West Burton Solar Project

Environmental Statement Addendum:
Cumulative Effects

Prepared by: Lanpro Services

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West Burton
SOLAR PROJECT

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Issue Sheet

Report Prepared for: West Burton Solar Project Ltd.
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Environmental Statement Addendum: Cumulative Effects

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1 Introduction

1.1 Summary and Introduction

1.1.1 West Burton Solar Project is a proposed solar photovoltaic (PV) array electricity generating facility and electrical storage facility, each with a total capacity exceeding 50 megawatts (MW), and an export connection to the National Grid (the Scheme).

1.1.2 An Environmental Statement (ES) **[APP-039 to APP-061, REP1-073, REP1-074, REP1-012, REP3-010, REP4-076, REP4-077]** has been prepared on behalf of the Applicant in relation to an application to be made to the Secretary of State (SoS) for Department for Energy Security and Net Zero (ESNZ), under Section 37 of the Planning Act 2008.

1.1.3 The Application is for a Development Consent Order (DCO) for the construction, operation and maintenance, and decommissioning of the Scheme. The Scheme is classified as a Nationally Significant Infrastructure Project (NSIP) under the Planning Act 2008. An Environmental Impact Assessment (EIA) has been undertaken for the Scheme and as such, the Infrastructure Planning (Environmental Impact Assessment) Regulations 2017 (the EIA Regulations) apply.

1.1.4 Each technical chapter considers in detail the beneficial and adverse residual effects of the Scheme after the implementation of mitigation measures, both through the design of the Scheme ('embedded mitigation') and through further measures ('additional mitigation'). This assessment covers the construction, operation and decommissioning phases of the Scheme. The ES also includes a cumulative effects assessment, which was undertaken in accordance with the Planning Inspectorate's Advice Note Seventeen: Cumulative effects assessment. [1]

1.2 Purpose of this Document

1.2.1 This Addendum provides a compilation of the cumulative effects of all schemes that have the potential for cumulative impacts on this scheme in support of the Application for a Development Consent Order for the Scheme by West Burton Solar Project Limited (the 'Applicant').

1.2.2 As committed to in response to Action Point 6 for Issue Specific Hearing 4 **[REP4-071]**, and further referenced in Question 2.1.2 of the ExA Second Written Questions, the Applicant is providing this Addendum to Chapter 23 Cumulative Effects of the ES **[REP3-010]**. This is in addition to the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A].** This Addendum forms part of the ES and provides a more detailed explanation of the reviews undertaken since the submission of the DCO Application and any changes made to Chapter 23 of the ES **[REP3-010].** It includes the information contained in the latest version of the Joint

[1] Planning Inspectorate, 'Advice Note Seventeen: Cumulative effects assessment relevant to nationally significant infrastructure projects', August 2019 (version 2) [https://infrastructure.planninginspectorate.gov.uk/legislation-and-advice/advice-notes/advice-note-17/]

Report on Interrelationships with other NSIPs **[REP4-059]** and the information in Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**. The Applicant proposed to submit this Addendum because it considers that it would be unusual and disproportionate to have to update the text in all the ES Chapters and their associated appendices to account for any changes that have taken places since the DCO Application was submitted, as this would result in a rewrite of the entire ES.

1.2.3 This ES Addendum forms part of the application to the Planning Inspectorate (PINS) for a DCO for the Scheme. It does not replace the cumulative effects assessment set out in the technical chapters of the ES **[APP-039 to APP-061, REP1-073, REP1-074, REP1-012, REP3-010, REP4-076, REP4-077]**, rather it provides an update which takes into account the further information which has entered the public domain since the ES was first prepared in respect of local schemes that might result in cumulative effects in combination with the effects from the Scheme.

1.2.4 This report is produced in consistency with other NSIP schemes. Specifically, the Cottam Solar Project **[EN010133].**

2 Methodology

2.1 Introduction

2.1.1 The Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]** identifies six additional schemes that have the potential to result in new or different cumulative environmental effects as compared to the cumulative effects assessment set out in the ES **[APP-039 to APP-061, REP1-073, REP1-074, REP1-012, REP3-010, REP4-076, REP4-077]**. The assessments of the additional schemes follow the methodology set out within ES Chapter 2: EIA Process and Methodology **[APP-040]** and used for the Environmental Statement, as well as the process described in PINS Advice Note 17.

2.1.2 The proposed schemes listed in Table 2.1 were all initially identified through ES Appendix 2.3: Cumulative Assessment Sites **[APP-069]** as the most likely sites with potential for cumulative effects within the Zone of Influence for all ES topics. As such, they formed part of the assessment of cumulative effects in the ES**[APP-039 to APP-061, REP1-073, REP1-074, REP1-012, REP3-010, REP4-076, REP4-077].** . Since the DCO application for the Scheme was submitted, the Applicant has monitored the progress of these schemes, to continually consider whether any information about them in the public domain would result in any changes to the conclusions of the cumulative effects assessment set out in the ES **[APP-039 to APP-061, REP1-073, REP1-074, REP1-012, REP3-010, REP4-076, REP4-077]**. This information is set out in Table 2-2 'Cumulative Assessment - Review Against Now Published Environmental Information' of the Joint Report on Interrelationships with other NSIPs **[REP4-059]**.

2.1.3 Since the Scheme was accepted for Examination, following the methodology set out in ES Chapter 2: EIA Process and Methodology **[APP-040],** six additional schemes (as set out in Table 2.2 below) have been identified as constituting sites for the Long List in addition to the sites listed in ES Appendix 2.3: Cumulative Assessment Sites **[APP-069]**. As set out in the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]** these are: One Earth Solar Farm, Great North Road Solar Park, Stow Park Solar Farm, Fosse Green Energy, Springwell Solar Farm and Beacon Fen Energy Park.

2.1.4 When this exercise was undertaken, three further schemes were excluded from consideration, the first two being the Steeples Renewables Solar Project and the West Burton Power Station Finding STEP a Home. Neither of these schemes have yet submitted scoping reports to the Planning Inspectorate. The North Humber to High Marnham project is an overhead power transmission line rather than an energy generating station, and is outside the zone of influence of the Scheme.

2.1.5 At Issue Specific Hearing 5 **[EN010132/EX5/WB8.1.32]**, Lincolnshire County Council stated that they considered that Meridian Solar Farm should also be considered as part of the cumulative assessment. The Scheme falls within Tier 3 as it appears on the Planning Inspectorate's programme of projects but a scoping report has not ~~n't~~ been submitted. It is located near Whaplode Drove which is approximately 70km

southeast of West Burton 2. Given the level of uncertainty around the extent of the Scheme it is not considered any further in this Document. If further information is made available during the examination of this Scheme, it will be considered further.

2.1.6 The locations of the additional schemes are also shown in Appendix A, which is an updated version of ES Figure 2.1: Cumulative Assessments Site Plan **[APP-140]**.

2.2 Tier Classification

2.2.1 The schemes identified in Table 2.1 are assigned a tier in accordance with the classification set out in PINS Advice Note 17. The three tiers are defined as follows descending from Tier 1 (most certain) to Tier 3 (least certain) to reflect a diminishing degree of certainty which can be assigned to each development being implemented:

Tier 1

- Under construction;
- Permitted application, whether under the Planning Act 2008 or other regimes, but not yet implemented;
- Submitted application, whether under the Planning Act 2008 or other regimes, but not yet determined.

Tier 2

- Projects on the Planning Inspectorate's programme of projects where a scoping report has been submitted.

Tier 3

- Projects on the Planning Inspectorate's programme of projects where a scoping report hasn't been submitted;
- Identified in the Development Plan (and emerging plan – with appropriate weight given as they move closer to adoption);
- Identified in other plans and programmes (as appropriate) which set the framework for future development consents/approvals, where development is reasonably likely to come forward.

Table 2.1: Cumulatively Assessed and Inter-relationship Schemes

Application Reference	Applicant and Description	Distance from Scheme	Status	Tier
NSIP EN010133	Cottam Solar Project Cottam Solar Project Limited	1.50km from West Burton	Examination Completed, yet to be determined	1
NSIP EN010131	Gate Burton Energy Park Gate Burton Energy Park Ltd	0.87km from West Burton	Examination Completed, yet to be determined	1
NSIP EN010142	Tillbridge Solar Tillbridge Solar Limited	6.5km from West Burton	Scoping Report Submitted	2

Table 2.2: Additional Schemes

Application Reference	Applicant and Description	Distance from Scheme	Status	Tier
West Lindsey DC 147710	Luminous Energy Ground mounted 49.9MW solar PV farm Stow Park Farm, Stow Park, Lincoln, LN1 2AN	0km from West Burton	Scoping Report submitted to LPA, December 2023.	2
NSIP EN010159	One Earth Solar Farm Solar farm and battery energy storage system with a generating capacity exceeding 50MW	3.4km from West Burton	Scoping Report submitted to PINS. Submission of application expected Q1 2025	2

NSIP EN010162	Great North Road Solar Park Elements Green Trent Limited Solar farm battery energy storage system with a maximum generation capacity of 800MW	13.8km from West Burton	Scoping Report submitted to PINS. Submission of application expected Q2 2025	2
NSIP EN010154	Fosse Green Energy Fosse Green Energy Limited Solar farm and battery energy storage system with a generating capacity exceeding 50MW	10.6km from West Burton	Scoping Report submitted to PINS June 2023. Submission of application expected Q4 2024	2
NSIP EN010149	Springwell Solar Farm Springwell Energy farm Ltd Solar farm and battery energy storage system with a generating capacity exceeding 50MW	Approx 21km from West Burton	Scoping Report submitted March 2023. Statutory consultation January and February 2024. Submission of application expected Q3 2024	2
NSIP EN010151	Beacon Fen Energy Park Beacon Fen Energy Park Limited Solar farm and battery energy storage system with a generating capacity exceeding 50MW	Approx 32km from West Burton	Scoping Report submitted April 2023. The application is expected to be submitted Q3 2024.	2

3 Cumulative Review

3.1 Climate Change Cumulative Effects

DCO Application Assessment (Section 7.11 of ES Chapter 7 [REP1-012])

3.1.1 The assessment of cumulative climate change effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 7.11 of ES Chapter 7: Climate Change Revision A **[REP1-012].**

3.1.2 This concludes that there is anticipated to be a major beneficial cumulative effect in terms of climate change resilience with Cottam, Gate Burton and Tillbridge during operation given that the combined effect of the renewable energy will serve to counter the effects of Climate Change (paragraph 7.11.8 **[REP1-012]).**

Cumulative Assessment - Review Against Now Published Environmental Information

3.1.3 Following discussions at the Cottam Solar Project Issue Specific Hearings in specific regard to climate change, the following paragraphs were added to Table 2-2 of Appendix E of the Interrelationships Report **[REP4-059]**:

"Each scheme has concluded significant beneficial cumulative impacts for the respective scheme in isolation. For both Cottam and West Burton a cumulative beneficial cumulative effect has been identified as four solar projects being developed at the same time would result in a quicker reduction in CO2e emissions from legacy sources than a single project alone. This approach takes into account professional judgment and interpretation of the IEMA Guidance.

"A more conservative approach has been taken by Gate Burton and Tillbridge and no additional cumulative beneficial effects have been identified as a result of their interpretation of the guidance. This interpretation takes 'cumulative effects' as not possible to assess for climate change given the national rather than local scale of the impact.

"In light of this difference in interpretation, the SoS may decide to place limited weight on the beneficial CEA identified (albeit that there are beneficial effects for each Scheme assessed as assessed individually). Discussion between the different authors of the Climate Change Assessments for the projects has taken place to align to the above approach."

Assessment of Cumulative Effects of Additional Schemes

3.1.4 The Schemes in Table 2.2 have been reviewed to consider any changes to or additional likely significant effects on climate change. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A],** no additional significant cumulative adverse effects are anticipated during construction, operation, or decommissioning.

3.2 Landscape and Visual Impact Cumulative Effects

DCO Application Assessment (section 8.10 of ES Chapter 8 [APP-046])

3.2.1 The assessment of cumulative landscape and visual impact effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 8.10 of ES Chapter 8: Landscape and Visual Impact **[APP-046]**.

3.2.2 There are **no likely significant in-combination landscape effects** at the construction, operation (year 1 and year 15) and decommissioning stages. For further details on the in-combination landscape effects of the Cumulative Sites, refer to the Individual Landscape Receptor Sheets at Appendix 8.2 **[APP-073]**.

3.2.3 The cumulative visibility for the WB1 and WB2 Sites would not alter the overall character of the landscape to the east of the West Burton Sites and its Locally Designated features. Moreover, these designations are set within a well-vegetated context or associated with undulating landform that plays a positive role in reducing the overall Cumulative Effects.

Cumulative Assessment - Review Against Now Published Environmental Information

3.2.4 Reviews of the cumulative landscape and visual impact effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES **[APP-046]**. This position is set out in Table 2-2 of Appendix E of the Interrelationships Report **[REP4-059].**

Assessment of Cumulative Effects of Additional Schemes

3.2.5 The schemes in Table 2.2 have been reviewed to consider the potential for there to be additional landscape and visual cumulative effects. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB.8.2.5_A]**, no significant additional cumulative effects have been identified during construction, operation, or decommissioning.

3.2.6 Potential cumulative visual effects between associated with One Earth and Great North Road and the Scheme have been considered. Having reviewed the information currently available, there will be no intervisibility due to the distance between the schemes, intervening topography, built structures and vegetation. Given these reasons, cumulative landscape and visual effects resulting from simultaneous construction as well as during operation (year 1 and year 15) and decommissioning will not be significant.

3.2.7 Potential Cumulative Effects associated with the Stow Park Solar Farm have been considered. Having reviewed the information currently available, it is considered that development of the solar array would not lead to an increase in the significance of effects identified within the LVIA undertaken for the Scheme for five reasons. Firstly, is the matter of relative close proximity and the direct visual impacts, which would be diminished by the presence of intervening features such as the vegetation associated with the railway, the ex-MOD petroleum storage facility, close proximity

to hedgerows along Till Bridge Lane (A1500) to the north of the park, the A156 to the west, the A15 to the east and Cowdale Lane to the south of the park, plus the raised ground occupied by the farm buildings (at the south of the park) with Stow Park and at the north of the park with Moat Farm and Axlewood Farm, which all serve to provide enclosure with natural and built screening and help curtail intervisibility; Secondly on the matter of location and the degree of landscape change within an area characterised by agriculture and an open rural landscape, the cumulative impact of a relatively small increase of solar provision at Stow Park would not lead to a significant change to this existing landscape character by virtue of scale. Thirdly, there is sufficient distance from potentially sensitive residential and landscape and visual receptors. Fourthly, Stow Park is located on a westward facing slope, with a fall from the eastern boundary towards the existing railway line in the west, which provides natural containment and an 'inward-focus' to relationship between the two cumulative developments. Finally, a range of mitigation measures have been designed to limit the adverse landscape and visual impacts for both cumulative developments, including the retention of all hedgerows and significant trees within the Site and along the Site boundaries and the planting of new native hedgerows.

3.2.8 The only exception to this is in regard to views from Cowdale Lane. Viewpoint 44 of the Scheme's LVIA demonstrates views north across the Stow Park Solar Farm from an existing field access. It is anticipated that as a consequence of the development of the Stow Park Solar Farm, that this view would become dominated by solar panels associated with the Stow Park Solar Farm, which is likely to be considered Significant. Given the early stages of development of the proposals for Stow Park Solar Farm it is uncertain what approach the developer would be inclined to take to in any approach to mitigation in this location.

3.2.9 Potential cumulative visual effects associated with Fosse Green Solar Farm, Springwell Solar Farm and Beacon Fen Solar Farm have been considered. Having reviewed the information currently available, there will be no intervisibility due to the distance between the schemes, intervening topography, built structures and vegetation. Given these reasons, cumulative landscape and visual effects resulting from simultaneous construction as well as during operation (year 1 and year 15) and decommissioning will not be significant.

3.2.10 There is a notable disconnect between the schemes, particularly attributed to the location of Springwell Solar Farm within the separate National Character Area NCA 47: Southern Lincolnshire Edge and Fosse Green Solar Farm within both NCA 47: Southern Lincolnshire Edge and NCA 48 Trent and Belvoir Vales National Character Areas.

3.3 Ecology and Biodiversity Cumulative Effects

DCO Application Assessment (Section 9.9 of ES Chapter 9 [APP-044])

3.3.1 The assessment of cumulative ecology and biodiversity effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 9.9 of **ES Chapter 9: Ecology and Biodiversity [APP-047]**.

3.3.2 This concludes that there is anticipated to be a cumulative **moderate beneficial effect** on reptiles and amphibians at District Level (paragraph 9.9.10 **[APP-047]**); a cumulative **moderate adverse effect** on skylark, yellow wagtail, grey partridge and quail at a local to District level (depending on what mitigation is adopted) (paragraph 9.9.11 **[APP-047]**).

Cumulative Assessment - Review Against Now Published Environmental Information

3.3.3 Following review of published environmental information in September 2023, the following paragraphs in relation to updated cumulative ecology and biodiversity effects were added to Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**:

"Moderate cumulative adverse effect during construction and operation on skylark, yellow wagtail, grey partridge and quail at a District (rather than Local to District) level with Cottam, Gate Burton and Tillbridge.

No other significant cumulative effects beyond those provided in the West Burton ES have been identified since the publication of the latest environmental information for the other three schemes."

3.3.4 Further review of published environmental information in December 2023 and February 2024 identified no further changes to the cumulative effects assessed in the ES.

Assessment of Cumulative Effects of Additional Schemes

3.3.5 As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB.8.2.5_A]**, with the publication of the EIA Scoping Reports for the One Earth Solar Farm and Great North Road Solar Park (GNRSP), Fosse Green Energy, Springwell Solar Farm and Beacon Fen Energy Park, it is assessed that already-identified cumulative effects upon ground nesting birds are likely to be exacerbated to a degree, although this is dependent on any mitigation to be provided within these schemes, which are, as yet, undefined. However, due to the significant separation between the Scheme and the other projects (the GNRSP lies between 19.25km and 31.1km, One Earth Solar Farm lies between 8.2km and 22.8km, Fosse Green Energy is 11km, Springwell Solar Farm is 21km and Beacon Fen is 36km from the Scheme's generating stations), it is considered that the addition of these projects, even in the absence of mitigation, is unlikely to increase the scale at which the above cumulative adverse effect is felt beyond District level due to the considerable physical separation and situation of these schemes within more distant districts.

3.3.6 Therefore, a cumulative **significant adverse effect** is likely at the District level on ground nesting birds. This is also the same assessment significance and scale predicted to occur when considering the Gate Burton and Tillbridge schemes with the Scheme and so is consistent with the conclusion set out in paragraph 9.9.11 of **ES Chapter 9 Ecology and Biodiversity [APP-047]**. As such, no significant additional cumulative effects are identified during construction, operation, or decommissioning.

3.4 Hydrology, Flood Risk and Drainage Cumulative Effects

DCO Application Assessment (Section 10.10 of ES Chapter 10 [REP1-073])

3.4.1 The assessment of cumulative hydrology, flood risk and drainage effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 10.10 of **C6.2.10 ES Chapter 10: Hydrology, Flood Risk and Drainage [APP-048]**.

3.4.2 This concludes there are no significant cumulative effects.

Cumulative Assessment - Review Against Now Published Environmental Information

3.4.3 Reviews of the cumulative hydrology, flood risk and drainage effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out (under the heading "Water Environment") in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.4.4 The Schemes in Table 2.2 have been reviewed to consider whether any cumulative effects will occur to the water environment. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB.8.2.5_A]**, Given there can be no detriment to neighbouring areas with regards to hydrology post development, and given all proposed developments are held to the same standard by the planning authority , no cumulative effects have been identified during construction, operation, or decommissioning.

3.5 Ground Conditions and Contamination Cumulative Effects

DCO Application Assessment (Section 11.11 of ES Chapter 11 [APP-049])

3.5.1 The assessment of cumulative ground conditions and contamination effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 11.11 of **ES Chapter 11: Ground Conditions and Contamination [APP-049]**.

3.5.2 This concludes there are no significant cumulative effects.

Cumulative Assessment – Review Against Now Published Environmental Information

3.5.3 Reviews of the cumulative ground conditions and contamination effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.5.4 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be additional ground conditions and contamination effects. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB.8.2.5_A]**,

3.5.5 Given the minimal level of effects and distance between the schemes One Earth Solar Farm, Fosse Green, Springwell, Beacon Hill and Great North Road Solar Park, no cumulative effects have been identified.

3.5.6 In respect of the Stow Park Solar Farm, at this stage no cumulative effects have been identified based on the information available.

3.6 Minerals Cumulative Effects

DCO Application Assessment (Section 12.10 of ES Chapter 12 [APP-050])

3.6.1 The assessment of cumulative minerals effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 12.10 of **ES Chapter 12: Minerals [APP-050]**.

3.6.2 This concludes there are no significant cumulative effects.

Cumulative Assessment - Review Against Now Published Environmental Information

3.6.3 Reviews of the cumulative minerals effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES.

Assessment of Cumulative Effects of Additional Schemes

3.6.4 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional impacts on mineral resources.

3.6.5 As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB.8.2.5_A]**, the Great North Road Solar Park and One Earth Solar Farm proposals both affect large areas of safeguarded fluvial sand and gravel deposits associated with the River Trent. The One Earth Solar Farm proposal within Lincolnshire also lies with an Area of Search for future sand and gravel supplies. The Fosse Green Energy proposal lies to the south west of Lincoln, it also affects areas of safeguarded sand and gravel deposits and is within the same Area of Search for future sand and gravel supplies. The Fosse Green Energy proposal lies much closer to current area of sand and gravel extraction than the Scheme. Any proposals for development that sterilises additional areas of these deposits has the potential to impact on the future supply of sand and gravel. The potential additional cumulative impact however is considered small as there is an extensive area of sand and gravel deposits extending well beyond the boundary the Scheme and those listed in Table 2.2, the additional area of safeguarded mineral affected is relatively small and the impact is for a limited time.

3.6.6 Although the Springwell Solar Farm proposal is located within an area of safeguarded limestone it lies outside any area safeguarded for sand and gravel and therefore there are no cumulative mineral impacts arising from this proposal.

3.6.7 The Stow Park Solar Farm and Beacon Fen Energy Park proposals do not affect any safeguarded mineral deposits and so there are no cumulative mineral impacts arising from either proposal.

3.6.8 To conclude no significant cumulative effects are anticipated during construction, operation, or decommissioning.

3.7 Cultural Heritage Cumulative Effects

DCO Application Assessment (Section 13.10 of ES Chapter 13 [APP-051])

3.7.1 The assessment of cumulative cultural heritage effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 13.10 of **ES Chapter 13: Cultural Heritage [APP-051]**.

3.7.2 This concluded that slight adverse effects had been identified as a result of the Scheme to the significance of the Deserted village of North Ingleby (1003570), Roman villa west of Scampton Cliff Farm (NHLE 1005041), Broxholme medieval settlement and cultivation remains (1016797), Medieval settlement and open field system immediately south-east of Low Farm (NHLE 1017741), Subscription Mill (NHLE 1064067), Church of All Saints, Broxholme (NHLE 1064095).

3.7.3 The only cumulative effects were identified at the Roman villa west of Scampton Cliff Farm (NHLE 1005041) where views from the Lincoln Cliff contribute to the significance of the asset (ES Chapter paragraph 13.10.6).

Cumulative Assessment - Review Against Now Published Environmental Information

3.7.4 Following review of published environmental information in September 2023, the following paragraph in relation to updated cumulative cultural heritage effects was added to Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

"Potential for up to Moderate Adverse cumulative impacts with Cottam at Roman Villa west of Scampton (NHLE 1005041) depending upon the effectiveness of the landscape mitigation. Any additional cumulative impacts with the Gate Burton and Tillbridge Solar Schemes would be likely to be negligible. No significant cumulative impacts identified for other heritage assets."

3.7.5 Following review of further published environmental information in December 2023, the following paragraphs in relation to updated cumulative cultural heritage effects were added to Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

"While ZTVs demonstrate that the Gate Burton, Tillbridge, West Burton and Cottam Schemes are theoretically visible from the location of the Scheduled Roman Villa west of Scampton (NHLE 1005041), direct visibility from the asset is filtered by existing hedgerow to the west and other features within the landscape. As a consequence, cumulative impacts to the Roman Villa west of Scampton (NHLE 1005041) have only been identified between the Cottam and West Burton Schemes; any additional cumulative impacts with the Gate Burton and Tillbridge Solar Schemes would be likely to be negligible. Following a site visit, during the winter period, when foliage coverage is at its lowest, and with consideration to the design proposals of the Cottam and West Burton Schemes, including landscape mitigation, it is considered that there would be a Slight Adverse cumulative impact at the Roman Villa west of Scampton (NHLE 1005041)."

"No significant cumulative impacts identified for any heritage assets."

3.7.6 Reviews of the cumulative heritage effects against published environmental information in February 2024 have identified no additional changes to the cumulative effects.

Assessment of Cumulative Effects of Additional Schemes

3.7.7 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional impacts to heritage assets (both archaeological and above ground). As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, due to the distance and lack of historical association between the Scheme and One Earth Solar Farm, Great North Road Solar Park, Fosse Green, Springwell, and Beacon Fen, no significant additional cumulative effects have been identified during construction, operation, or decommissioning.

3.7.8 There is potential for the Scheme and the Stow Park Solar Farm to have a 'less than substantial harm' (in National Planning Policy Framework terms)– to the scheduled medieval bishop's palace and deer park, Stow Park (NHLE 1019229).

3.7.9 Both schemes are proposed to occupy land within the former deer park. The Scheme identified large adverse impacts of a reversible nature to the scheduled medieval bishop's palace and deer park, Stow Park (NHLE 1019229).

3.7.10 A setting impact assessment, as part of a request for a Screening Opinion Land at Stow Park (ref: 146938) concluded that while the study site forms part of the setting of the monument, "the remains within the setting have a contextual relationship, which is vested in the survival of associated physical remains, rather than in a visual appreciation of those remains".

3.7.11 As such the land for the Stow Park Solar Farm was assessed as not impacting upon the immediate setting of the medieval bishop's palace and deer park, Stow Park (NHLE 1019229), and instead was considered to have the potential to provide the opportunity to enhance the appreciation of the monument.

3.7.12 The Applicant's position on the level of impact to the three constituent parts of 'The medieval bishop's palace and deer park, Stow Park' Scheduled Monument (NHLE 1019229) is detailed in the Stow Park Position Statement [EN010132/EX5/WB8.2.10].

3.7.13 The Applicant believes that, while the Scheme would physically and visually isolate two of the three parts of the Scheduled Monument, post-medieval and modern activity has already adversely compromised the setting of these heritage assets in relation to the former landscape of the deer park, so that these can only be experienced individually. This coupled, with the reversible nature of the Scheme has resulted in the Applicant's assessment that the Scheme would cause less than substantial harm (at the upper end) to the designated heritage asset. Full details of the Applicant's position can be found in the Statement of Common Ground **[EN010132/EX5/WB8.3.3_A]**.

3.7.14 The proposed Stow Park Solar Farm is not considered to physically or visually isolate the Scheduled parts of the Deer Park to a greater extent than that which would occur as a result of the Scheme. Any potential cumulative impacts are considered to not increase the level of impact to that assessed for the Scheme. Therefore, there is not considered to be a significant cumulative effect.

3.8 Transport and Access Cumulative Effects

DCO Application Assessment (Section 14.9 of ES Chapter 14 [APP-052])

3.8.1 The assessment of cumulative transport and access effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 14.9 of **ES Chapter 14: Transport and Access [APP-052]**.

3.8.2 This concludes there are no significant cumulative effects.

Cumulative Assessment – Review Against Now Published Environmental Information

3.8.3 Reviews of the cumulative transport and access effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.8.4 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional effects on transport and access. In particular, construction vehicle routes to each scheme have been considered.

3.8.5 As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, Stow Park Farm is located to the south of the A1500. Whilst the Stow Park Farm EIA Scoping Report does not identify a construction vehicle route, an assumption has been made that it will use the A1500. If this is the case, there is the potential for overlap with construction vehicles accessing Cottam 1 South, and the Cable Route Corridor, in the event that the construction timetables for the two schemes overlap. At Section 13.3, the Stow Park Farm EIA Scoping Report states, "The trip generation assessment indicates that approximately 100 HGV deliveries are expected over the 34-week construction period, amounting to around 3 one-way HGV trips per week. No abnormal loads will be required for the development". Due to the low level of HGV movements for the Stow Park Farm scheme, significant cumulative impacts are not expected.

3.8.6 The One Earth Scheme is located to the south of the A57, which is likely to form the main construction vehicle route to it. No construction vehicles associated with the solar array element of the Scheme will use the A57. There will be a small number of construction vehicle trips on the A57 associated with the construction of the Cable Route. Given the nature of the A57, which already accommodates large numbers of HGV movements, no significant cumulative effects have been identified. Given the distance from the Scheme to the Great North Road, Springwell, Beacon Farm and Fosse Green Schemes, no cumulative effects have been identified.

3.8.7 Overall, no significant additional cumulative effects have been identified when considering these six additional schemes during construction, operation, or decommissioning.

3.9 Noise and Vibration Cumulative Effects

DCO Application Assessment (Section 15.9 of ES Chapter 15 [APP-053])

3.9.1 The assessment of cumulative noise and vibration effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 15.9 of **ES Chapter 15: Noise and Vibration [APP-053]**.

3.9.2 This concludes there are no significant cumulative effects.

Cumulative Assessment – Review Against Now Published Environmental Information

3.9.3 Reviews of the cumulative noise and vibration effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.9.4 The Schemes listed in Table 2.2 have been reviewed to consider the potential for there to be likely additional impacts to noise sensitive receptors. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, due to the distance and lack of shared receptors between the Scheme and the schemes listed in Table 2.2, no significant additional cumulative effects have been identified during construction, operation, or decommissioning.

3.10 Glint and Glare Cumulative Effects

DCO Application Assessment (Section 16.10 of ES Chapter 16 [APP-054])

3.10.1 The assessment of cumulative glint and glare effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 16.10 of **ES Chapter 16: Glint and Glare [APP-054]**.

3.10.2 This concludes there are no significant cumulative effects.

Cumulative Assessment - Review Against Now Published Environmental Information

3.10.3 Reviews of the cumulative glint and glare effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.10.4 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional glint and glare effects. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, due to the distance and the lack of shared receptors between the schemes between the Scheme and those listed in Table 2.2 no significant additional cumulative effects have been identified during construction, operation, or decommissioning. In respect of the Stow Park Solar Farm, at this stage no cumulative effects have been identified based on the information available.

3.11 Air Quality Cumulative Effects

DCO Application Assessment (Section 17.9 of ES Chapter 17 [APP-055])

3.11.1 The assessment of cumulative air quality effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 17.9 of **ES Chapter 17: Air Quality [APP-055]**.

3.11.2 This concludes there are no significant cumulative effects.

Cumulative Assessment - Review Against Now Published Environmental Information

3.11.3 Reviews of the cumulative air quality effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.11.4 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional impacts to air quality. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, there are no significant cumulative effects anticipated during construction, operation, or decommissioning.

3.12 Socio-Economics and Tourism and Recreation Cumulative Effects

DCO Application Assessment (Section 18.10 of ES Chapter 18 [APP-056])

3.12.1 The assessment of cumulative socio-economics, tourism and recreation effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 18.10 of **ES Chapter 18: Socio-Economics and Tourism and Recreation [APP-056]**.

3.12.2 This has concluded the following significant effects, which are set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]:**

3.12.3 Peak cumulative medium-term temporary **moderate beneficial effect**, significant at Local level on construction sector employment construction and decommissioning with this Scheme, Cottam, Gate Burton and Tillbridge (Section 18.10.9 and paragraph 18.10.59 **[APP-056]**).

3.12.4 Peak cumulative medium term temporary **major-moderate beneficial effect**, significant at Local level on accommodation sector employment during construction and decommissioning with this Scheme, Cottam, Gate Burton and Tillbridge (Section 18.10.11 and paragraph 18.10.62 **[APP-056]**).

3.12.5 Peak cumulative medium-term temporary **moderate beneficial effect**, significant at Local level on Economic activity and Employment during construction and decommissioning with this Scheme, Cottam, Gate Burton and Tillbridge (Section 18.10.14 and paragraph 18.10.65 **[APP-056]**).

3.12.6 Peak cumulative medium-term **moderate beneficial effect**, significant at Local level on accommodation stock (housing) during construction with this Scheme, Cottam, Gate Burton and Tillbridge (paragraph 18.10.17 **[APP-056]**).

3.12.7 Peak cumulative medium-term temporary **major-moderate beneficial effect**, significant at Local level on Access to employment (IMD) during construction with this Scheme, Cottam, Gate Burton and Tillbridge (paragraph 18.10.18 **[APP-056]**).

3.12.8 Peak cumulative medium-term temporary **moderate beneficial effect**, significant at Local level on Access to education (IMD) during construction with this Scheme, Cottam, Gate Burton and Tillbridge (paragraph 18.10.19 **[APP-056]**).

3.12.9 Peak cumulative medium-term **moderate beneficial effect**, significant at Local level on construction economy during construction and decommissioning with this Scheme, Cottam, Gate Burton and Tillbridge (paragraphs 18.10.22 and 18.10.68 **[APP-056]**).

3.12.10 Peak cumulative medium-term temporary **moderate beneficial effect**, significant at Local level on accommodation economy during construction with this Scheme, Cottam, Gate Burton and Tillbridge (paragraph 18.10.24 **[APP-056]**).

3.12.11 Peak cumulative medium-term temporary **moderate adverse effect**, significant at Local level on the tourism and visitor economy during construction with this Scheme, Cottam, Gate Burton and Tillbridge (paragraph 18.10.25 **[APP-056]**).

3.12.12 Peak cumulative medium-term temporary **moderate beneficial effect**, significant at Local level on economic prosperity, and resident and working population income during construction and decommissioning with this Scheme, Cottam, Gate Burton and Tillbridge (paragraphs 18.10.27 and 18.10.76 **[APP-056]**).

3.12.13 Peak cumulative short to medium-term temporary **moderate adverse effect**, significant at Local level on local landscape attractions during construction with this Scheme, Cottam, Gate Burton and Tillbridge (paragraph 18.10.29 **[APP-056]**).

3.12.14 Peak cumulative short to medium-term temporary **moderate adverse effect**, significant at Local level on long distance recreation routes during construction with this Scheme, Cottam, Gate Burton and Tillbridge (paragraph 18.10.32 **[APP-056]**).

3.12.15 Long-term cumulative **moderate adverse effect**, significant at Local level on energy sector employment during operation and decommissioning with this Scheme, Cottam, Gate Burton and Tillbridge (paragraphs 18.10.35 and 18.10.60 **[APP-056]**).

Cumulative Assessment - Review Against Now Published Environmental Information

3.12.16 Reviews of the cumulative socio-economics, tourism and recreation effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.12.17 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional socio-economics, tourism and recreation effects.

3.12.18 As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, potential cumulative effects are from Stow Park Solar cumulatively with the Scheme are likely to be localised in nature.

3.12.19 Due to the smaller size of Stow Park solar (<50MW) compared to the Scheme and the lack of additional tourism and recreation receptors likely to be affected, it is considered that there are only minimal changes to the socio-economic, tourism and recreation environment assessed, which do not result in any additional significant cumulative effects during construction, operation, or decommissioning.

3.12.20 District-level socio-economic, tourism and recreation effects may potentially be increased by One Earth Solar. During its operational lifetime, One Earth Solar Farm is likely to increase the amount of energy employment, and decrease the amount of agricultural employment in the Local Impact Area. No specific data has been provided in the One Earth Solar Scoping Report for the number of jobs generated by, or impacted by the Scheme. Therefore, there is insufficient information to determine if there is likely to be any additional long-term significant cumulative effects in the Local Impact Area as a result of One Earth Solar Farm during the operational phase of the Scheme.

3.12.21 One Earth Solar has a projected construction timescale of 2027-2029, and projected decommissioning timescale of no earlier than 2074. This therefore may create an increased amount of cumulative construction and decommissioning works. However, no changes to significant cumulative decommissioning effects are identified as likely due to the staggered timescales for this project in comparison to the other NSIPs assessed in Chapter 18 of the ES **[APP-056]** and referred to in the **Interrelationships Report [REP4-059]**.

3.12.22 Great North Road Solar, Fosse Green Energy, Springwell Solar Farm, and Beacon Fen Energy Park are all located outside the Local Impact Area (Bassetlaw District and West Lindsey District) and so are not likely to result in additional cumulative effects, except at a regional level. However, these are not anticipated to be significant, as stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**.

3.12.23 No other socio-economic, tourism and recreation receptors are anticipated to experience changes in the level of effect significance identified in the cumulative assessment for the operational phase of the Scheme set out in Chapter 18 of the ES **[APP-056].**

3.13 Soils and Agriculture Cumulative Effects

DCO Application Assessment (Section 19.11 of ES Chapter 19 [APP-057])

3.13.1 The assessment of cumulative soils and agriculture effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 19.11 of **ES Chapter 19: Soils and Agriculture [APP-057]**.

3.13.2 This concludes there are no significant cumulative effects.

Cumulative Assessment - Review Against Now Published Environmental Information

3.13.3 Reviews of the cumulative soils and agriculture effects against published environmental information in March 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.13.4 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional soils and agriculture effects.

3.13.5 As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, the Stow Park site is a single parcel of land approximately 48ha in extent. It has been subject to a detailed ALC assessment, which concluded the land is Grades 3a and 3b.

3.13.6 One Earth and Great North Road sites are larger (1500ha and 2900ha respectively) and are broken up into several separate parcels of land. No detailed ALC assessment work has yet been submitted for these NSIP sites.

3.13.7 The Springwell Solar Farm site PEIR report includes ALC survey grade areas for 1,458.9ha. this survey found 23.8ha Grade 1, 164.9ha Grade 2, 593.2ha Grade 3a, 672.8ha Grade 3b and 4.2ha Grade 4 agricultural land. Approximately 53.6% of the site is best and most versatile agricultural land.

3.13.8 Fosse Green Solar Park exhibition material shows interim ALC results of work that was still ongoing in August 2023. The majority of the agricultural land was surveyed with approximately 30% being Grade 3a and 68% Grade 3b.

3.13.9 No ALC survey results have yet been published for the Beacon Fen Energy Park site.

3.13.10 No information on agricultural occupancy is provided for any of these sites.

3.13.11 No significant cumulative effects have been identified for Soils and Agriculture. As all of the schemes outlined in Table 2.1 are temporary in nature, agricultural land is not lost or degraded. Soil resources associated with that agricultural land will experience minimal disturbance during construction/decommissioning works. Any soils on arable land will benefit from extended fallow period.

3.13.12 A possible cumulative effect for Farming Circumstances could occur where an agricultural occupant owns or rents farmland on multiple separate sites. This is difficult to determine as the names of agricultural occupants are not disclosed

between applicants for the schemes. However given the geographic separation between the different scheme sites, any common occupancy between Sites would strongly suggest large and diverse farm businesses , reducing the potential for there to be any adverse cumulative effects. There are therefore no significant adverse cumulative effects for farming circumstances.

3.14 Waste Cumulative Effects

DCO Application Assessment (Section 20.10 of ES Chapter 20 [APP-058])

3.14.0 The assessment of cumulative waste effects of the Scheme and the three NSIPs set out in Table 2.1 is included at Section 20.10 of **ES Chapter 20: Waste [APP-058]**.

3.14.1 This has concluded a **moderate or large adverse effect** on landfill waste handling in Nottinghamshire during the decommissioning phase with Cottam, Gate Burton and Tillbridge (paragraph 20.10.16 **[APP-058]**).

Cumulative Assessment - Review Against Now Published Environmental Information

3.14.2 Reviews of the cumulative waste effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.14.3 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional waste effects.

3.14.4 As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, the consideration of potential cumulative effects is based on the likely increase in waste arisings from the schemes at all stages of development. This includes recycling handling and landfill capacity for construction, demolition and excavation (C,D&E) waste, and recycling and handling of waste electronics and electrical equipment (WEEE).

3.14.5 Due to the smaller size of Stow Park solar (<50MW) compared to the Scheme, it is considered that there are only minimal changes to the level of waste arisings identified in the cumulative assessment.

3.14.6 Waste arisings from Great North Road Solar Park are anticipated to increase the level of waste handling requirements in Nottinghamshire, while One Earth Solar Farm is likely to increase the level of waste handling requirements in both Lincolnshire and Nottinghamshire. Waste arisings from Fosse Green Energy, Springwell Solar Farm, and Beacon Fen Energy Park are likely to be predominantly handled within Lincolnshire, thus increasing the level of waste handling requirements in Lincolnshire.

3.14.7 However, no changes to the level of significance, nor number of significant cumulative effects are identified at any stage of the Scheme's lifetime taking into an account an assessment of these additional schemes. This is due to the staggered prospective construction and decommissioning timescales for these developments.

3.14.8 Therefore, when taking into account the additional schemes, there are no additional significant cumulative effects compared to those identified in WB6.2.20 ES Chapter 20: Waste **[APP-058]**.

3.15 Other Environmental Matters (Matters Scoped Out) Cumulative Effects

DCO Application Assessment (Sections 21.2-21.4 of ES Chapter 21 [APP-059])

3.15.1 Electromagnetic fields; telecommunications, utilities and television; and light pollution are addressed respectively in Sections 21.2, 21.3, and 21.4 of **ES Chapter 21: Other Environmental Matters [APP-059]**. These topics were scoped out of assessment in the ES as confirmed by PINS in the **ES Appendix 2.2: Scoping Opinion [APP-068]**.

3.15.2 There are no significant cumulative effects anticipated in regard to any of these topics.

Cumulative Assessment - Review Against Now Published Environmental Information

3.15.3 With the exception of telecommunications, reviews of the cumulative effects for electromagnetic fields; telecommunications, utilities and television; and light pollution against published environmental information in September 2023, December 2023, and February 2024 have not been undertaken in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**. This is due to these topics being scoped out of the environmental assessment for the Scheme, and for Gate Burton Energy Park **[EN010131]**, Cottam Solar Project **[EN010133]**, and Tillbridge Solar Project **[EN010142]**.

Assessment of Cumulative Effects of Additional Schemes

3.15.4 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional EMF effects. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, given the minimal level of effects and distance between the schemes, no cumulative effects have been identified.

3.15.5 Similarly, the Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional telecommunications, utilities, and television reception effects. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, given the minimal level of effects and distance between the schemes, no cumulative effects have been identified.

3.15.6 Finally, the Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional light pollution effects. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, given the minimal level of effects and distance between the schemes, no cumulative effects have been identified.

3.15.7 In respect of the Stow Park Solar Farm, at this stage no cumulative effects have been identified based on the information available with respect to EMF, telecommunications, utilities, and television reception effects, or light pollution. This is primarily due to the comparatively smaller size of Stow Park Solar Farm (<50MW), and the minimal number of potentially affected receptors.

3.16 Other Environmental Matters (Human Health) Cumulative Effects

DCO Application Assessment (Paragraphs 21.5.37-21.5.43 of ES Chapter 21 [APP-059])

3.16.1 The assessment of cumulative human health effects of the Scheme and the three NSIPs set out in Table 2.1 is included at paragraphs 21.5.37-43 of **ES Chapter 21: Other Environmental Matters [APP-059]** and is supported with greater detail in **ES Addendum 21.1: Human Health and Wellbeing Effects [REP4-077]**.

3.16.2 This concludes that there is anticipated to be peak cumulative **moderate adverse effect** on long distance recreation routes during construction with Cottam, Gate Burton and Tillbridge (paragraph 21.5.42 **[APP-059]**) and **significant beneficial effects** during construction as a result of uplifts in employment and in skills training and education opportunities with Cottam, Gate Burton and Tillbridge. (paragraph 21.5.41 **[APP-059]**).

Cumulative Assessment - Review Against Now Published Environmental Information

3.16.3 Reviews of the cumulative human health effects against published environmental information in September 2023, December 2023, and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.16.4 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely additional impacts to human health and wellbeing effects. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, potential cumulative effects are based on the likely localised health and wellbeing impacts from Stow Park Solar cumulatively with the Scheme. District-level health and wellbeing matters may potentially be affected by One Earth Solar. Due to the separation of Great North Solar, Fosse Green Energy, Springwell Solar Farm, and Beacon Fen Energy Park there are not anticipated to be cumulative health and wellbeing effects to the previously cumulatively assessed projects.

3.16.5 Due to the comparatively smaller size of Stow Park solar (<50MW), it is considered that there are only minimal changes to the human health and wellbeing impacts identified, which do not result in any additional significant cumulative effects. No additional significant effects are anticipated from Great North Road Solar Park, Fosse Green Energy, Springwell Solar Farm, and Beacon Fen Energy Park due to their distance from the Scheme.

3.16.6 One Earth Solar may bring an increase in employment and education and skills opportunities that will beneficially contribute towards deprivation in the Local Impact Area (Bassetlaw and West Lindsey Districts), however, it is not anticipated that the level of significance of the cumulative assessment would change as a result. Therefore, there are no new significant cumulative adverse effects to those identified in Section 21.5 of ES Chapter 21 Other Environmental Matters **[APP-059]**

and **ES Addendum 21.1: Human Health and Wellbeing Effects [REP4-077]** at the construction, operation or decommissioning phases of the Scheme.

3.17 Other Environmental Matters (Major Accidents and Disasters) Cumulative Effects

DCO Application Assessment (Paragraph 21.6.59 of ES Chapter 21 [APP-059])

3.17.1 The assessment of cumulative major accidents and disaster effects of the Scheme and the three NSIPs set out in Table 2.1 is included at paragraph 21.6.61 of **ES Chapter 21: Other Environmental Matters [APP-059]**.

3.17.2 This concludes there are no significant cumulative effects.

Cumulative Assessment – Review Against Now Published Environmental Information

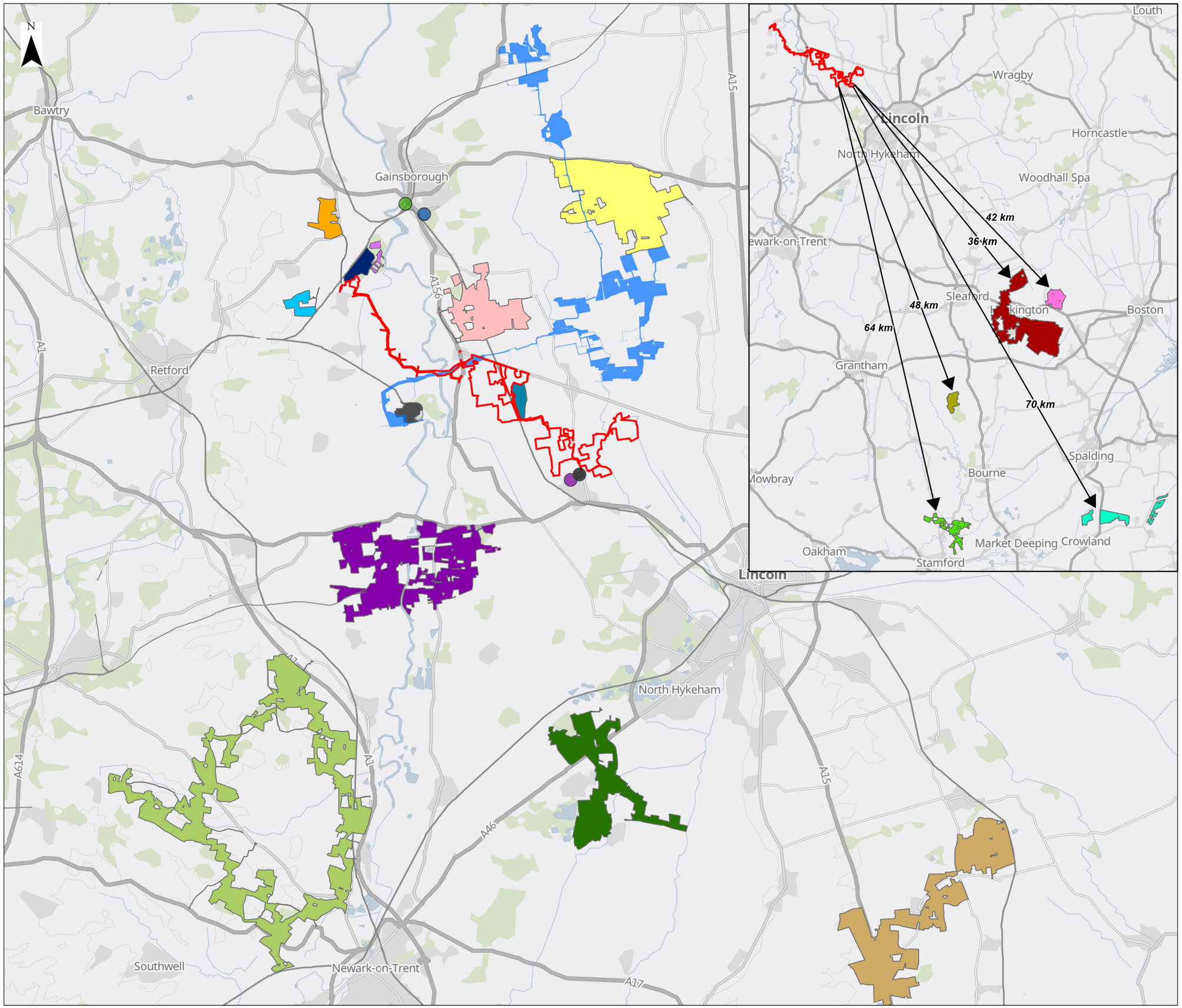
3.17.3 Reviews of the cumulative major accidents and disaster effects against published environmental information in September 2023, December 2023 and February 2024 have identified no changes to the cumulative effects assessed in the ES. This position is set out in Table 2-2 of Appendix E of the **Interrelationships Report [REP4-059]**.

Assessment of Cumulative Effects of Additional Schemes

3.17.4 The Schemes in Table 2.2 have been reviewed to consider the potential for there to be likely major accident and disaster effects. As stated in Table 3.1 of the Technical Note on Cumulative Effects of Additional Schemes **[EN010132/EX5/WB8.2.5_A]**, potential cumulative effects are based on the likely localised major accident and disaster impacts from Stow Park Solar cumulatively with the Scheme. Due to the separation of One Earth Solar, Great North Solar, Fosse Green Energy, Springwell Solar Farm, and Beacon Fen Energy Park, and the generally localised impacts from major accidents and disasters, there are not anticipated to be cumulative major accident and disaster effects to the previously cumulatively assessed projects.

3.17.5 Due to the comparatively smaller size of Stow Park solar (<50MW), it is considered that there are only minimal changes to the major accident and disaster impacts identified, which do not result in any additional significant cumulative effects. No additional likely significant effects are anticipated from One Earth Solar, Great North Road Solar Park, Fosse Green Energy, Springwell Solar Farm, and Beacon Fen Energy Park due to their distance from the Scheme. Therefore, there are no significant additional cumulative effects during the cumulative construction, operational, and decommissioning periods.

Appendix A – Plan of Additional Schemes



Island GREEN POWER

Lanpro

Key

- Order Limits

Cumulative Developments

- Saxilby Heights
- Land off Sturton Road
- Gainsborough SUE
- Gainsborough Riverside
- Cottam Solar
- West Burton A
- West Burton C
- Beacon Fen Energy Park
- Bumble Bee Farm
- Cottam Power Station Demoilition
- Land NW and S of Field Farm
- Fosse Green Energy
- Gate Burton
- Great North Road Solar
- Heckington Fen Solar
- Mallard Pass Solar
- One Earth Solar
- Springwell Solar Farm
- Stow Park Solar
- Temple Oaks Renewable Energy Park
- Tillbridge Solar
- Meridian Solar Farm

Layers: Lanpro, 2024
Base map: Contains OS data © Crown Copyright and database right 2023
Contains data from OS Zoomstack

0 2 4 6 8 10 km

Scale: 1:165,000@ A3

APFP Regulation: 5(2)(a)	Application Doc No. WB6.4.2.1
Ref: ³2983_LPR_ZZ_ON_DR_Z_0232	Date: 10/04/2024
Drawn by: AZ	Checked by: AVW

Figure 2.1
West Burton
Cumulative Developments

WEST BURTON SOLAR PROJECT
EIA Process and Methodology
Environmental Statement (ES)