Opportunity (SEO) provide guidance regarding the land use, management and development of the landscape. The following SEO relate to NCA 48:

- *"SEO 1: Maximise the use of sustainable agricultural practices that protect and enhance ecological networks in order to help safeguard the long-term viability of farming in the area while benefiting biodiversity, landscape character, carbon storage as well as water quality, availability and flow;*
- *SEO 2: Enhance the woodland and hedgerow network through the planting of small woodlands, tree belts, hedgerow trees and new hedgerows to benefit landscape character, habitat connectivity and a range of ecosystem services, including the regulation of soil erosion, water quality and flow;*
- *SEO 3: Enhance the rivers and their flood plains for their ecological, historical and recreational importance, their contribution to biodiversity, soil quality, water availability and in regulating water flow and the important role they play in underpinning the character of the area;*
- *SEO 4: Maintain and enhance the character of this gently undulating rural landscape. Promote and carefully manage the many distinctive elements that*

*contribute to the overarching sense of place and history of the Trent and Belvoir Vales.”*

## 1.3 Regional Level Published Landscape Character Assessments

East Midlands Regional Landscape Character Assessment (2009) Ref 10-4

- 1.3.1 The East Midlands Regional Landscape Character Assessment covers the administrative counties of Derbyshire, Leicestershire, Lincolnshire, Northamptonshire, Nottinghamshire and Rutland. It includes 30 district and borough authorities and the unitary authorities of Derby, Leicester and Nottingham. The assessment identifies a variety of Landscape Character Types (LCT), including limestone and chalk hills, ancient, forested hills, productive rolling farmlands interspersed with rural villages, remote lowland heaths and areas noted for their rich mining heritage. The following LCTs are within the study area, as shown in **PEI Report Volume 2: Figure 10-5** and provide context to the more detailed LCA and LLCA upon which the assessment of the landscape effects of the Scheme is based.

### Group 3A: Floodplain Valleys

- 1.3.2 Key Characteristics include:

- *“Deep alluvium and gravel deposits mask underlying bedrock geology to create wide, flat alluvial floodplains surrounded by rising landform of adjacent Landscape Character Types;*
- *River channels, often along managed courses, bordered by riparian habitat;*
- *Predominance of pastoral land use, with cereal growing increasing in some areas. ‘Warping’ areas subject to more intensive cereal growing;*
- *Limited woodland cover; however, steep riverside bluffs and areas close to settlement or on former gravel extraction sites notable for a higher level of woodland cover;*
- *Regular pattern of medium to large fields defined by hedgerows or post and wire fencing, breaking down and becoming open in some areas;*
- *Hedgerow and riverside trees important component of landscape. Alder, Willow and Poplar are typical riverside trees;*
- *Limited settlement and development in rural areas;*
- *Sewage Treatment Works and power stations common close to larger settlements that fringe the floodplains;*
- *Roads and communication routes often define the outer edges of the floodplain; and*
- *Restoration of sand and gravel extraction sites to open water creates new character across many areas.”*

- 1.3.3 Landscape Character:

*“The Floodplain Valleys Landscape Character Type is found throughout the region, along the broad valleys of the Trent, Nene, Welland, Wreake, Soar and Dove, and*

*short stretches of the Derwent and Witham. Despite occupying different parts of the region, and therefore contrasting bedrock geologies, the broad flat belts of alluvium and gravel terrace deposits flanking the river channels are a strong unifying characteristic.*

*Historically, the floodplains would have shared common land use characteristics with a predominance of permanent pasture on riverside meadows and arable fields on drier gravel terraces. Whilst many stretches of permanent pasture and riverside meadows remain, increasing arable and silage production, and the influence of large urban areas and sand and gravel extraction creates significant contrasts in local landscape character.*

*Whilst the floodplains themselves are generally devoid of settlement, the rivers and neighbouring gravel terraces have been a focus for settlement for several thousands of years. As such, many areas are noted for their rich and varied archaeological deposits. The majority of the region's major towns are located adjacent to the floodplains and exert a strong but localised influence on their character. Elsewhere, the floodplains constitute some of the most remote and peaceful terrestrial lowland areas in the East Midlands."*

#### 1.3.4 Aesthetic and Perceptual Qualities

*"The nature of local land cover and land use has a profound influence on the very varied aesthetic and perceptual qualities of the Floodplain Valleys. Vast stretches of floodplain landscape retain an intact and traditional character. Here the predominance of permanent grazing land interspersed with meandering river channels fringed by riparian habitats and riverside trees creates a visually coherent and intimate pastoral landscape. The general absence of built development enhances the quiet, rural character of the landscape, which is only occasionally interrupted by roads crossing the river, or views to farms and villages on drier, more elevated land. Hedgerows and rising landform fringing the floodplain enclose views and create an intimate, human scale landscape fringing the more open floodplain."*

#### 1.3.5 Landscape Change and Management – Infrastructure

##### *Forces for Change*

*"In response to flood risk, engineered solutions, such as concrete flood walls and embankments, have been installed in many locations along the river channels. This has resulted in the canalisation of rivers and loss of riverside vegetation, meadows and pastures, changing the natural character of the Floodplain Valleys, although historic structures can contribute to the character of the river. In some instances, the height of the defences screens the river from view, reducing the sense of openness and sense of place.*

*There is also the potential for the river landscapes to change due to shifting river channels, cutting off of meanders and the creation of features such as ox-bow lakes. This may result from flooding or other influences, and with the effects of climate change, there is a high potential for this to happen in the medium and long term."*

##### *Shaping the Future Landscape*

*"The aim should be to manage flood risk, implementing land management practices to control run-off and make more space for water. Specific mechanisms include*



*restoring floodplains and creating flood storage areas. Promotion will also be necessary to ensure landowners along river channels are encouraged to develop appropriate methods of land-use and land management.”*

## Group 4A: Unwooded Vales

### 1.3.6 Key Characteristics include:

- *“Extensive, low lying rural landscape underlain by Triassic and Jurassic mudstones and clays and widespread superficial deposits;*
- *Expansive long distance and panoramic views from higher ground at the margin of the vales gives a sense of visual containment;*
- *Low hills and ridges gain visual prominence in an otherwise gently undulating landscape;*
- *Complex drainage patterns of watercourses that flow within shallow undulations often flanked by pasture and riparian habitats;*
- *Limited woodland cover; shelter belts and hedgerow trees gain greater visual significance and habitat value as a result;*
- *Productive arable and pastoral farmland, with evidence of increasing reversion to arable cropping in recent times;*
- *Regular pattern of medium sized fields enclosed by low and generally well maintained hedgerows and ditches in low lying areas; large modern fieldscapes evident in areas of arable reversion; and*
- *Sparsely settled with small villages and dispersed farms linked by quiet rural lanes.”*

### 1.3.7 Landscape Character:

*“The rural Unwooded Vales Landscape Character Type within a central area of the region on a broadly north south axis, and whilst various underlying bedrock geologies exert a local influence, superficial deposits create a softly undulating landscape and consistent and recognisable character.*

*The Vales generally have a strong sense of place, with major landform features flanking the lower lying areas creating broad scale visual containment. Within the vales, low hills and ridges are also important, foreshortening views and creating subtle relief features.*

*The vale landscape is generally characterised by productive mixed agriculture, set within an enclosed landscape of low, well-maintained hedgerows. Wide areas are under permanent pasture, often grazed by dairy herds. However, areas of pasture are increasingly being ploughed up for cereals and hedgerows removed to accommodate large machines. Rivers and streams are also an important landscape feature. Whilst these occupy shallow folds and are not immediately apparent in views, their courses can often be observed by tracing sinuous belts of riparian habitat and riverside trees.*

*The vast majority of the Vales retain a deeply rural and tranquil character, with farms and small nucleated villages located throughout areas of productive farmland, linked by narrow winding lanes and roads. Despite low levels of woodland cover, local*

*landform, hedgerows and shelter belts create visual containment and give the Vales landscape an intimate character. By contrast, panoramic views are possible from elevated locations albeit contained by rising land at the edges of the Vales.”*

#### 1.3.8 Aesthetic and Perceptual Qualities

*“The Unwooded Vales is a simple and unified landscape type, consisting of a limited palette of features and elements, principally comprising, permanent pastures alongside watercourses; productive mixed farmland within a planned pattern of hedged and ditched enclosures; and nucleated villages and dispersed farmsteads linked by narrow winding lanes and more direct arterial routes.*

*Whilst the landform of the Unwooded Vales is typically low and subdued, rising landform towards their fringes creates a sense of visual containment. In the broader vales, this is sometimes difficult to discern; however, glimpses of neighbouring elevated areas are often sufficient to provide a strong sense of place. Within the broad vales, and typically along river and stream valleys, more intimate and human scale areas can be discerned. These ‘sub-vales’ generally follow river valleys with their outer limits defined by low hills and ridges along watersheds.”*

#### 1.3.9 Landscape Change and Management – Infrastructure

##### *Forces for Change*

*“The flat, open landscape of the Unwooded Vales contains several airfields. While redundant airfields provide an opportunity for new housing or employment uses, this reduces tranquillity and the sense of remoteness in sparsely settled areas. The construction of new roads or road alteration schemes has the potential to significantly affect the landscape with implications for change in character. The significant impact of the A46 widening scheme is a demonstration of this process and the effect on the wider countryside.”*

##### *Shaping the Future Landscape*

*“The aim should be to manage redundant airfields, ensuring development is appropriate in terms of type, scale and location and provision is made for new landscape features. In addition, it may be appropriate to retain existing infrastructure, providing an historic link with those that had a wartime role. New road schemes, as well as widening or realignment of existing roads should ensure that they are carefully integrated into the landscape through sensitive attention to alignment, detailing and planting where appropriate.”*

### **Group 4B: Wooded Vales**

#### 1.3.10 Key Characteristics include:

- *“Gently undulating landform formed over soft mudstone and clay geology, sharing many characteristics with the wider Unwooded Vales Landscape Character Type;*
- *Deposits of superficial geology, particularly cover sands and till influences local land use and semi-natural habitat cover;*
- *Low hills and ridges gain visual prominence; elevated landform fringing vales give broad sense of containment;*

- *Numerous watercourses flow within shallow undulations often flanked by pasture and riparian habitat;*
- *Relatively high levels of woodland cover, with notable tracts of ancient semi-natural woodland along outer fringes of parishes and large coniferous plantations;*
- *Productive arable and pastoral farmland, with evidence of increasing reversion to arable cropping;*
- *Irregular shaped assorted fields marked by belts of trees and tall hedgerows, juxtaposed with regular pattern of medium sized fields associated with enclosure of land, with low and generally well maintained hedgerows and ditches in low lying areas;*
- *Open, modern fieldscapes created by hedgerow removal in areas of arable reversion;*
- *Sparsely settled with small villages and dispersed farms linked by quiet rural winding lanes often flanked by tall hedgerows and tree belts; and*
- *Rural and historic character prevails, although coniferous plantations and modern arable fields diminish sense of antiquity.”*

#### 1.3.11 Landscape Character:

*“The sparsely settled Wooded Vales Landscape Character Type generally occurs in north Lincolnshire and lies within the much broader and extensive Unwooded Vales. Whilst various underlying bedrock geologies can be identified, extensive superficial deposits of till and cover sand create a softly undulating landscape.*

*The Wooded Vales generally has a strong sense of place, with major landform features flanking the lower lying areas creating broad scale visual containment. High levels of woodland cover are in evidence when compared to the Unwooded Vales and add to local distinctiveness and provide a coherent and recognisable character and strong identity.*

*Woodlands and localised variations in landform also foreshorten views and obstruct wide panoramas to create a more intimate scale landscape than is experienced in the Unwooded Vales. However, uninterrupted panoramic views across farmland are possible, albeit with woodlands often forming a dark backdrop or feature on the horizon.*

*The Wooded Vales landscape is generally characterised by productive mixed agriculture, set within an enclosed landscape of well-maintained hedgerows, sometimes marking ancient asserts. Wide areas are under permanent pasture. However, areas of pasture are increasingly being ploughed up for cereals and hedgerows removed to accommodate large machines. Whilst agricultural improvement has created large tracts of productive farmland, significant areas remain thickly wooded with ancient broadleaved woodlands and planted ancient woodlands. Sizable areas of sandy heathland are also evident on areas of cover sand, although some have been extensively forested with conifers. Rivers and streams are also an important landscape feature. Whilst these occupy shallow folds and are not immediately apparent in views, their course can often be observed by tracing sinuous belts of riparian habitat, wet woodland and riverside trees.*

*The vast majority of the Wooded Vales retains a historic, deeply rural and tranquil character, with farms and small nucleated villages located throughout areas of productive farmland and linked by narrow winding lanes and roads.”*

#### 1.3.12 Aesthetic and Perceptual Qualities

*“The Wooded Vales is a complex landscape with a strong sense of place and rich historic character. Large areas of ancient and species-rich native woodland are juxtaposed with regular blocks of coniferous plantations. Similarly, irregular patterns of ancient fields defined by sinuous hedgerows and tree belts and remnant heaths and acid grasslands contrast with the regular pattern enclosure of fields and farms associated with the period of planned enclosure and modern arable fields where hedgerows have been removed.*

*The landform of the vales is typically low and subdued. However, rising landform and woodlands characteristically combine to create visual containment and a sense of enclosure. Despite this, some panoramic and extensive views are possible from elevated locations where views are uninterrupted by intervening vegetation.*

*The Wooded Vales landscape is sparsely settled, with small villages, hamlets and farms evenly distributed across the landscape. Villages are typically small and nucleated. The landscape has a strong agricultural character, with wide areas retaining a sense of rural tranquillity and intactness, notably where ancient hedgerow patterns, woodlands and winding rural lanes are a prominent characteristic.”*

## 1.4 County Published Landscape Character Assessments

- 1.4.1 The study area is covered by two County boundaries, Nottinghamshire and Lincolnshire. Nottinghamshire has a published Landscape Character Assessment for the county boundary which includes the western extent of the study area. Lincolnshire does not have a published Landscape Character Assessment, however there is a Landscape Character Assessment for West Lindsey District Council which sits within Lincolnshire County and has been used within this assessment. The County and District LCA's within the study area are shown on **PEI Report Volume 2: Figure 10-6**.

### Nottinghamshire County Landscape Character Assessment Ref 10-23:

- 1.4.2 The Nottinghamshire County Landscape Character Assessment defines County Character Areas and Landscape Description Units (LDU), which are further subdivided into manageable survey units referred to as Landscape Character Parcels (LCPs).
- 1.4.3 The study area for the Scheme traverses the Trent Washlands LCA, which has been subdivided into 30 Landscape Description Units (LDUs). These LDUs are further subdivided into 34 Landscape Character Parcels (LCPs).
- 1.4.4 The published study includes a table evaluating the sensitivity of each of the LCAs to different types and scales of development. GLVIA3 (paras 5.41 – 5.42) notes that

*“sensitivity and capacity studies... may deal with the general type of development that is proposed, in which case they may provide useful preliminary background information for the assessment. But they cannot provide a substitute for the individual assessment of the susceptibility of the receptors in relation to change arising from the specific development proposal”.* The sensitivity evaluation in the published study does not consider sensitivity to solar farms, or similar development, and has not been considered further in the landscape and visual impact assessment for the Scheme.

### Trent Washlands LCA

- 1.4.5 “The Trent Washlands is principally formed from the broad valleys of the River Trent. The region is defined by alluvial and river terrace drift deposits and occupies around 10 % of the County. The Trent flows in a great arc through a number of counties including Staffordshire, Derbyshire and Nottinghamshire before eventually discharging into the North Sea, via the Humber.”
- 1.4.6 The related LDUs fall into two distinct landscape types: *Village Farmlands* and *River Meadowlands*. The study area traverses the River Meadowlands LCP which is summarised below.

### River Meadowlands LCP

- 1.4.7 This is described as a flat low-lying riverine landscape characterised by alluvial meadows, grazing animals and remnant wetland vegetation.
- 1.4.8 Key characteristics include:
- *“Meandering river channels, often defined by flood banks*
  - *Sparsely populated with few buildings*
  - *Permanent pasture and flood meadow*
  - *Steep wooded bluffs*
  - *Willow holts*
  - *Long sinuous hedges*
  - *Pollarded willows*
  - *Regular pattern of medium to large size arable fields, breaking down and becoming open in many areas*
  - *Hedgerow trees main component of tree cover.”*
- 1.4.9 Landscape Character:

*“These landscapes are located on flat, low-lying alluvial floodplains within the Trent river valleys, and the lower reach of the Devon. Few buildings are found in these sparsely settled landscapes because of the risk of inundation by flood waters. The River Meadowlands are characterised by areas of alluvial meadow and riverside pasture, flood meadows, extensive common grasslands, meandering river channels and steep wooded bluffs. The character and unity of the river corridors have broken down in recent decades, largely as a result of flood protection works which have allowed the arable conversion of large tracts of alluvial meadowland. Significant areas of intact river corridor have survived along various sections of the Trent. These*



*areas possess a peaceful, undisturbed pastoral character with meandering river channels, permanent pastures, flood meadows, willow holts and grazing animals. This gives the landscape a strong sense of place and a feeling of naturalness. Along the Trent Trench steeply inclined wooded bluffs form a dramatic backdrop to the river and contain ash, oak, sycamore, poplar, alder and willow species. The bluffs are particularly pronounced on the east bank where they are undercut by the river. The flood meadows are sometimes associated with shingle beds. Old willows are locally important throughout the landscape. Remnant patches of marginal wetland vegetation fringe the river channels in some areas, enhancing the riparian character of the valleys. Willow holts are located at a number of points along the rivers; these increase diversity in the landscape and add to the strong sense of place....*

*...Large areas of the River Meadowlands have now been converted to arable land. This encroaches to the river channel edges in many areas disrupting the unity of the river corridors, particularly along the Trent. Away from the river the landscape is defined by medium to large scale regular and semi-irregular field patterns. Field rationalisation has led to the loss of hedgerows in many areas, producing open landscapes with a very weak riverine character.*

*Despite only the occasional small deciduous woodland and Willow holt, the overall impression is of a well treed landscape. Ash, Oak and Willow hedgerow trees are the most important components of the overall tree cover. These enhance the sense of enclosure and allow filtered views down the valleys. Numerous Willow-lined streams flowing into the main river channels are also prominent landscape features, as are old Willow pollards which occur widely.*

*Although there are a few buildings located within the River Meadowlands, numerous mineral extraction sites and large power stations are located close by. These developments have a large impact upon the character of the landscape, further increasing the sense of disunity."*

#### 1.4.10 Landscape Evolution and Change: Renewable Energy

*"National policy is placing a greater emphasis on the promotion of renewable energy sources, such as wind-farms. The East Midlands Regional Plan states that by 2020, at least 20% of electricity supplied in the East Midlands should be provided from renewable energy sources. Currently, the figure is just 2%.*

*Regional policy encourages planning authorities to develop plans and strategies to promote and encourage (rather than restrict) the use of renewable energy resources. There are likely to be future applications for the location of windfarms in the Trent Valley. These structures have the potential to change the landscape character of the Trent Washlands, particularly the more sparsely settled northern areas. The power generation industry will continue, therefore, to be a dominant feature of the region."*

### Landscape Sensitivity

- 1.4.11 Overall, the LCP includes some important landscape features, such as flood meadows and river canals, however, there are no designations within this LCP. The LCP largely has a scenic and tranquil quality provided by the ecosystems created from the flood plains. The LCP is slightly degraded due to the numerous mineral

extraction sites and large power stations are located close by. The value of the LCP is Medium.

- 1.4.12 The pattern of the LCP is largely intact, influenced hugely by the river corridor and the associated ecosystem which it creates. With the influence of the power stations and associated infrastructure the LCP is under pressure for this type of industry to become the dominant feature within the landscape, therefore there is limited opportunity for change. The susceptibility to change is Medium.
- 1.4.13 Overall, the combination of the Medium value and Medium susceptibility results in a Medium sensitivity to the Scheme.

#### Landscape Character Parcel TW30

- 1.4.14 Key characteristics include:

- *“A predominantly large-scale arable landscape*
- *Small scale pastoral landscape around Cottam, Rampton and Church Laneham*
- *Views dominated by power stations and pylons*
- *Well-trimmed mature hedgerows to internal field boundaries, with trees*
- *Less well maintained road side hedges, with trees*
- *Nucleated villages characterised by red brick buildings and pantile roofed buildings to historic cores with newer development to the periphery.*
- *Limited small woodlands*
- *Long distance views north and south across open landscapes constrained by distance, long distance views east and west constrained by wooded ridge lines.”*

- 1.4.15 Landscape Condition:

*“Landscape Condition is defined as good. There is a coherent pattern of landscape elements with few detracting features within the PZ, the detractors include power lines and freight traffic on mineral lines. Overall, this gives a visually unified area.*

*The historic field pattern is intact around the villages of Rampton, Church Laneham and Cottam. Outside the villages some of the field boundaries shown on Sanderson’s plan of 1835 are intact but intervening boundaries have been removed. The overall cultural integrity is described as variable*

*There is very limited tree cover, mature trees are confined to the historic village cores and hedge lines rather than woodlands. There are two SINC’s in the PZ designated for aquatic and bankside vegetation and neutral grassland. The ecological network is defined as moderate which combined with as variable cultural integrity gives a coherent habitat for wildlife/functional integrity. A visually unified area with a coherent habitat for wildlife/functional integrity gives a good landscape condition.*

### Landscape Sensitivity

- 1.4.16 Overall, the LCP includes some important historic features within the villages and also within the wider landscape. However, the LCP is slightly degraded due to the presence of numerous mineral extraction sites and large power stations located close by. There are some areas of tranquillity, particularly in areas along the riverbank which has seen ecological improvements, however they are brief due to the Power Stations and associated Pylons distracting from this element. The value of the LCP is low.
- 1.4.17 The pattern of the LCP is largely intact, with interesting elements both in the natural and built heritage creating a sense of place within the LCP. The power station and pylons have an influence on this landscape, however the vegetation within the surrounding landscape could allow for development to be accommodated. The susceptibility to change is Medium.
- 1.4.18 Overall, the combination of the low value and medium susceptibility results in a Medium sensitivity to the Scheme.

### Landscape Character Parcel TW31

- 1.4.19 Key characteristics include:

- *“This is a flat landscape composed of arable fields to the west and pasture fields along the course of the River Trent and to the south*
- *Views are dominated by Cottam power station*
- *Mature trees are confined to the riverside and wetland areas and the hedgerows of pasture fields in particular*
- *Areas of scrub and aquatic vegetation close to the river*
- *There are long distance views along the River Trent to the North and South, views are bounded by elevated wooded ridgelines to the east*
- *The PZ is largely uninhabited except for isolated properties on the fringes of Cottam village*

- 1.4.20 Landscape Condition:

*“Landscape condition is defined as good. There is a coherent pattern of landscape elements with few detracting features within the PZ. The detractors include power station infrastructure and pylons. Overall this gives a visually unified area.*

*The overall cultural integrity is defined as variable. There is moderate tree cover which consists mainly of bands of riverside vegetation. There are 2 SINCS sites within the PZ designated for their aquatic interest. The integrity of the ecological network is defined as moderate, which together with a variable cultural integrity gives a coherent habitat for wildlife / functional integrity.*

*A visually unified area with a coherent functional integrity/ habitat for wildlife gives a good landscape condition”.*

### Landscape Sensitivity

- 1.4.21 This LCP is quite flat, providing distanced views to the power station, and also provides long distant views towards the River Trent. This LCP is dominated by the



prevailing industrial character provided by Cottom Power Station. The value of the LCP is low.

- 1.4.22 The pattern of the LCA is largely intact, with large scale arable fields a feature of this landscape. The power station and pylons dominate this landscape. There is very little settlement within this LCA. The susceptibility to change is low.
- 1.4.23 Overall, the combination of the low value and low susceptibility results in a low sensitivity to the Scheme.

#### Landscape Character Parcel TW32

- 1.4.24 Key characteristics include:

- *This is a flat landscape less than 5metres AOD*
- *Views are dominated by West Burton and Cottam Power Stations to the north and South*
- *Mature trees are limited and confined to small woodlands and field access tracks*
- *The PZ is largely uninhabited except for isolated properties*
- *Field access track hedgerows are mature and of mixed species with mature trees*
- *Roadside hedges and field boundaries are more fragmented and gappy*
- *Watercourses are present throughout the PZ*

#### Landscape Condition:

*“Landscape condition is defined as good. There is a unified pattern of elements with few detracting features within the PZ. The detractors include pylons and masts. Overall this gives a strongly visually unified area.*

*The overall cultural integrity is variable. The tree cover is poor, the integrity of the ecological network is weak which together with a variable cultural integrity gives a weak functional integrity/habitat for wildlife overall. A strongly visually unified area with a weak functional integrity/habitat for wildlife gives a good landscape condition.”*

#### Landscape Sensitivity

- 1.4.25 This LCP is quite flat, and is within the river valley of the River Trent. This LCP is dominated by the prevailing industrial character provided by both Cottom and West Burton Power Station. The value of the LCP is low.
- 1.4.26 The pattern of the LCP is largely intact, however, the hedgerows which define the field boundaries can be quite gappy. Both power station and pylons have an influence on this landscape. The susceptibility to change is low.
- 1.4.27 Overall, the combination of the low value and low susceptibility results in a low sensitivity to the Scheme.

#### Landscape Character Parcel TW33

- 1.4.28 Key characteristics include:

- *“This is a flat landscape composed of arable fields and permanent and improved pasture to the north and south*
- *Views are dominated by West Burton power station*
- *Mature trees are confined to the riverside and hedgerows to tracks, as well as Littleborough village*
- *Areas of scrub and aquatic vegetation close to the river*
- *There are long distance views to the north and south , views are bounded by elevated ridgelines to the east*
- *The PZ is uninhabited except for an isolated farm and the ancient settlement of Littleborough , characterised by vernacular architecture and mature vegetation.”*

#### 1.4.29 Landscape Condition:

*“Landscape condition is defined as very good. There is a unified pattern of elements with few detracting features within the PZ. The detractors include pylons and masts. Overall, this gives a strongly visually unified area. The overall cultural integrity is good due largely to the maturity of vegetation and time depth of the ancient settlement of Littleborough*

*Tree cover is low, there are 4 SINCs in the area mostly designated for their aquatic communities, the integrity of the ecological network is moderate which together with a variable cultural integrity gives a strong functional integrity/habitat for wildlife overall. A strongly visually unified area with a strong functional integrity/habitat for wildlife gives a very good landscape condition”*

#### Landscape Sensitivity:

- 1.4.30 This LCP is flat, however, views towards the river are limited due to the vegetation along the riverbank. The West Burton Power Station is quite dominant within the landscape. This LCP is dominated by the prevailing industrial character provided by Cottom Power Station. The value of the LCP is low.
- 1.4.31 The pattern of the LCP is largely intact, with large scale arable fields a feature of this landscape. The power station and pylons dominate this landscape. There is very little settlement within this LCP. The susceptibility to change is low.
- 1.4.32 Overall, the combination of the low value and low susceptibility results in a low sensitivity to the Scheme.

## 1.5 District Published Landscape Character Assessments

- 1.5.1 As previously mentioned, there is no Lincolnshire published Landscape Character Assessment. West Lindsey District Council which sits within Lincolnshire County and has been used within this assessment. The County and District LCA's within the study area are shown on **PEI Report Volume 2: Figure 10-6.**

## West Lindsey Landscape Character Assessment, 1999: Ref 10-5

- 1.5.2 The West Lindsey Landscape Character Assessment describes the landscape character areas of the district of West Lindsey district, located within Lincolnshire County Boundary. The West Lindsey boundary is located east of the River Trent, with the River Trent acting as a boundary divider between Lincolnshire and Nottinghamshire. The study boundary of the Scheme traverses a number of the Landscape Character Areas which are described below.

### Trent Valley LCA

- 1.5.3 Landscape Character:

*“This area is primarily rural in character. The eastern edge is formed by the scarps of the Northern and Southern Cliff. The western edge of the area is formed by the River Trent in the north, and by the county boundary in the south. The entire area is characterised by nucleated settlements and isolated farmsteads. The nucleated settlements to the north of Lincoln are arranged in two distinct north-south lines: aligned along the eastern Trent bank and, to the east, along the line of the shallow ridge which leads up to the Northern Cliff scarp. The character of the nucleated settlements to the south of Lincoln fall into two distinct categories: those to the immediate west and south of Lincoln are much more scattered, of smaller size and less frequent in nature than those to the north of Lincoln; those in the far south of the zone are larger in size and more frequent forming a crescent following the edge of the low lying ground through which the River Witham flows. Isolated farmsteads are found throughout the area, with equal distribution, but, due to the lower frequency of nucleated villages, appear more dominant in the central part of the area.*

*The fieldscapes in the area comprise a balanced mix of field types. Close to the historic settlements at the edge of the area, there is some survival of ancient enclosures of the former open field systems. Survival of ancient enclosure is more prevalent north of Lincoln, apart from an extensive area in the vicinity of Haddington and Aubourn. There is also a strong survival of planned enclosure landscapes across the character area, and the modern fields, produced through a process of consolidation in the twentieth century, retain much of the rectilinear character of the underlying planned enclosures. Most of the modern fields and planned enclosures have a strong east to west orientation, evident from the long boundaries that have survived the process of consolidation.”*

Trent Valley LCA is divided into Landscape Character Zones, the character zone which relates to the study area is The Northern Cliff Foothills which is further stated below.

- 1.5.4 Character Zone TVL1 - The Northern Cliff Foothills:

*“The landscape of this zone is largely flat, with a gentle upward slope from the River Trent in the west to the foot of the Northern Cliff in the east. The level topography allows wide views of large features the landscape, especially the large power stations on the west bank of the Trent whose exhaust plumes can be seen across the zone.*

*A line of settlements, aligned approximately north to south, runs through the middle of the zone from Messingham in the north to Sturton-by-Stow in the south. The*

*settlements retain much of their historic character, with organic infill development on vacant plots and occasional large-scale modern development at their edges. There are also, scattered across the zone, several isolated farmsteads the majority of which have expanded significantly from their original size to include modern barns and animal pens.*

*The largest settlement in the zone is Gainsborough, an historic town situated on the east bank of the River Trent. The town displays a mixture of residential types, but the two most dominant are the strict grid-pattern, nineteenth-century terraces in the centre and the sinuous branching mid to late twentieth-century housing estates on the edge. The boundary between the two is marked by the railway line. The town is also home to a number of industrial facilities, both active and historic. The Britannia Iron Works was once the largest of these and its former premises at Marshall's Yard have now been converted into office space and retail outlets, while retaining much of its former industrial character. The port facilities along the Trent are now largely disused and there are several areas of overgrown derelict land.*

*The fields in the zone comprise a balanced mix of types. Close to the historic settlements at the western edge of the zone there is a preponderance of surviving ancient enclosures, characterised by small field sizes. Away from the settlements there are a number of ancient enclosures of larger size which seem to be associated with specific isolated farmsteads. There is also strong survival of planned enclosure landscapes across the character zone, and the modern fields, produced through a process of consolidation in the twentieth century, seem to retain much of the rectilinear character of the underlying planned enclosures. Most of the modern fields and planned enclosures have a strong east to west orientation, evident from the long boundaries that have survived the process of consolidation. Much of the road network reflects the strong east to west alignment of the fieldscapes, apart from the road linking the central settlement line, which is aligned north to south and roughly follows the 20m contour line. The east to west aligned roads are all characterised by their wide, sinuous nature.*

### Landscape Sensitivity

- 1.5.5 Overall, the LCA includes an area designated as an Area of Great Landscape Value (AGLV), the LCA also features many cultural heritage features not only within the villages but within the wider landscape. However, the LCA is slightly degraded due to the presence of numerous mineral extraction sites and the presence of large power stations located in neighbouring districts. There are some areas of tranquillity, particularly in areas away from the influence of industry, where undisrupted long-distance views can be achieved, however, these areas are limited due to the Power Stations and associated Pylons distracting from this element. The value of the LCA is Medium.
- 1.5.6 The pattern of the LCA is largely intact, with interesting elements both in the natural and built heritage creating a sense of place within the LCA. The power station and pylons have an influence on this landscape, however the vegetation and topography within the surrounding landscape could allow for development to be accommodated. The susceptibility to change is Medium.
- 1.5.7 Overall, the combination of the medium value and medium susceptibility results in a medium sensitivity to the Scheme.

## 1.6 Other Published Landscape Character Assessments

- 1.6.1 A number of other studies pertaining to landscape character have been reviewed and are detailed below. They provide additional context to the landscape baseline and the development of LLCA.

### Treswell with Cottam Character Assessment Ref 10-6Ref 10-1

- 1.6.2 The Treswell with Cottam Character Assessment was completed in March 2019 in preparation for the Treswell with Cottam Neighbourhood Plan to provide an *“overview of the key qualities and characteristics that define the Parish of Treswell with Cottam, with a particular focus on the parish’s two main settlements; Treswell and Cottam. The Character Assessment has been prepared in support of a larger project – the production of the Treswell with Cottam Neighbourhood Plan. ...”*
- 1.6.3 The majority of the area covered by the landscape character assessment is located to the west of the Study Area, near Cottam Power Station. The distribution, boundaries and key characteristics of the Treswell with Cottam Character Assessment has informed the definition of the Local Landscape Character Areas, set out later in this section.
- 1.6.4 The key characteristics of the area are recorded below.

### General Commentary:

- *“Treswell with Cottam extends across both the Mid Notts Farmlands LCA and Trent Washlands LCA. The Mid Notts Farmland LCA is an area of undulating landscape with a distinctively rural, agricultural character, which extends from the Sherwood region in the west to the lowlands of the Trent Washlands in the east. The Trent Washlands LCA is principally formed from the broad valleys of the River Trent, where arable cultivation now dominates large areas of the river corridors;*
- *Power stations now dominate the skyline as there is also West Burton Power Station outside the Plan area to the North. The impact of these power stations is not just in their over-bearing scale and dominance, but also in the impact of the web of pylons and power lines that take electricity to the rest of the country, all of which have adversely impacted upon the visual quality of the parish landscape;*
- *There are several key views and vistas in Treswell, which are denoted on the map at Fig 26. These include landscape views such as that towards Beck Farm from New Road (Fig 36), and views of the townscape such as that obtained at the village gateways;*
- *There are several memorable views and vistas in Cottam, which are denoted on the map at Fig 48. These include several landscape views from along Town Street out towards the village’s eastern landscape setting*
- *In addition to these landscape views, there several key views into the settlement at its north and south gateways. The listed Church of Holy Trinity is best appreciated in views from Overcoat Lane.”*

- 1.6.5 Key Recommendations



- *“Key local landscape views and townscape views, including those towards listed buildings and non-designated heritage assets, should be retained and, where possible, enhanced.*
- *Key local landscape features and characteristics should be protected and the specified landscape management objectives for each of the identified Bassetlaw Landscape Policy Zones, as documented in Section 2, adhered to.*
- *Roadside planting and greenery, including grass verges, hedgerows and trees, should be retained and the further appropriate planting schemes progressed as part of any new development.*
- *Listed buildings and other non-designated local landmarks and buildings of historic and/or architectural significance should be retained and their settings protected and enhanced*

### **Rampton and Woodbeck Character Assessment Ref 10-7**

- 1.6.6 The Rampton and Woodbeck Character Assessment was completed in March 2019 to support to the Rampton and Woodbeck Neighbourhood Plan *“a larger project – the production of the Rampton and Woodbeck Neighbourhood Development Plan. Once adopted, the Neighbourhood Development Plan will be used by Bassetlaw District Council when considering planning applications for development within the Neighbourhood Development Plan area.”*
- 1.6.7 The majority of the area covered by the landscape character assessment is within the Study Area. The distribution, boundaries and key characteristics of the Rampton and Woodbeck Character Assessment Treswell has informed the distribution of the Local Landscape Character Areas, set out later in this section.
- 1.6.8 The key characteristics of the area are recorded below.

#### **General Commentary:**

- *“Trent Washlands LCA is a particularly distinct landscape that characterises the eastern half of the parish. This character area extends west from the banks of the River Trent, whose meandering profile has had an acute influence on the local landscape and the area of land that lies between its western banks and the eastern end of Rampton village. However, the actual visual impact of the river is minimal, with high flood banks enclosing the waterway and largely shielding it from view. Extending outwards from the riverbanks are a series of small water courses and ditches that both border and cut across those low-lying agricultural fields (Fig 7) that characterise much of this landscape. Field boundaries feature trimmed, mixed species hedgerows (though hawthorn dominates) with occasional mature hedgerow trees, mostly ash;*
- *Cottam Wetlands: Situated at the eastern end of the parish, it is a large wetland mosaic, adjacent to and including a stretch of the River Trent. Botanically very rich and supporting a diverse flora, the area includes a number of lakes and lagoons, ditches, damp cattle-grazed grassland, swamp and marshland. The wetlands support an interesting and varied selection of plants, which provide breeding habitat for amphibians, odonata and many other insect species. They also provide an nesting site and habitat for both breeding birds and wintering wildfowl, as well as feeding opportunities for passage migrant species in spring and autumn.;*

- *Rampton and Woodbeck's wider landscape setting is not just an asset to be appreciated from afar; rather, it is a landscape that can be explored and enjoyed first-hand, with the parish benefiting from a particularly extensive network of public footpaths and bridleways (Fig 23). Many of these routes extend outwards from the parish settlements, forming peaceful, traffic-free pedestrian links that connect through to the wider north-east Nottinghamshire public rights of way network (Fig 24 and 25). Rampton benefits from a particular wealth of such rights of way, the village knitted into a comprehensive footpath network, which extends out into its adjoining landscape setting in all directions;*
- *Approaches into Rampton also tend to display an appropriately gradual and well-managed transition from countryside to village setting. Approach roads are largely devoid of development and tend to be enclosed by grass verges, hedgerows and trees planting, which then gradually gives way in a smooth and subtle manner to a more built and developed environment at the village gateways. The three main vehicular approaches into Rampton are shown across the images at Fig 33-47 and a brief commentary is provided on the qualities of each approach into the village."*

#### 1.6.9 Key Recommendations:

- *"Both parish settlements benefit from generally soft, verdant edges in long views from the surrounding landscape setting, with built forms almost entirely screened from view. This is particularly true of Rampton, which enjoys an almost continuous cloak of mature tree and hedgerow planting along its outer edges. Poorly designed and/or located edge-of-settlement development, which disrupts the soft, generously planted village edges should be resisted. All proposals for new development should integrate into the village's landscape setting and avoid creating unsatisfactory, overly hard edges to the villages. The retention of existing planting and vegetation is encouraged.*
- *In those few circumstances where existing settlement edges are overly exposed and fail to respond to the adjoining landscape setting, the introduction of further planting and landscaping should be considered in order to soften and enhance these edges. Such an approach would be particularly welcome along the southern and eastern boundaries of the Woodbeck, where the hospital complex and its imposing security fences form a rather harsh built feature in the landscape.*
- *At both Woodbeck and Rampton, entrances into the villages are generally pleasing, with an appropriately gradual and well-managed transition from countryside to village setting, which is facilitated by the many trees, hedgerows and grass verges that line the settlement approaches. Development proposals should be designed to maintain the rustic, rural appearance of these village approaches through sensitive siting and the retention of existing roadside planting and grass verges.*
- *Outside of the established developed extents of Rampton and Woodbeck, new development forms, such as agricultural buildings, should be carefully sited and designed so as to minimise their visual impact on the landscape setting. This is particularly crucial given the largely the flat and open landscape, which characterises much of the parish area. New development should explore*

*opportunities to utilise existing tree planting to partially screen the development and help it better integrate into its setting and/or introduce new tree planting as a means to mitigate against any potential harmful impacts on the landscape character.*

- *All Saints Church appears as a prominent and pleasing feature in many of the most distinct and handsome long distance views towards Rampton, where it is often the only built element rising above the strong tree canopies that otherwise dominate and define the village skyline. New development should respect these iconic local views towards the village and avoid negatively impacting upon their composition or visual quality.*

## 1.7 Local Landscape Character Areas

- 1.7.1 This section sets out the landscape characteristics and sensitivity of LLCA across the LVIA study area. Paragraph 5.14 of GLVIA3 states that “*broad-scale assessments at national or regional level can be helpful in setting the landscape context but are unlikely to be helpful on their own as the basis for LVIA – they may be too generalised to be appropriate for the particular purpose*”. The LLCA have been defined by the Applicant via desk based reviews of published landscape character assessments, which in the case of West Lindsey is over 20 years old, fieldwork and discussions with stakeholders to provide a finer level of detail and a more proportionate scale to the landscape assessment, in comparison to the wider geographic extent of the published studies.
- 1.7.2 The relationship between the LLCA and the published studies is set out in the LLCA Summary Table at the end of this section.
- 1.7.3 The extent and distribution of the LLCA is shown on **PEI Report Volume 2: Figure 10-7**.

### LLCA 01: Gate Burton Estate



**Image 1** Gate Burton Estate LLCA taken at the entrance to Gate Burton House, adjacent to the A156

- 1.7.4 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 01 is located to the west of the western site boundary and within the centre of the study area.
- 1.7.5 The LLCA is within:



- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
- *Group 4A as defined in the East Midlands Landscape Character Assessment (Ref 10-4);*
- *Group 4B as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
- *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*

#### 1.7.6 Key Characteristics:

- *Topography falls steeply to the west, towards the River Trent;*
- *A sense of a historic landscape resulting from a number of listed buildings, including Gate Burton House which sits to the centre of this LLCA.*
- *Historic pattern of ancient woodland and scattered features associated with the Gate Burton Estate.*
- *Predominantly small size and medium deciduous woodlands scattered across the area including some ancient woodland and semi-natural woodland which increases the diversity of the predominantly arable landscape;*
- *Within an area designated as an Area of Great Landscape Value as defined within the Central Lincolnshire Local Plan; and*
- *A high degree of tranquillity away from the A156.*

#### Landscape Sensitivity

- 1.7.7 The LLCA falls within an Area of Great Landscape Value designation defined in the Central Lincolnshire Local Plan. It also includes assets designated for their historic and conservation value, with listed buildings including Gate Burton House and associated buildings. The Gate Burton estate and its associated landscape features are in good condition and give rise to a clear sense of place, due to the prominence within this LLCA. Therefore, overall, the value is High.
- 1.7.8 The LLCA exhibits mostly key characteristics of The Trent Valley LCA (Ref 10-1) but given the steep topography towards the River Trent and existing tree lines associated with the historic landscape and estate of Gate Burton, the LLCA is unique in its character within the wider character area. Therefore, on balance, susceptibility to change is Medium.
- 1.7.9 Considering the High value and High susceptibility to change, overall sensitivity is Medium.

## LLCA 02: Ancient Woodland Plateau



**Image 2** Image taken in the center of this LLCA, looking south towards Burton Wood

1.7.10 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 02 is located within the solar site boundary and its eastern boundary aligns adjacent to the rail corridor located in the centre of the scheme boundary.

1.7.11 The LLCA is within:

- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
- *Group 4A as defined in the East Midlands Landscape Character Assessment (Ref 10-4);*
- *Group 4B as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
- *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*

1.7.12 Key Characteristics:

- *Relatively flat topography, rises slightly to the east near the rail corridor;*
- *One residential property within this LLCA;*
- *Predominant arable fields create rural landscape character;*
- *Predominantly medium size and small deciduous woodlands scattered across the area create more diverse character of the rural area;*
- *Pockets of ancient woodland give some variety to the land cover;*
- *Within an area designated as an Area of Great Landscape Value as defined within the Central Lincolnshire Local Plan*
- *A high degree of tranquillity away from the rail corridor.*

### Landscape Sensitivity

1.7.13 The LLCA falls within an Area of Great Landscape Value designation defined in the Central Lincolnshire Local Plan. It also includes pockets of ancient woodland. The Gate Burton estate and its associated landscape features are in good condition and

give rise to a clear sense of place, due to the prominence within this LLCA. Therefore, overall, the value is Medium.

- 1.7.14 The LLCA largely exhibits key landscape character attributes however the proximity to the railway corridor reduces the sense of tranquillity in the LLCA. The ancient woodland pockets provide a sense of place and are a distinctive feature within this LLCA. Therefore, on balance, susceptibility to change is Medium.
- 1.7.15 Considering the High value and High susceptibility to change, overall sensitivity is Medium.

### LLCA 03: Northern Trent Ridge



**Image 3** Image taken along the southern boundary of the LLCA looking north east

- 1.7.16 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 03 is located in the north-western part of the study area.
- 1.7.17 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
  - *Group 4A as defined in the East Midlands Landscape Character Assessment (Ref 10-4);*
  - *Trent Washlands LCA as defined in the Nottingham Landscape Character Assessment (Ref 10-23); and*
  - *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*
- 1.7.18 Key Characteristics:
- *Low-lying, flat landform created by the River Trent valley;*
  - *Settlement is limited;*
  - *Large to medium scale fields give sense of openness across the landscape;*
  - *Dominated by large to medium scale arable fields defined by hedgerow boundaries interspersed by hedgerow trees;*
  - *Pylons cross the farmland creating a strong, detracting, linear feature on the skyline;*

- *West Burton Power Station located to the northwest of this LLCA is dominant on the skyline and gives a sense of industrial character;*
- *Pockets of tranquil character away from the Power Station and pylons.*

### Landscape Sensitivity

- 1.7.19 The LLCA is bound to the north and northeast by an Area of Great Landscape Value designation defined in the Central Lincolnshire Local Plan. This LLCA also includes the River Trent and river valley, creating a sense of place. However, the landscape is simple and partially degraded with common features and minimal variation in the landscape pattern. Therefore, overall, the value is low.
- 1.7.20 LLCA 03 largely exhibits key landscape characteristics associated with the Trent Washlands LCA; although this landscape is locally influenced by existing infrastructure. Undue consequences are unlikely to arise from the Scheme and the susceptibility to change is considered to be low.
- 1.7.21 The landscape comprises relatively inconsequential elements and characteristics, the nature of which is potentially tolerant change of the type proposed. The sensitivity is low.

### LLCA 04: Gainsborough Fringe



**Image 4** Image taken along the A136, exiting Gainsborough town.

- 1.7.22 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 04 is located in the northern part of the study area.
- 1.7.23 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
  - *Group 4A as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
  - *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*
- 1.7.24 Key Characteristics:
- *Relatively flat topography, drops slightly to the west towards the River Trent and east near the rail corridor;*



- *Located in Gainsborough, the residential and commercial land use creates a sub-urban character across this LLCA;*
- *Arable land extends up to the edges of residential areas on the edge of Gainsborough;*
- *Good provision of PRow routes provides recreational opportunities across the area;*
- *To the periphery of the LLCA, vegetation encloses the outer settlement clusters, creating a separation between the settlements and the surrounding agricultural landscape.*
- *Pockets of tranquil character away from the built-up areas, towards the agricultural fields which bounds it.*

### Landscape Sensitivity

- 1.7.25 This LLCA contains the town of Gainsborough, which has seen many changes and extensions within recent years. Given the nature of the townscape, it is expected to evolve and grow. The town centre provides a sense of place for the LLCA. Therefore, overall, the value is low
- 1.7.26 The landscape pattern, extent and density of existing vegetation and built form mean that the receptor has some capacity to accommodate the proposed development without effects upon its overall integrity. The pattern of the landscape is mostly intact and/or with a degree of complexity and with features mostly in reasonable condition and is influenced by the urban extension of Gainsborough. Undue consequences may arise from the Scheme. The susceptibility to change is Medium.
- 1.7.27 Considering the low value and Medium susceptibility to change within LLCA4, overall sensitivity is Medium.

### LLCA 05 - Somerby and Knaith Woodlands



**Image 5** Image taken along the B1241 near Kexby Grange

- 1.7.28 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 05 is located in the northern part of the study area.
- 1.7.29 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*

- *Group 4A as defined in the East Midlands Landscape Character Assessment (Ref 10-4);*
- *Group 4B as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
- *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*

#### 1.7.30 Key Characteristics:

- *Predominantly plateaued farmland with large scale arable fields giving a sense of openness;*
- *Field boundaries are marked predominantly by grassy banks and ditches, contributing to the sense of openness;*
- *Large blocks of woodland on the horizon divide the LLCA from neighbouring areas;*
- *Settlement is limited to individual properties along tracks.*
- *Large deciduous woodlands, including some ancient woodland, with broadleaved trees scattered across the area, create a diverse landscape character.*

### Landscape Sensitivity

- 1.7.31 The landscape contains elements such as woodland and hedgerow trees which are representative of community or local level attributes defined by the Northern Cliff Foothills LCA. The LLCA is not covered by any landscape designations. The value is medium.
- 1.7.32 The pattern of the landscape is mostly intact and/or with a degree of complexity and with features mostly in reasonable condition, including the large-scale field structure and existing tree belts across the area the LLCA. Undue consequences may arise from the Scheme. The topography, pattern and structure of fields and existing vegetation means that this LLCA has some capacity to accommodate the proposed development without effects upon its overall integrity and therefore, on balance, susceptibility to change is medium.
- 1.7.33 Considering the medium value and medium susceptibility, and that the landscape is not designated, sensitivity is medium.

## LLCA 06 - Clay Farmlands



**Image 6** Image taken along Clay Lane looking north west

1.7.34 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 06 is located within the solar site boundary.

1.7.35 The LLCA is within:

- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
- *Group 4A as defined in the East Midlands Landscape Character Assessment (Ref 10-4);*
- *Group 4B as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
- *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*

1.7.36 Key Characteristics:

- *Gently undulating farmland with sparse vegetation cover in the western and central part of the LLCA gives a sense of openness;*
- *Large to medium scale primarily arable fields;*
- *Dispersed settlement limited to isolated farmsteads and scattered dwellings;*
- *Hedgerows with hedgerow trees or grass banks and ditches form field boundaries;*
- *Limited recreational access;*
- *Views of Power Station and associated pylons to the west and southwest disrupt the tranquil character of the remainder of the LLCA.*

### Landscape Sensitivity

1.7.37 Condition is moderate to good due to the arable land use and vegetation pattern. There is little urbanising influence, but views of the industrial elements to the west detract from the otherwise tranquil character. The area is representative of the key characteristics of Character Zone TVL1 - The Northern Cliff Foothills and is not covered by any landscape designations. The value is low.

- 1.7.38 The flat topography, existing field structure and influence of industry mean that the receptor has some capacity to accommodate the proposed development without effects upon its overall integrity. Therefore, on balance, susceptibility to change is medium.
- 1.7.39 Considering the low value, medium susceptibility and that the landscape is not designated the overall sensitivity is medium.

## LLCA 07 – Stow Fringe



**Image 7** Image taken along the Sturton Road looking south west.

- 1.7.40 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 07 is located to the east of the study area.
- 1.7.41 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
  - *Group 4A as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
  - *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*
- 1.7.42 Key Characteristics:
- *Gently undulating landform, large to medium scale fields and low hedgerows give sense of openness;*
  - *Predominantly arable agricultural fields creates rural landscape character;*
  - *Distant industrial elements are prominent on the skyline;*
  - *Sparse settlement limited to scattered farmsteads;*
  - *Network of winding, quiet and narrow rural lanes.*
  - *Views of Power Station and associated pylons to the west and southwest disrupt the tranquil character of the remainder of the LLCA.*

## Landscape Sensitivity

- 1.7.43 There is little urbanising influence within the LCA but views of the power stations to the west detract from the otherwise relatively tranquil character. The area is representative of the key characteristics of the Character Zone TVL1 - The Northern



Cliff Foothills and provides opportunities for recreation but is not covered by any landscape designations. The value is low.

- 1.7.44 The gently undulating topography, existing field structure and influence of industry on the skyline to the west mean that the receptor has some capacity to accommodate the proposed development without effects upon its overall integrity. The large field structure and sense of openness also allows for the scheme to be accommodated. Therefore, on balance, susceptibility to change is low.
- 1.7.45 Considering the low value, low susceptibility the sensitivity is therefore low.

## LLCA 08 - High Wood Plateau



**Image 8** Image taken to the north of the study area along the Marton Road looking south

- 1.7.46 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 08 is located in the south-eastern part of the Study Area.
- 1.7.47 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
  - *Group 4A as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
  - *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*
- 1.7.48 Key Characteristics:
- *Flat landform and large to medium scale fields give sense of openness across the landscape;*
  - *Dominated by large to medium scale arable fields defined by weak hedgerow boundaries interspersed by occasional hedgerow trees;*
  - *Pylons are limited, but where present create a strong, detracting, linear feature on the skyline;*
  - *Settlement is very limited;*
  - *Cotton Power Station is a prominent landmark on the skyline to the south west;*

- *Views of Power Station and associated pylons to the southwest disrupt the tranquil character of the remainder of the LLCA.*

### Landscape Sensitivity

- 1.7.49 There is little settlement, but the busy Marton Road and pylons detract from the otherwise tranquil character. The area is representative of key characteristics of Character Zone TVL1 - The Northern Cliff Foothills and provides opportunities for recreation but is not covered by a landscape designation. The value is low.
- 1.7.50 The flat topography, existing field structure and existing line of pylons across the area mean that the receptor has some capacity to accommodate the proposed development without effects upon its overall integrity. Therefore, on balance, susceptibility to change is medium.
- 1.7.51 Considering the low value, medium susceptibility, sensitivity is considered medium.

### LLCA 09 - Trent Valley South



**Image 9** Image taken along the Marton Road looking south

- 1.7.52 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 09 is located in the southern part of the Study Area.
- 1.7.53 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
  - *Group 4B as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
  - *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*
  - *Key Characteristics:*
  - *Gently undulating landscape;*
  - *Large and medium woodlands coalesce with field boundaries and residential developments to create the impression of a wooded horizon;*
  - *Settlement clusters are a feature across this LLCA*
  - *The LLCA retains an agricultural character away from residential areas;*
  - *Good provision of PRow provides recreational opportunities across the area.*

- *Views of Power Station and associated pylons to the west disrupt the tranquil character of the remainder of the LLCA.*

### Landscape Sensitivity

- 1.7.54 There is little settlement, but the power station seen to the west and pylons detract from the otherwise tranquil character. The area is representative of key characteristics of Character Zone TVL1 - The Northern Cliff Foothills and provides opportunities for recreation but is not covered by a landscape designation. The value is low.
- 1.7.55 The flat topography, existing field structure and existing line of pylons across the area mean that the receptor has some capacity to accommodate the proposed development without effects upon its overall integrity. Therefore, on balance, susceptibility to change is medium.
- 1.7.56 Considering the low value, medium susceptibility, sensitivity is considered medium.

### LLCA 10 - Cottom Plateau



**Image 10** Image taken along the western boundary of the LLCA

- 1.7.57 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 10 is located in the southwestern part of the Study Area. The proposed route connection element of the Scheme is located within the southern part of the LLCA.
- 1.7.58 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
  - *Flood Plane Valley LCA as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
  - *Trent Washlands LCA as defined in the Nottingham Landscape Character Assessment (Ref 10-23).*
- 1.7.59 Key Characteristics:
- *Flat landform and large to medium scale fields give sense of openness across the landscape;*
  - *The landscape is dominated by the massive buildings and structures of Cottom Power Station, located in the centre of this LLCA which gives a strong sense of industrial character.*



- *Large to medium scale arable fields defined by hedgerow boundaries interspersed by hedgerow trees surround the power station;*
- *Pylons cross the farmland creating a strong, detracting, linear feature on the skyline;*
- *Settlement is limited.*

### Landscape Sensitivity

- 1.7.60 The LLCA is dominated by the presence of the Cottom Power Station and its associated pylons. This LLCA also includes the River Trent and river valley, creating a sense of place. However, the landscape is simple and partially degraded with common features and minimal variation in the landscape pattern. Therefore, overall, the value is low.
- 1.7.61 The landscape is degraded by the strong influence of industry and with common features and minimal variation in landscape pattern. This means that undue consequences are unlikely to arise from the Scheme and susceptibility to change is low.
- 1.7.62 This is a substantially modified landscape with few important features and tolerant of change. The sensitivity is low.

### LLCA 11 - Rampton Fringe and Hawk Hills



**Image 11** Image taken center of the LLCA

- 1.7.63 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 10 is located in the southwestern part of the Study Area.
- 1.7.64 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
  - *Flood Plane Valley LCA as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*
  - *Trent Washlands LCA as defined in the Nottingham Landscape Character Assessment (Ref 10-23).*
- 1.7.65 Key Characteristics:
- *Largely flat or gently undulating landform and large to medium scale fields give sense of openness across the rural landscape;*

- *Predominantly agricultural land use defines the rural landscape character;*
- *Distant, wooded horizon formed by blocks of woodland and hedgerow lined field boundaries;*
- *Dispersed settlement limited to scattered farmsteads;*
- *Network of straight, quiet and narrow rural lanes;*
- *Field boundaries are marked by fragmented hedgerows with occasional hedgerow trees or grassy banks and ditches reinforcing the historic landscape pattern.*

### Landscape Sensitivity

- 1.7.66 There is little urbanising influence, but the presence of power stations and pylons on the skyline detract from the otherwise tranquil character. The area is representative of key characteristics of the LCA Trent Washlands and provides opportunities for recreation but is not covered by a landscape designation. The value is Medium.
- 1.7.67 The flat topography, existing field structure and existing line of pylons across the area mean that the receptor has some capacity to accommodate the proposed development without effects upon its overall integrity. Therefore, on balance, susceptibility to change is medium.
- 1.7.68 Considering the Medium value, Medium susceptibility and that the landscape is not designated, sensitivity is medium.

### LLCA 12 - West Burton Valley



**Image 12** Image taken to the west of the LLCA

- 1.7.69 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 12 is located in the western part of the Study Area.
- 1.7.70 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
  - *Flood Plane Valley LCA as defined in the East Midlands Landscape Character Assessment (Ref 10-4); and*

- *Trent Washlands LCA as defined in the Nottingham Landscape Character Assessment (Ref 10-23).*

#### 1.7.71 Key Characteristics:

- *Undulating landform and large to medium scale arable fields give sense of openness across the rural landscape;*
- *Fields defined by hedgerows interspersed by occasional hedgerow trees create a strong network of field patterns;*
- *Large and medium woodlands coalesce with field boundaries to create the impression of a wooded horizon;*
- *Good provision of PRoW provide recreational opportunities across the area.*

#### Landscape Sensitivity

- 1.7.72 The landscape contains elements such as woodland and hedgerow trees which are representative of community or local level. The LLCA is not covered by any landscape designations. The value is low.
- 1.7.73 The medium scale landscape pattern with minimal variation means that undue consequences are unlikely to arise from the Scheme. The susceptibility to change is low.
- 1.7.74 Considering the low value, low susceptibility and that the landscape is not designated, sensitivity is low.

### LLCA 13 – Mid Trent Valley



**Image 13** Image taken center of the LLCA looking south.

- 1.7.75 With reference to **PEI Report Volume 2: Figure 10-7**, LLCA 13 is located in the western part of the Study Area.
- 1.7.76 The LLCA is within:
- *NCA 48 as defined in Natural England's National Character Assessment (Ref 10-2);*
  - *Group 4A as defined in the East Midlands Landscape Character Assessment (Ref 10-4);*

- *Trent Washlands LCA as defined in the Nottingham Landscape Character Assessment (Ref 10-23); and*
- *Group 3A as defined in the West Lindsey Landscape Character Assessment (Ref 10-5).*

#### 1.7.77 Key Characteristics:

- *Open and undulating farmland;*
- *Dominated by large to medium scale arable fields defined by hedgerow boundaries interspersed by hedgerow trees;*
- *Settlement is limited;*
- *Network of winding, quiet and narrow rural lanes.*

#### Landscape Sensitivity

- 1.7.78 The landscape contains elements such as woodland and hedgerow trees which are representative of community or local level attributes defined by the Trent Washlands LCA. The LLCA is not covered by any landscape designations. The value is low
- 1.7.79 The landscape is simple with common features and minimal variation in landscape pattern and the presence of existing infrastructure means that undue consequences are unlikely to arise from the Scheme. The susceptibility to change is low.
- 1.7.80 Considering the medium value, low susceptibility and that the landscape is not designated, sensitivity is low.

## 10.1 References

- Ref 10-1. Landscape Institute and the Institute of Environmental Management and Assessment. (2013). Guidelines for Landscape and Visual Impact Assessment 3<sup>rd</sup> Edition.
- Ref 10-2. Natural England (2013) NCA Profile: 48 Trent and Belvoir Vales (NE429). Available at: <http://publications.naturalengland.org.uk/publication/7030006#:~:text=This%20record%20was%20published%20by,centred%20on%20the%20River%20Trent.> [Accessed 12/04/2022]
- Ref 10-3. Nottinghamshire County Council (2009) Nottinghamshire County Landscape Character Assessment. Available at <https://www.bassetlaw.gov.uk/media/3451/landscape-character-trent-washlands.pdf> [Accessed 12/04/2022]
- Ref 10-4. Natural England (2010) East Midlands Region Landscape Character Assessment. Available at: <http://publications.naturalengland.org.uk/publication/5635681403535360> [Accessed 13/04/2022]
- Ref 10-5. West Lindsey District Council (1999) West Lindsey Landscape Character Assessment. Available at: <https://www.west-lindsey.gov.uk/planning-building-control/planning/planning-policy/evidence-base-monitoring/landscape-character-assessment> [Accessed 13/04/2022]
- Ref 10-6. Bassetlaw District Council (2018) Treswell with Cottam Character Assessment. Available at: <https://www.bassetlaw.gov.uk/media/3269/treswell-plus-cottam-character-summary-final.pdf> [Accessed 20/04/2022]
- Ref 10-7. Bassetlaw District Council (2019) Ramton and Woodbeck Character Assessment. Available at: <https://www.bassetlaw.gov.uk/media/4877/rampton-character-assessment.pdf> [Accessed 20/04/2022]